

4443

TRANSITIVITY AND ERGATIVITY
IN FORMOSAN AND PHILIPPINE LANGUAGES

A DISSERTATION SUBMITTED TO THE GRADUATE DIVISION OF THE
UNIVERSITY OF HAWAI'I IN PARTIAL FULFILLMENT OF THE
REQUIREMENTS FOR THE DEGREE OF

DOCTOR OF PHILOSOPHY

IN

LINGUISTICS

MAY 2004

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ACKNOWLEDGMENTS

I would first like to acknowledge various funding agencies and/or institutions that have made my graduate study and the completion of this dissertation possible.

I wish to thank the Chiang Ching-Kuo Foundation for International Scholarly Exchange (USA) for providing me with a doctoral dissertation fellowship to conduct this study. I would also like to thank the Department of Linguistics, University of Hawai'i at Mānoa for providing me with a Graduate Assistantship and a Pacific Asian Scholarship (PAS) Tuition Waiver at various times during my graduate study. Thanks also go to the International Student Services, University of Hawai'i at Mānoa for granting me Tuition Differential Waivers during the same period. I am also thankful to the Arts and Sciences Advisory Council for partially supporting my study at the 1997 LSA (Linguistic Society of America) Summer Institute at Cornell University. I also wish to thank the Linguistic Society of America for providing me with a student fellowship to study at the 2001 LSA Summer Institute at the University of California at Santa Barbara. Finally, I would like to acknowledge the Endowment Fund, Department of Linguistics, University of Hawai'i at Mānoa for partially supporting my trip to the 9th International Conference on Austronesian Linguistics, Australian National University, Canberra.

I would also like to acknowledge a number of individuals who have enriched my intellectual life.

My deepest and endless gratitude goes to my advisor, Professor Laurie Reid. I wish to thank him for all the help and support that he has given to me in the past seven and half years. I would like to thank him for generously sharing with me his knowledge about

Philippine languages and for inviting me to join his research project on “Syntactic Typology of Philippine languages”. Through this joint research project, my knowledge about Philippine languages has been greatly expanded. It has also indirectly helped me with my dissertation research. I would also like to thank him for carefully going through all the data presented in the dissertation and suggesting better translations and/or better analyses for them. I am also grateful to him for spending generous amount of time teaching me how to use the Word program to format my papers and how to use the Power Point program to make conference presentations.

I would like to thank Professor Robert Blust, the leading scholar in Austronesian linguistics, for being always helpful and supportive to my research on Austronesian languages. I am thankful to him for sharing with me his knowledge about Austronesian languages, particularly those spoken in Taiwan and Borneo. I always enjoyed taking and/or sitting in the courses (Proto-Austronesian, Languages of Borneo, and Comparative Linguistics I and II) that he offered. I am particularly grateful to him for the encouragement and help that he has given to me during the time that I was writing my dissertation.

I would like to express my gratitude to Professor Byron W. Bender for sharing with me his knowledge about morphology, particularly that of the various approaches to morphological analyses. I am grateful to him for teaching me how to use certain computer programs and for answering my questions regarding English writing style. I am also thankful for the comments and editorial suggestions that he made on the draft of the dissertation.

I would also like to acknowledge Professor William O'Grady for all the help and encouragement that he has given to me in the past seven and half years. I would like to thank him for introducing me to the wonderful world of syntactic typology and for training me to be a syntactician. I always enjoyed learning various theoretical frameworks (Government and Binding Theory, Minimalist Program, Categorical Grammar, and Relational Grammar) from him. I am thankful to him for spending generous amount of time with me discussing issues concerning transitivity and ergativity. Through insightful discussions with him, my knowledge about ergativity has been greatly expanded. I would also like to thank him for recognizing me as a young syntactician in the department and for offering me opportunities to teach one advanced-level syntax course (Ling 640X(2): The Syntax of Ergative Languages) and one introductory-level syntax course (Ling 422: Introduction to Grammatical Analysis) while he served as the Department Chair. Through teaching these courses, I had a chance to reconsider some issues concerning the syntax of Philippine-type languages and have developed some new ideas about ergativity, which has indirectly helped me with my dissertation research. Finally, I am particularly grateful to him for serving as my personal consultant for years to help me through some of the difficult times that I had during my graduate study. Without his help and encouragement, the completion of this dissertation would not have been possible.

I am also grateful to the late Professor Stan Starosta for introducing me to the world of Austronesian syntax. Despite the difference in theoretical orientation, I enjoyed learning the syntax of Austronesian languages and ergative languages from him. The

analysis that I proposed in this dissertation has been greatly influenced by his work on Formosan syntax.

Thanks also go to my teachers at the two LSA Summer Institutes that I attended: Professor Paul Jen-kuei Li (Structure of Formosan languages), Professors Malcolm Ross and John U. Wolff (Issues in Historical Austronesian Linguistics), Professor Frantisek Lichtenberk (Grammatical Patterns in Oceanic Languages), Professor Terry Crowley (Serial and Echo Verbs in Oceanic Languages), Professor Michael Dukes (The Interaction of Grammar and Discourse in Tongan), Professors Matthew Dryer and Carol Rosen (Language Typology), Professor Scott DeLancey (Functional Syntax), Professor Marianne Mithun (Case, Grammatical Relations, Argument Structure, and Voice in North American Indian Languages), Professor Masayoshi Shibatani (Voice), Professor R. M. W. Dixon (Basic Linguistic Theory). Through attending their courses, my knowledge about Austronesian languages, syntax, and typology has greatly expanded, which has indirectly helped my dissertation research.

I would also like to acknowledge several other individuals who have supported me in one way or another throughout my graduate life.

I would like to thank Professor Sasha Vovin for his comments on the draft of the dissertation and for his encouragement during the time that I was writing my dissertation. Thanks also go to the former outside member of my dissertation committee, Professor Miriam Stark, for her constant encouragement in the past four years. Special thanks go to the current outside member of my dissertation committee, Professor P. Bion Griffin, for kindly taking over the outside member duty from Professor Miriam Stark, who was

conducting her field research during the time that I had my oral defense. Thanks also go to Professor Albert J. Schütz, with whom I worked closely as an editor for the *Working Papers in Linguistics* series, and for his encouragement in the past four years.

I would like to acknowledge Professor One-Soon Her, with whom I worked closely for a dictionary project when I was an editor in San-Min Book Company in Taipei, for kindly offering to write a letter of recommendation for me when I applied for the graduate program at UH.

I wish to express my gratitude to Dr. Elizabeth Zeitoun for her friendship and her constant encouragement in the past three years. I would also like to thank Dr. Carl Rubino for his encouragement and for kindly sharing with me his Philippine languages data. I am also thankful to Dr. Laura Chang-Blust for her encouragement in the past few years. Thanks also go to Dr. David Johnson, the leading exponent of Relational Grammar, for his encouragement for my research on ergativity. I am grateful to Jason Lobel for commenting on the Central Philippine languages material that I presented in the dissertation.

I wish to thank Sheila Zamar, my friend, fellow student, and teacher, for her friendship and for sharing with me the beauty of her languages Sorsoganon and Tagalog. I am particularly grateful to her for helping me go through some of the difficult times that I experienced during my graduate study.

I would like to thank Kazumi Yoshihara for her friendship and for her help in the past few years. I would also like to thank her family for their hospitality and for always treating me like one of their family members. Thanks also go to my fellow students and

friends, Aaron Tsang, Sun Young Lee, Tanja Ilic, Shan-Shan Wang, Jung-hsing (Derek) Chang, Hui-hua (Jessie) Hwang, I-Ru Su, and Cathy Kawahata, for their friendship and for sharing the joys and sorrows of life with me during my stay in Hawai‘i. I would also like to thank my friends and officemates, Jason Jackson and Jae Yeon Kim, for the wonderful times that we had while sharing an office.

I would also like to thank my students and friends, Maria Faehndrich, Mai-Han Nguyen, Heejeong Jeong, Manami Sato, Aiyu Tracy Tan, Sachie Maruyama, Avis Ting-Ting Chan, Loyda Zamalloa, Yohei Sakata, and So Young Kim, for their support of my teaching.

I am also grateful to other friends in Linguistics for sharing their time with me through happy gatherings: Lan-hsin Chang, Preena Kangkun, Sumittra Suraratdecha, Laura Sacia and her husband Klaus Dragull, Diana Stojanovic, Mijung Lee, Sang-yeon Cheon, Barry Cowan, Kimberly Pope, Judiana Feng, Jim Ellis, Terry Dean Klafehn, Shawn M. Clankie, Mark Alves, Farooq Babrakzai, Blaine Erickson, Sukenari Hino, Ela Thurgood, Jeewon Hahn, Aya Inoue, Mie Hiramoto, Zoe Ban, Marie-Therese Lawen, Jung-yao Lu, Trixie Tangit, In-kyu Park, Katsura Aoyama, Kaori Ueki, Keira Gebbie Ballantyne, Michiko Nakamura, Atiqa Hachimi, Woody Mott, and Paul Lassette.

I am also grateful to the former secretary of the department, Wendy Onishi, for her help and encouragement in the past seven years. Thanks also go to the current secretary of the department, Jennifer Kanda, for her help in the past two years.

I would like to thank my former housemate, William Smith, for sharing with me the joys and sorrows of life during my stay in Hawai‘i. I would also like to thank Sister

Alicia Damien Lau, Sister Helen Agnes Ignacio, Sister Rose Loraine Matsusaki, and Sister Lina Pagdilao for taking care of my daily life needs during my two-year stay at Marianne Hall.

I am thankful to my best friends in Taiwan, Shu-mei Hsieh and Jia-yin Chen, for their friendship and constant encouragement in the past seven and half years.

Last but not least, I would like to acknowledge my family in Taiwan. I am deeply indebted to my parents, Mu-shen Liao and Shi Liao-Lin, for their full support of my study at UH. I am especially grateful to my sister Su-ching Liao and her family, and my brother Tung-ke Liao and his family for taking care of my parents while I was studying in Hawai'i. Without my family's full support, the completion of this dissertation would not have been possible.

ABSTRACT

This study deals with transitivity and actancy structure in Formosan and Philippine languages. Based on textual analyses of two Formosan languages (Kavalan and Atayal) and two Philippine languages (Central Cagayan Agta and Dibabawon Manobo), I conclude that only one, rather than both, of the dyadic clause patterns constitutes the transitive construction in each language. Specifically, dyadic *-an* clauses are transitive constructions in Kavalan. Dyadic *-un* clauses, dyadic *-an* clauses, and dyadic *s-* clauses are transitive constructions in Atayal. Dyadic *-an* clauses, dyadic *-ãñ* clauses, dyadic *i-* clauses, and dyadic *i- -ãñ* clauses are transitive constructions in Central Cagayan Agta. Dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses are transitive constructions in Dibabawon Manobo. As for the other dyadic clause pattern (i.e., dyadic *-um-/(-)m-* clauses in Kavalan; dyadic *(-)m-* clauses in Atayal; dyadic *-um-/ma-/mag-/maN-* clauses in Central Cagayan Agta; and dyadic *-um-/og-*, or *maN-* clauses in Dibabawon Manobo), these are treated as extended intransitive or pseudo-transitive clauses, a type of intransitive clauses.

Based on the observations that (i) the S of an intransitive clause and the O of a transitive clause have the same morphological marking, whereas (ii) the A of a transitive clause has a distinct morphological marking in each of the languages, I conclude that each language has an ergative case-marking system. Moreover, neither Atayal nor Dibabawon Manobo has a (productive) verbal agreement system, based on the case-marking system alone, I conclude that both languages also exhibit a pure ergative actancy structure. As for Kavalan and Central Cagayan Agta, verbs in these two languages can

carry an optional genitive clitic pronoun or pronominal-related form that agrees with the A of a transitive clause in person and number, but not with the S of an intransitive verb nor with the O of a transitive verb. This suggests that both Kavalan and Central Cagayan Agta have an ergative agreement system. Because Kavalan and Central Cagayan Agta exhibit ergativity in both their nominal case-marking system as well as in their verbal agreement system, I conclude that both Kavalan and Central Cagayan Agta have a pure ergative actancy structure.

TABLE OF CONTENTS

Acknowledgments.....	iv
Abstract.....	xi
List of Tables	xix
List of Figures.....	xxii
List of Abbreviations	xxiii
Chapter 1: Introduction.....	1
1.1 Introduction.....	1
1.2 Sources of Language Data	2
1.3 The Organization of the Dissertation.....	5
Chapter 2: Theoretical Orientation	8
2.1 Introduction.....	8
2.2 Core Arguments vs. Peripheral Arguments	8
2.3 Valency vs. Transitivity	9
2.4 Canonical Transitive vs. Passive and Antipassive.....	11
2.4.1 Payne’s (1982) “Markedness” Tests.....	12
2.4.1.1 Morphological complexity.....	13
2.4.1.2 Textual frequency	16
2.4.1.3 Distribution	20
2.4.1.4 Acquisition.....	21
2.4.2 Gibson and Starosta’s (1990) Transitivity Tests.....	22
2.4.2.1 Morphological criteria	22
2.4.2.1.1 Markedness	22
2.4.2.1.2 Productivity.....	24
2.4.2.1.3 Morphological identification	26
2.4.2.2 Semantic criteria	40
2.4.3 Summary and Remarks on the Transitivity Tests.....	44
2.4.4 More on Transitivity Tests.....	47
2.5 Actancy Structure.....	54
2.5.1 Accusative vs. Ergative.....	55
2.5.2 Active System	72
2.5.3 Tripartite or Three-Way System	76
2.6 Other Uses of the Term “Ergative”.....	77
2.6.1 “Syntactic Ergativity”	78
2.6.2 “Discourse Ergativity”	82
2.6.3 DeLancey’s Definition of “Ergative”	84
2.6.4 “Lexical Ergativity”	84
2.6.5 Summary	87
Chapter 3: Previous Studies of Philippine Type Languages.....	88

3.1	Introduction.....	88
3.2	Verbal Constructions in Philippine-type Languages	90
3.2.1	Verbal Clause Patterns in Philippine-type Languages.....	91
3.2.2	The Forms of Verbs in Formosan and Philippine Languages.....	97
3.2.2.1	Reflexes of PAN <i>*-um-</i> and PMP <i>*maR-</i> and <i>*maN-</i>	99
3.2.2.1.1	Reflexes of PAN <i>*-um-</i> in Formosan languages	100
3.2.2.1.2	Reflexes of PAN <i>*-um-</i> in Philippine languages.....	103
3.2.2.1.3	Reflexes of PMP <i>*maR-</i> in Philippine languages.....	107
3.2.2.1.4	Reflexes of PMP <i>*maN-</i> in Philippine languages.....	122
3.2.2.2	Reflexes of PAN <i>*-en</i>	126
3.2.2.2.1	Reflexes of PAN <i>*-en</i> in Formosan languages.....	127
3.2.2.2.2	Reflexes of PAN <i>*-en</i> in Philippine languages	128
3.2.2.3	Reflexes of PAN <i>*-an</i>	130
3.2.2.3.1	Reflexes of PAN <i>*-an</i> in Formosan languages	131
3.2.2.3.2	Reflexes of PAN <i>*-an</i> in Philippine languages.....	137
3.2.2.4	Reflexes of PAN <i>*Si-</i> and PMP <i>*hi-</i>	137
3.2.2.4.1	Reflexes of PAN <i>*Si-</i> in Formosan languages	138
3.2.2.4.2	Reflexes of PAN <i>*Si-</i> (PMP <i>*hi-</i>) in Philippine languages....	139
3.2.2.5	“Benefactive Focus” verbs in Formosan and Philippine languages.....	140
3.2.2.5.1	“Benefactive Focus” verbs in Formosan languages.....	141
3.2.2.5.2	“Benefactive Focus” verbs in Philippine languages	142
3.3	Three Periods of Linguistic Description of Philippine-type Languages.....	144
3.3.1	The “Traditional” Period: The Passive Analyses.....	145
3.3.2	The “Classical” Period: The “Focus” Analyses.....	153
3.3.3	The “Modern” Period (1): The Ergative Analyses	162
3.3.4	The “Modern” Period (2): The “Active” Analysis	172
3.3.5	The “Modern” Period (3): The “Fluid Voice” Analysis	176
3.3.6	The “Modern” Period (4): The “Hybrid” Analysis.....	193
3.3.7	The “Modern” Period (5): The “Symmetrical Voice” Analysis	205
3.4	Summary	210
Chapter 4: Transitivity and Ergativity in Kavalan.....		211
4.1	Introduction.....	211
4.2	Word Order	212
4.2.1	The Order of Full Noun Phrases	212
4.2.2	The Order of Pronouns and Agreement Forms.....	216
4.2.3	The Order of Elements in Possessive Constructions	218
4.2.4	Word Order in Topicalized Sentences	218
4.2.5	Summary	219
4.3	Construction Markers, Case-Marking System and Agreement System.....	220
4.3.1	Construction Markers.....	220
4.3.1.1	Topic Linker.....	221
4.3.1.2	Ligatures	221

4.3.1.3 Case-marking system for full nouns	223
4.3.1.3.1 <i>na</i> and <i>ni</i> : Genitive determiners or auxiliary nouns??	224
4.3.1.3.2 <i>ya</i> , <i>a</i> , and <i>wa</i> : Nominative determiners or auxiliary nouns?	226
4.3.1.3.3 <i>tu</i> : Oblique determiner or auxiliary noun??	229
4.3.1.3.4 <i>ta</i> : Locative determiner or auxiliary noun??	235
4.3.1.3.5 <i>sa</i> : Locative determiner or auxiliary noun??	238
4.3.1.3.6 Summary	238
4.3.2 Personal Pronouns and Agreement Systems	239
4.3.2.1 Kavalan personal pronouns	240
4.3.2.2 The Kavalan agreement system	243
4.4 Transitivity in Kavalan Verbal Clauses	246
4.4.1 Kavalan Verbal Clause Patterns	246
4.4.2 Three Proposals Concerning Kavalan Transitivity and Actancy	250
4.4.3 An Evaluation of Previous Analyses	252
4.4.3.1 Nominal case-marking	253
4.4.3.2 Agreement	255
4.4.3.3 Semantic transitivity	257
4.4.4 Summary	260
4.5 Ergativity	261
4.6 “Syntactic Ergativity”	262
4.7 Conclusion	266
Chapter 5: Transitivity and Ergativity in Atayal	268
5.1 Introduction	268
5.2 Word Order	269
5.2.1 The Order of Full Noun Phrases	270
5.2.2 The Order of Pronouns	282
5.2.3 The Order of Elements in Possessive Constructions	296
5.2.4 Word Order in Topicalized Sentences	298
5.2.5 Summary	299
5.3 Construction Markers and Case-Marking System	300
5.3.1 Construction Markers	301
5.3.1.1 Topic Linker	301
5.3.1.2 Ligatures	302
5.3.1.3 Case-marking system for full nouns	306
5.3.1.3.1 <i>qu?</i> : Nominative determiner, definite determiner, and/or noun?	308
5.3.1.3.2 <i>na?</i> and <i>nqu?</i> : Genitive determiners and/or nouns??	316
5.3.1.3.3 <i>sa</i> and <i>squ?</i> : Locative determiners and/or nouns??	320
5.3.1.3.4 <i>te</i> and <i>ci</i> : Locative determiners or nouns??	322
5.3.1.3.5 <i>ki</i> : Comitative determiner or noun??	324
5.3.1.3.6 Summary	325
5.3.2 The Squaliq Atayal Personal Pronoun System	327
5.4 Transitivity in Atayal Verbal Clauses	334

5.4.1	Atayal Verbal Clause Patterns	334
5.4.2	Three Proposals Concerning Atayal Transitivity and Actancy.....	339
5.4.3	An Evaluation of Previous Analyses	343
5.4.3.1	Nominal case-marking and agreement.....	344
5.4.3.2	Semantic transitivity	348
5.4.3.3	Transitivity in grammar and discourse	353
5.4.4	Summary	354
5.5	Ergativity.....	354
5.6	Conclusion	356
Chapter 6:	Transitivity and Ergativity in Central Cagayan Agta.....	359
6.1	Introduction.....	359
6.2	Word Order.....	360
6.2.1	The Order of Full Noun Phrases and Demonstrative Pronouns.....	360
6.2.2	The Order of Personal Pronouns.....	367
6.2.3	The Order of Elements in Possessive Constructions	370
6.2.4	Word Order in Topicalized Sentences	372
6.2.5	Summary	374
6.3	Construction Markers and Case-Marking System	375
6.3.1	Construction Markers.....	375
6.3.1.1	Ligatures	375
6.3.1.2	Deictic elements: Deictic determiners, locative adverbs, and demonstrative pronouns	377
6.3.1.2.1	Deictic determiners and locative adverbs	377
6.3.1.2.2	Demonstrative pronouns and locative adverbs	380
6.3.1.2.3	Summary	385
6.3.1.3	Case-marking system for full nouns	387
6.3.1.3.1	<i>ya, i, ig</i> : Nominative determiners or nouns??	388
6.3.1.3.2	<i>na, ni, nig</i> : Genitive determiners or nouns??	395
6.3.1.3.3	<i>ta, te, teg</i> : Locative/Oblique determiners or nouns??	398
6.3.1.3.4	Summary	401
6.3.2	The Central Cagayan Agta Personal Pronoun System.....	402
6.3.2.1	Genitive personal pronouns	404
6.3.2.2	Nominative personal pronouns	410
6.3.2.3	Topic/predicate personal pronouns	412
6.3.2.4	Locative personal pronouns	413
6.3.2.5	Pronominal clitics or agreement features?.....	415
6.4	Transitivity in Central Cagayan Agta Verbal Clauses.....	429
6.4.1	Central Cagayan Agta Verbal Clause Patterns	429
6.4.2	Three Possible Analyses Concerning Central Cagayan Agta Transitivity and Actancy	435
6.4.3	Morphosyntactic and Semantic Properties of Central Cagayan Agta Verbal Clauses	439
6.4.3.1	Nominal case-marking.....	440

6.4.3.2 Agreement.....	442
6.4.3.3 Semantic transitivity	443
6.4.3.4 Summary	448
6.5 Ergativity	449
6.6 Conclusion	451
Chapter 7: Transitivity and Ergativity in Dibabawon Manobo	453
7.1 Introduction	453
7.2 Word Order	454
7.2.1 The Order of Full Noun Phrases	454
7.2.2 The Order of Pronouns.....	459
7.2.3 The Order of Elements in Possessive Constructions	468
7.2.4 Word Order in Topicalized Sentences	469
7.2.5 Summary	471
7.3 Construction Markers, Case-Marking System, and Agreement System.....	473
7.3.1 Construction Markers.....	473
7.3.1.1 Ligatures	473
7.3.1.2 Case-marking system for full nouns	475
7.3.1.2.1 <i>kan</i> : Determiner or auxiliary noun??	476
7.3.1.2.2 <i>to</i> : Determiner or auxiliary noun??	480
7.3.1.2.3 <i>si</i> and <i>osi</i> : Nominative determiners or auxiliary nouns??	484
7.3.1.2.4 <i>ni</i> and <i>oni</i> : Genitive determiners or auxiliary nouns??	487
7.3.1.2.5 <i>ki</i> and <i>ongki</i> : Oblique determiners or auxiliary nouns??	489
7.3.1.2.6 Summary	491
7.3.2 The Dibabawon Manobo Personal Pronoun System	492
7.3.2.1 Genitive pronouns	494
7.3.2.2 Nominative pronouns.....	495
7.3.2.3 Free form neutral pronouns.....	500
7.3.2.4 Full form nominative pronouns	503
7.3.2.5 Summary	504
7.4 Transitivity in Dibabawon Manobo Verbal Clauses.....	506
7.4.1 Dibabawon Manobo Verbal Clause Patterns	507
7.4.2 Three Possible Analyses Concerning Dibabawon Manobo Transitivity and Actancy	511
7.4.3 Morphosyntactic and Semantic Properties of Dibabawon Manobo Verbal Clauses	515
7.4.3.1 Nominal case-marking	516
7.4.3.2 Semantic transitivity	518
7.4.3.3 Summary	522
7.5 Ergativity.....	523
7.6 Conclusion	524
Chapter 8: Conclusion.....	527
8.1 Summary	527

8.2 Directions for Future Research	531
Appendix 1: Sources for Information Used in Section 3.2.2	533
References	539

LIST OF TABLES

<u>Table</u>	<u>Page</u>
1.1 Sources of Language Data	4
2.1 Markedness Tests (Payne 1982)	12
2.2 Verbal Clause Patterns in Polynesian Languages	13
2.3 Frequency of Canonical Transitive and Antipassive	16
2.4 Frequency of Canonical Transitive and Passive	17
2.5 Markedness Tests (Gibson and Starosta 1990).....	23
2.6 Productivity Tests	25
2.7 Derivation of Tagalog Verbs	26
2.8 Verbal Clause Patterns in Ilokano.....	28
2.9 Parameters of Transitivity	41
2.10 Transitivity Tests	45
2.11 Accusative versus Ergative Systems.....	55
2.12 Active System	72
2.13 Tripartite or Three-Way System	76
3.1 Verbal Clause Patterns in Philippine-Type Languages	92
3.2 Active vs. Stative Affixes in Tagalog	173
3.3 No Noun/Verb Distinction in Tagalog Root Forms.....	177
3.4 Examples of Marked and Unmarked Correlations.....	182
3.5 Typology based on Movement Possibilities and Case.....	198
4.1 Previous Analyses of Kavalan Case-Marking System.....	224

4.2	Kavalan Case-Marking System.....	239
4.3	Personal Pronouns in Kavalan	240
4.4	Genitive Pronouns and Their Related Verb Agreement Forms	244
4.5	Three Verbal Clause Patterns in Kavalan	247
4.6	Kavalan as an Accusative Language.....	252
4.7	Kavalan as a Split-Ergative Language.....	252
4.8	Kavalan as an Ergative Language.....	252
4.9	Kavalan Actancy Structure	262
5.1	Previous Analyses of Atayal Case-Marking “Determiners”.....	307
5.2	Squliq Atayal Case-Marking System.....	325
5.3	Personal Pronouns in Squliq Atayal	327
5.4	Verbal Clause Patterns in Squliq Atayal.....	335
5.5	Squliq Atayal as an Accusative Language.....	340
5.6	Squliq Atayal as a Split-Ergative Language	341
5.7	Squliq Atayal as an Ergative Language	342
5.8	Squliq Atayal Actancy Structure	356
6.1	Central Cagayan Agta Deictic Determiners/Locative Adverbs	378
6.2	Previous Analyses of Central Cagayan Agta Demonstratives.....	381
6.3	Central Cagayan Agta Demonstrative Pronouns	387
6.4	Previous Analyses of Central Cagayan Agta Case-Marking Particles	387
6.5	Central Cagayan Agta Case-Marking System	402
6.6	Personal Pronouns in Central Cagayan Agta.....	403

6.7	Verbal Clause Patterns in Central Cagayan Agta	430
6.8	Central Cagayan Agta as an Accusative Language	436
6.9	Central Cagayan Agta as a Split-Ergative Language.....	437
6.10	Central Cagayan Agta as an Ergative Language.....	438
6.11	Central Cagayan Agta Actancy Structure	450
7.1	Previous Analyses of Dibabawon Manobo Case-Marking System	476
7.2	Dibabawon Manobo Case-Marking System	492
7.3	Previous Analyses of Personal Pronouns in Dibabawon Manobo	493
7.4	Personal Pronouns in Dibabawon Manobo.....	505
7.5	Verbal Clause Patterns in Dibabawon Manobo	508
7.6	Dibabawon Manobo as an Accusative Language	512
7.7	Dibabawon Manobo as a Split-Ergative Language	513
7.8	Dibabawon Manobo as an Ergative Language	514
7.9	Dibabawon Manobo Actancy Structure.....	524

LIST OF FIGURES

<u>Figure</u>	<u>Page</u>
1.1 The Linguistic Positions of Kavalan, Atayal, Central Cagayan Agta, and Dibabawon Manobo.....	3
2.1 Semantic Transitivity vs. Morphosyntactic Transitivity.....	44
2.2 The Nominal Hierarchy	64
3.1 Typological Status of Philippine-Type Languages.....	191
3.2 Structure for Transitive Sentences	196

LIST OF ABBREVIATIONS

?	agreement feature	[-DIR]	non-directional
[+DIR]	directional	[+PRSN]	personal
1D	first person dual	1PE	first person plural exclusive
1PI	first person plural inclusive	1S	first person singular
2P	second person plural	2S	second person singular
3P	third person plural	3S	third person singular
ABL	ablative	ABS	absolutive
ACC	accusative	ACT	active
Adv	Adverb	AF/AF	Actor/Agent Focus
ANTIP	antipassive	AS	anticipating sequence
ASP	aspect	ASS	associate
AUX	auxiliary verb	BF/BF	Benefactive/Beneficiary Focus
CAUS	causative	COMP	completive
CONJ	conjunction	COP	copula
DAT	dative	DEC	declarative
DEF	definite	DEM	demonstrative
DET	determiner	DIR	directional
DIST.IMPRF	distal imperfective	dl.	dual
DS	different subject	EMPH	emphatic
ERG	ergative	ex.	exclusive
EXIST	existential	FEM	feminine
FUT	future	GEN	genitive
GER	gerund	GF/GF	Goal Focus
IF/IF	Instrument(al) Focus	IMP	imperative
in.	inclusive	IND	indicative
INJ	interjection	INTR./Intr.	intransitive
IRR	irrealis	LCV	locative
LF/LF	Locative/Location Focus	LIG	ligature
MASC	masculine	NEG	negative
MOD	modalis (case)	NEG(PROHIB)	negative (prohibitive)
NEG.EXIST	negative existential	NOM	nominative
NOMI	nominalization	NP	Noun Phrase
NON-FUT	non-future	NR	nominalizer
OBL	oblique	PART	participle
PASS	passive	PERF/PRF	perfect(ive)
PL/pl.	plural	POSS	possessive
PRED	predicate	PRES	present
PROX.IMPRF	proximal imperfective	PST	past
PTC	particle	Q	question marker
QUOT	quotative	REAL	realis
REC	reciprocal	REL	relative clause marker

REPORT.SP reported speech
SEQ sequential adverb
SPEC specific
TOP topic
TR./Tr. transitive

RHETORIC.NEG rhetoric negative
SG/sg. singular
SURP surprise
TP.LK topic linker
V Verb

CHAPTER 1

INTRODUCTION

1.1 INTRODUCTION

The typological classification of Formosan and Philippine languages has been a matter of controversy in linguistic literature. They have been variously analyzed as having an accusative (Bloomfield 1917, 1942; F. Blake 1906a, 1906b, 1917, 1925; Egerod 1965, 1966, 1978; Wolff 1973, 1979; Rau 1992; etc.), active (Drossard 1984, 1994), ergative (Payne 1982; Gerdts 1988; De Guzman 1988; B. Blake 1988; Gibson and Starosta 1990; Starosta 1986, 1988, 1995, 1997, 1998, 1999, 2002b; Mithun 1994; Brainard 1994a, 1996, 1997; Rubino 2000; Gault 1999a, Gault 1999b, Gault 2002; Reid and Liao 2004a, 2004b; etc.), or hybrid (Maclachlan 1996) case-marking system, or having a fluid voice (Shibatani 1988, 1999, 2001), or a symmetrical voice system (Foley 1998). These different conclusions stem from the fact that there are at least two (and sometimes more) SEMANTICALLY transitive clause patterns, i.e., clauses with at least two arguments, that are ambiguous regarding SYNTACTIC transitivity.

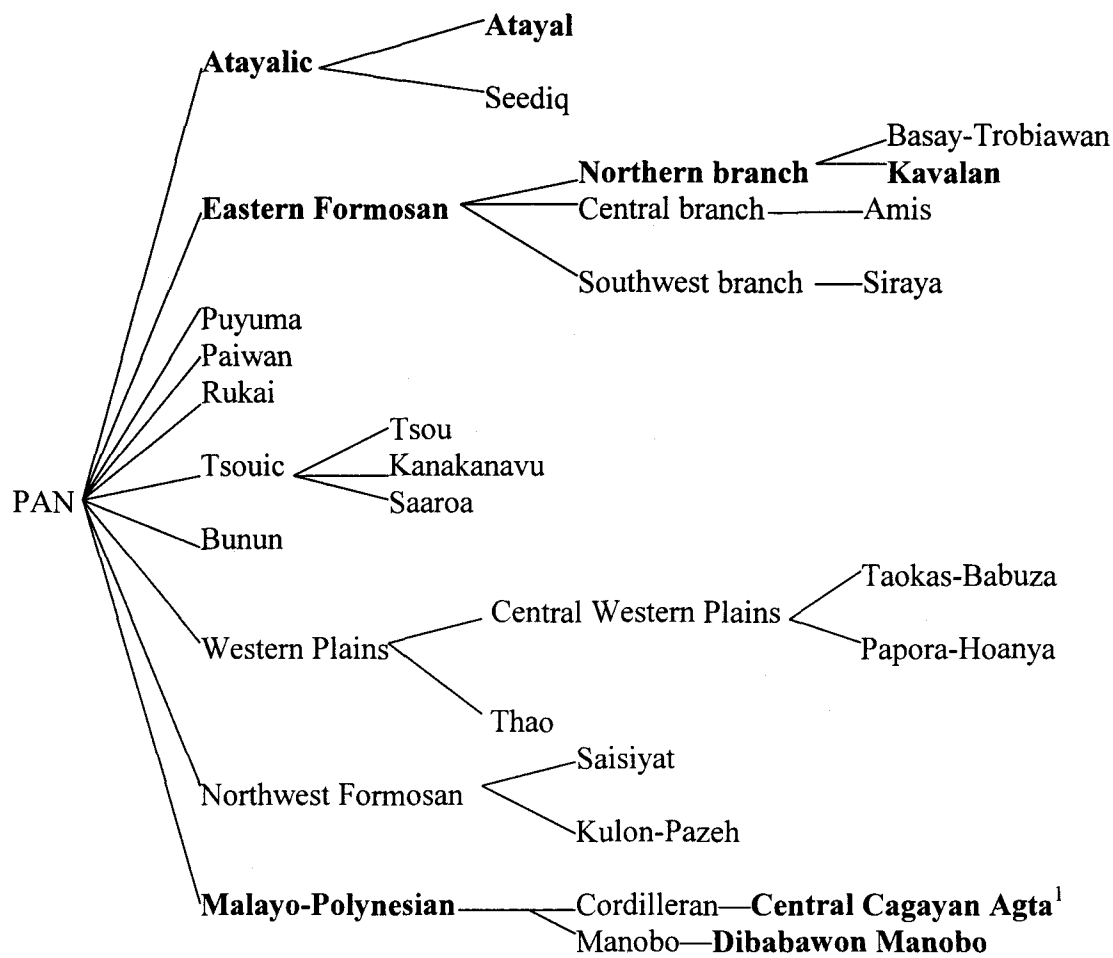
This dissertation provides a small-scale preliminary comparison of the syntactic typology of Formosan and Philippine languages. It aims to provide a clear statement of the typological status of Formosan and Philippine languages. In order to achieve this goal, I examine the clause structure in Formosan and Philippine languages from a broad typological perspective. Specifically, I compare the morphosyntactic features exhibited in Formosan and Philippine languages with those found in languages that have been

unambiguously identified as having an ergative actancy structure. Based on the results of the cross-linguistic comparison, I offer a clear statement of the typological status of Formosan and Philippine languages.

1.2 SOURCES OF LANGUAGE DATA

In this study, clause structures of two Formosan languages (Atayal and Kavalan) and two Philippine languages (Central Cagayan Agta and Dibabawon Manobo) are examined. These four languages are chosen as the objects of investigation for the following two reasons. First, each of the four languages has texts available for conducting this research. Second, geographically and genetically speaking, these four languages represent the great linguistic diversity of Formosan and Philippine languages. More specifically, they are spoken in geographically widely separate areas, with Atayal spoken in the northern mountain area of Taiwan, Kavalan in the east coast area of Taiwan, Central Cagayan Agta in the northern part of the island of Luzon (the Philippines), and Dibabawon Manobo in the southeastern part of the island of Mindanao (the Philippines). Moreover, according to Blust's recent subgrouping hypothesis (1999a, 1999b), these four languages represent three of the ten first-order subgroups of Austronesian languages.

FIGURE 1.1 THE LINGUISTIC POSITIONS OF KAVALAN, ATAYAL, CENTRAL CAGAYAN AGTA, AND DIBABAWON MANOBO (BASED ON BLUST 1977, 1999A, 1999B)



As shown in figure 1.1, the two Formosan languages Kavalan and Atayal represent the Eastern Formosa and the Atayalic primary subgroups respectively, and the two

¹ Due to space limitation, I eliminate the subgrouping details between the Malayo-Polynesian primary branch and the Cordilleran and Manobo microgroups.

Philippine languages represent the Malayo-Polynesian primary subgroup.² Moreover, the two Philippine languages represent two of the fifteen Philippine microgroups, i.e., the Cordilleran microgroup (represented by Central Cagayan Agta) and the Manobo microgroup (represented by Dibabawon Manobo),³ that have been independently acknowledged by a number of linguists (see Blust 1991:77–85 for details).

The language data used in this study are primarily from published text material, as listed below in table 1.1. Unless otherwise indicated, the data used for individual language study are based on these published texts. All examples taken from texts are indicated by text code and sentence number.

TABLE 1.1 SOURCES OF LANGUAGE DATA

LANGUAGE NAME	DATA SOURCES
Squliq Atayal	Huang (1993, 1994)
Kavalan	Li (1996a)
Central Cagayan Agta	Mayfield (1987)
Dibabawon Manobo	Forster and Barnard (1987)

Text material is chosen as the major source of the study for two reasons. First, data acquired through elicitation without contexts has been criticized for analyzing language without considering appropriate contexts. By using textual data, one can avoid this kind

² Although the assumption that all the Austronesian languages spoken outside of Taiwan form a single FIRST-ORDER subgroup of Austronesian, named Malayo-Polynesian, has been challenged by Harvey (1982), Reid (1982), and Starosta (1995, 2002a), it is not crucial to the synchronic description here. Therefore, I will not go into details of the debate here.

³ Based on replacement innovations in the lexicon, lexical and semantic innovations which cannot be shown to involve replacement, and the merger of Proto-Austronesian *g and *R, Blust (1991:73, 96–97) proposes that Tagalog, Bikol, the Bisayan complex, South Mangyan (but not North Mangyan), the Palawan languages (but not Kalamian), all of the languages of Mindanao (which include the Manobo languages) except the South Mindanao group, and the Gorontalo-Mongondow languages of Sulawesi (but not the more northerly Sangiric and Minahasan languages) constitute a single subgroup, the “Greater Central Philippines” subgroup, of Philippine languages.

of criticism. Second, the definiteness of noun phrases is typically crucial in determining the transitivity of clauses in Formosan and Philippine languages. The use of texts is a good way to determine the definiteness of noun phrases.

1.3 THE ORGANIZATION OF THE DISSERTATION

This dissertation consists of eight chapters. Chapter 1 is the introduction, Chapter 2 provides the theoretical orientation, Chapter 3 describes and evaluates previous analyses, while Chapters 4–7 cover the discussion of transitivity and ergativity in individual Formosan and Philippine languages. Chapter 8 is the conclusion.

Following the introduction in Chapter 1, Chapter 2 gives a brief orientation of the theoretical framework employed in this study. All data analyses are conducted within a revised version of Dixon's Basic Linguistic Theory. Some notions that are crucial to the discussion of clause structure in Formosan and Philippine languages are provided in this chapter. Important notions covered in this chapter include: (i) core arguments vs. peripheral arguments (or adjuncts), (ii) valency vs. transitivity, (iii) canonical transitive, passive, and antipassive, (iv) actancy structure, and (v) the various uses of the term "ergative," such as "syntactically ergative," "discourse ergative," and "lexically ergative."

Chapter 3 gives a critical review of previous analyses of so-called "Philippine type languages". In order to discuss various types of previous analyses, this chapter first examines verbal clause patterns in these languages. In discussing verbal clause patterns, the forms and functions of the reflexes of PAN **-um-*, **-en*, **-an*, **Si-*, (and PMP **maR-*

and PMP **maN-*) in Formosan and Philippine languages are discussed. Then, a discussion of seven different types of analyses appearing in three descriptive periods (i.e., the “traditional” period, the “classical” period, and the “modern” period) is provided. These include: (i) the “traditional” period: the passive analyses, (ii) the “classical” period: the “focus” analyses, and (iii) the “modern” period: the ergative analyses, the active analysis, the “fluid voice” analysis, the “hybrid” analysis, and the “symmetrical voice” analysis.

Chapters 4–7 deal with clause structures in Kavalan, Atayal, Central Cagayan Agta, and Dibabawon Manobo, respectively. Each of these four chapters begins with a brief introduction to the languages, such as where the language is spoken, the total number of speakers, and the linguistic position of each of the languages within the Austronesian language family. After the introduction, some of the basic morphosyntactic facts, such as word order, construction markers, and the pronominal system, of each individual language are provided to facilitate the discussion of transitivity and actancy in each language. The discussion of word order includes the order of full noun phrases, the order of pronominals, and the order of elements in possessive constructions and topicalized constructions. After the discussion of word order, a discussion of various construction markers (including topic linkers, ligatures, and so-called case-marking “determiners”) and the pronominal system (and the pronominal-related agreement system) is provided. The categorical status of so-called case-marking “determiners” is discussed, if relevant. The main part of each of these chapters focuses on the correlations between semantic

properties and morphosyntactic transitivity, and how they may affect the determination of actancy structures of each language.

Chapter 8 summarizes the present study and suggests directions for future research.

CHAPTER 2

THEORETICAL ORIENTATION

2.1 INTRODUCTION

In this study, I employ a revised version of Dixon's Basic Linguistic Theory to describe the clause structure in Formosan and Philippine languages. Some notions that are crucial to the discussion of Formosan and Philippine clause structures are discussed in this chapter. Section 2.2 distinguishes core arguments from peripheral arguments (or adjuncts). Section 2.3 distinguishes valency from transitivity. Section 2.4 deals with canonical transitives, passives, and antipassives. The discussion in this section will focus on the morphological, syntactic, and semantic tests for distinguishing canonical transitive constructions from antipassives and passives. Section 2.5 discusses actancy structure (accusative, ergative, active, and tripartite systems). Section 2.6 covers various uses of the term "ergative," such as "syntactic ergativity," "discourse ergativity," and "lexical ergativity".

2.2 CORE ARGUMENTS VS. PERIPHERAL ARGUMENTS

Basic Linguistic Theory as outlined in Dixon (1979, 1994) and Dixon and Aikhenvald (2000) distinguishes core arguments from peripheral arguments (also called "adjuncts"). The occurrence of core arguments is determined by the head (usually a verb) of a clause. The core arguments must be stated (or be understood from the context) for a clause to be acceptable. The occurrence of peripheral arguments or adjuncts is less

dependent on the nature of the head of a clause; they may optionally be included to indicate place, time, cause, purpose, and so on.

Four core arguments (S, A, O, and E) can be distinguished and will be defined as follows in this study.¹ A is the more active core argument of a canonical transitive verb; O is the less active core argument of a canonical transitive verb; S is the sole argument of a canonical intransitive verb, or the core argument of a dyadic intransitive verb that has the same morphological marking as the sole argument of a canonical intransitive verb; E (stands for “extension to core”) is the second core argument of a dyadic intransitive verb, and which does not have the same morphological marking as the sole argument of a canonical intransitive verb.

2.3 VALENCY VS. TRANSITIVITY

Dixon and Aikhenvald (2000:3) emphasize the difference between “valency,” which has to do with the number of core arguments that a verb takes, and “transitivity,” which has to do with whether those arguments include S, A, O, and/or E. A verb that takes just one core argument is called monadic or monovalent; one that takes two core arguments is called dyadic or bivalent; one that takes three core arguments is called triadic or trivalent. A verb that takes two core arguments can be either transitive or intransitive, depending on whether the core arguments include A and O, or S and E, as in (1)b and (1)c. The interaction between valency and transitivity is summarized in (1).

¹ The definitions of the four core arguments used in this study are somewhat different from those of Dixon and Aikhenvald (2000:3). Dixon and Aikhenvald make use of terms such as “subject,” “object,” “indirect object” to define the four core arguments. In this study, I refrain from the use of these terms because of the multiple ambiguities involved in their interpretation.

(1) valency vs. (in)transitivity:

- a. canonical/plain intransitive S
- b. extended intransitive S E
- c. canonical/plain transitive A O
- d. extended transitive A O E

(1)a is a canonical or plain intransitive structure that takes one core argument S. (1)b and (1)c are both dyadic, but they differ in terms of transitivity: (1)b is an extended intransitive structure that takes the core arguments S and E, whereas (1)c is a canonical or plain transitive structure that takes the core arguments A and O. (1)d is a triadic extended transitive structure that takes three core arguments A, O, and E. The difference between a dyadic canonical transitive clause and a dyadic extended intransitive clause can be illustrated with the following pair of examples. As shown in (2), the verbs in this pair of sentences are both dyadic because they each take two core arguments. However, only the verbs in (2)a is transitive, because only it takes the core arguments A and O.

(2) dyadic transitive vs. dyadic intransitive:

- a. DYADIC TRANSITIVE:
Harry hit the ball.
A Tr. O
- b. DYADIC INTRANSITIVE:
Harry hit at the ball.
S Intr. E

Although Dixon and Aikhenvald stress the significance of distinguishing valency from transitivity, they do not explicitly state how to distinguish a dyadic transitive verb from a dyadic intransitive verb. To make this distinction, I incorporate morphological,

syntactic, and semantic properties into the definition of transitivity. In this study, transitivity is considered to reflect not only the number of core arguments, but also a combination of semantic, morphological, and syntactic factors. A transitive verb is a verb that has two or more core arguments and that exhibits the relevant morphological, semantic, and syntactic signs of transitivity. An intransitive verb is a verb that has one (or more) core arguments and that exhibits the relevant morphological, semantic, and syntactic signs of low transitivity or intransitivity.

2.4 CANONICAL TRANSITIVE VS. PASSIVE AND ANTIPASSIVE

As already mentioned in section 2.3, the notion of “transitivity” is related not only to the number of core arguments that a verb takes, but also to the morphosyntactic and semantic properties that a clause exhibits. To distinguish a canonical transitive from a passive and an antipassive, it is necessary to look at the interaction between these properties. In this section, I discuss morphological, syntactic, and semantic criteria that can be used for distinguishing unmarked or canonical transitive constructions from marked constructions, such as passives and antipassives. First, the markedness tests proposed by Payne (1982) and the transitivity tests proposed by Gibson and Starosta (1990) will be evaluated in terms of their validity and/or applicability in sections 2.4.1 and 2.4.2 respectively. Then, a summary of the applicability of these tests will be presented in section 2.4.3. Finally, some additional transitivity tests will be provided in section 2.4.4.

2.4.1 Payne's (1982) "Markedness" Tests

Comrie (1978:368) suggests that "markedness" of PATIENT-PROMINENT constructions (i.e., constructions in which PATIENTS are syntactically more prominent than AGENTS, and which typically refer to passive and ergative constructions) can be used to distinguish an ergative from a nonergative system. If a PATIENT-PROMINENT construction is unmarked, then the system is ergative; if it is marked, then the system is nonergative. Based on the criteria that Comrie (1978) and Givón (1979:58) used for characterizing the "markedness" nature of English passives, Payne (1982:96–98) lists four tests for identifying the more marked construction (typically referring to the passive construction in accusative languages and the antipassive construction in ergative languages) in a given language. These tests are summarized in table 2.1.

TABLE 2.1. MARKEDNESS TESTS (PAYNE 1982: 96–98)

	LESS MARKED	MORE MARKED
VERBAL MORPHOLOGY	less complex	more complex
TEXTUAL FREQUENCY	higher textual frequency	lower textual frequency
DISTRIBUTION	less limited distribution	more limited distribution
ACQUISITION	early acquisition	late acquisition

As shown in table 2.1, the more-marked construction is expected to have more complex verbal morphology, lower textual frequency, more limited distribution, and to be acquired later than the less-marked construction. However, if we examine the tests carefully, we will find that NOT ALL tests are EQUALLY applicable to all languages. Problems may arise when one tries to apply some of the tests to the language(s) that one investigates.

In what follows, I will discuss the applicability of these tests.

2.4.1.1 Morphological complexity

First, let us consider the morphological complexity test. According to the morphological complexity test, the more marked construction is expected to have more complex verbal morphology than the less marked construction. Cross-linguistic evidence suggests that this is not a good test for distinguishing the more marked construction from the less unmarked construction. The (ergative) Polynesian languages provide good evidence for the claim that it is not a good test.

Let us look at the clause patterns in the Polynesian language family.

Modern Polynesian languages typically exhibit the following three verbal clause patterns, as shown in table 2.2 (Clark 1973, 1976; Chung 1978; Gibson and Starosta 1990; Ota 1999; Kikusawa 2002).

TABLE 2.2. VERBAL CLAUSE PATTERNS IN POLYNESIAN LANGUAGES

Pattern 1: V		NP agent/theme	
Intr.		S	
Pattern 2: V		NP agent	<i>ilki</i> NP theme, location, etc.
Intr. or Tr.?		S or A?	E or O?
Pattern 3: V(Cia)	<i>e</i>	NP agent	NP theme
Intr. or Tr.?		Obl or A?	S or O?

Pattern 1 is clearly a canonical intransitive construction, but pattern 2 and pattern 3 are either transitive or intransitive depending on whether the language is ergative or accusative. In the accusative Polynesian languages (such as Hawaiian, Tahitian, etc.), pattern 2 is a canonical transitive construction and pattern 3 is a passive construction.

However, in the ergative Polynesian languages (such as Tongan, Samoan, Niuean, etc.), the situation is totally different: pattern 2 is an antipassive construction (including the so-called “middle” construction) and pattern 3 is a canonical transitive construction.²

As shown in (3)a and (4)a, pattern 2 (the bare verb pattern) is a canonical transitive pattern in Hawaiian (an accusative Polynesian language), whereas it is an antipassive pattern in Samoan (an ergative Polynesian language). Consider (3)b and (4)b, pattern 3 (the *Cia* pattern) is a passive pattern in Hawaiian, but it is a canonical transitive pattern in Samoan.

(3) Hawaiian (data from Ota 1999:41–42)

a. pattern 2: canonical transitive

Ua	‘ike	‘o	Pua	i	ka	wahine.
COMP	see	NOM	Pua	ACC	the	woman
AUX	TR.		A		O	

‘Pua saw the woman.’

b. pattern 3: passive

Ua	‘ike‘ <i>ia</i>	ka	wahine	e	Pua.
COMP	see- <i>Cia</i>	the	woman	OBL	Pua
AUX	INTR.(PASS)		S		

‘The woman was seen by Pua.’

² In the traditional literature on syntactic description, the term “middle” is used for “a construction that stands midway between the active and passive”. In the “middle” construction, the referent of the subject both instigates and is affected by the action denoted by the verb (Croft 1991:248; Kemmer 1993:16). More recently, the term “middle” has been extended to include the following patterns in English: *Bureaucrats bribe easily. The bread won’t cut. Cotton washes well.* The English “middle” patterns resemble passives in being derived from transitive verbs and in upgrading the theme argument to subject. However, unlike passives, they do not have passive morphology and do not permit an oblique agent (O’Grady 2003:128). In Polynesian literature, the term “middle” is used in another sense. It refers to “a construction that stands midway between the transitive and intransitive”. Polynesian “middles” are constructions that take so-called “middle verbs,” which typically describe events that do not affect the “direct object” immediately. The “middle verbs” in most Polynesian languages include perception verbs (such as ‘see’, ‘listen to’), verbs of emotion and other psychological states (such as ‘love’, ‘want’, ‘understand’), verbs normally selecting animate “direct objects,” including some communication verbs (such as ‘meet with’, ‘help’, ‘call’), verbs such as ‘follow’, ‘wait for’ and ‘visit’ (Chung 1978:47).

(4) Samoan (data from Ota 1999:41–42)

a. pattern 2: antipassive

Sā	va'ai	Tai	i	le	fahine.
PST	see	Tai	OBL	the	woman
AUX	INTR.(ANTIP)	S			E

'Tai saw the woman.'

b. pattern 3: canonical transitive

Sā	va' <i>aina</i>	e	Tai	le	fahine.
PST	see- <i>Cia</i>	ERG	Tai	the	woman
AUX	TR.	A			O

'Tai spotted the woman.'

Applying the morphological complexity test to the ergative Polynesian languages, one might conclude that pattern 2 is an unmarked construction (i.e., canonical transitive), whereas pattern 3 (the *-Cia* construction) would be a marked construction (i.e., passive). However, such a conclusion would contradict the results that one can obtain from other morphological tests (such as text frequency) and syntactic tests.

Moreover, considering the morphological complexity test from a diachronic perspective, one will find that it is not a good test. In the study of the diachronic development of actancy systems, it is commonly assumed that an actancy change typically involves the reinterpretation of a formerly marked construction (such as a passive) as an unmarked construction (see Anderson 1977; Trask 1979; Estival and Myhill 1988; Dixon 1994; Siewierska 1998). Applying the morphological complexity test to a subgroup consisting of both accusative and ergative languages, one may have a problem in correctly identifying the canonical transitive construction in one of the two groups of languages, just as in the Polynesian case.

2.4.1.2 Textual frequency

Second, let us consider the textual frequency test. According to this test, the more marked construction is expected to have lower textual frequency than the less marked construction. This appears to be true cross-linguistically (see Svartvik 1966; Givón 1979; Comrie 1981; Cooreman et al. 1984; Shibatani 1988; Tsunoda 1994).

Tsunoda (1994) surveys the relative frequency of transitive and passive in two accusative languages (English and Japanese) and that of transitive and antipassive in three ergative languages (Warrungu, Dyirbal, and Kalkatungu). His study shows that the less marked construction occurs much more frequently than the more marked construction in the texts.³ That is, the canonical transitive construction occurs much more frequently than the antipassive construction in ergative languages, and the canonical transitive construction occurs much more frequently than the passive construction in accusative languages. The result of his study is summarized in tables 2.3 and 2.4 (Tsunoda 1994:39).

TABLE 2.3. FREQUENCY OF CANONICAL TRANSITIVE AND ANTIPASSIVE

	TRANSITIVE (LESS MARKED)	ANTIPASSIVE (MORE MARKED)	TOTAL
WARRUNGU	1264 (84.6%)	230 (15.4%)	1494 (100%)
DYIRBAL	104 (83.2%)	21 (16.8%)	125 (100%)
KALKATUNGU	67 (79.8%)	17 (20.2%)	84 (100%)

³ The data that Tsunoda (1994) used for his textual analysis are from the following sources:

Warrungu: approximately a third of Tsunoda's six hours of texts.

(a) Dyirbal: the first two of the three texts in Dixon (1972).

(b) Kalkatungu: all of the seven texts in B. Blake (1979).

(c) English: texts in Miyake (1986).

(d) Japanese: texts in Inoue (1986), Hirai (1986), and Mizutani (1986).

TABLE 2.4. FREQUENCY OF CANONICAL TRANSITIVE AND PASSIVE

	TRANSITIVE (LESS MARKED)	PASSIVE (MORE MARKED)	TOTAL
ENGLISH	299 (90.9%)	30 (9.1%)	329 (100%)
JAPANESE	346 (94.8%)	19 (5.2%)	365 (100%)

One interesting result to be noted from tables 2.3 and 2.4 is that antipassives appear to have higher textual frequency compared to passives. Whether this is related to the discourse and/or syntactic functions of these two construction types is an interesting question to pursue. I will not go into detail here.

Although the textual frequency test appears to be a reliable test cross-linguistically, one needs to be careful when implementing it. Two factors should be considered when one employs the textual frequency test: (i) genre, and (ii) construction type.

Let us consider the significance of genre in the study of textual frequency.

According to Svartvik (1966), Shibatani (1988), Duranti (1994), and Reid (2002a), textual frequency may vary depending on the genres of texts. In his corpus of English writing in the learned sciences, Svartvik (1966:46) finds that 32% of the sentences are passives whereas 68% are actives. On the other hand, in novels, only 5–7% of the sentences are passives, but 73–95% are actives. Similar results are reported in Shibatani's (1988:95) study of Japanese passives. He reports that passives account for 25–32% of the sentences in newspapers and in scientific writings, but only 5–7% in novels and essays. Reid (2002a) reports that 70–80% of the verbal constructions in Bontok “procedural” texts are transitive, whereas only 40–50% of the verbal constructions in Bontok “activity” texts (and many “narrative” texts) are transitive.

Duranti (1994: 24–25) states that in Samoan sentences with two overt arguments (one of which is marked by the ergative preposition *e*) may occur frequently in elicitation, but they are rare in spoken discourse. He reports that only ONE occurrence of an ergative Agent is found in an intense fifteen-minute conversation mostly between two people and claims that the use of ergativity in Samoan seems relatively rare in spoken discourse.

Although Duranti's observation about the fact that genres play an important role in textual frequency may be true, his claim about the rare use of ergativity in Samoan spoken discourse may not be accurate. One problem that I found in Duranti's discussion of rarity of ergativity in Samoan spoken discourse is that he only mentions the occurrence of ERGATIVE-MARKED NPs, rather than the occurrence of ERGATIVE CLAUSES. It is not clear whether his statement only reflects the overall occurrence of ERGATIVE NPs, or whether it also reflects the overall occurrence of ERGATIVE CLAUSES. It seems to me that it is very probable that he only discusses the overall distribution of ergative NPs rather than that of ergative clauses.

If we assume that the total number of ergative-marked NPs appearing in a text is NOT equal to the total number of ergative clauses appearing in a text, then how can we explain the fact that the ergative-marked NP rarely occurs in Samoan spoken discourse? The Preferred Argument Structure proposed by J. Du Bois (1987:817–827) appears to offer a good explanation for it.

According to J. Du Bois, the Preferred Argument Structure (PAS hereafter) is a universal property of discourse. The PAS observes the following four constraints: (i) One Lexical Argument Constraint: avoid more than one lexical argument per clause

(whether transitive or intransitive); (ii) Non-Lexical A Constraint: avoid lexical A's; (iii) One New Argument Constraint: avoid more than one new argument per clause; (iv) Given A Constraint: Avoid new A's. According to the PAS, most new mentions (i.e., entities not mentioned previously or not present) will appear as S or O, but most given mentions (i.e., entities mentioned previously or present) as A (ergative NP in an ergative language). Practically speaking, there is no need for speakers to use full NPs to refer to given mentions all the time in a conversation because their referents are easy to identify from the context. Instead, one can either use a reduced form (such as a clitic pronoun or an agreement marker) to refer to given mentions or simply not mention them at all.

Having discussed the importance of genre, now let us turn our attention to the significance of “construction type” in the study of textual frequency.

When conducting a textual frequency study, it is important for one to base his/her study on “construction type” rather than “formatives” or “morphology.” This point is especially important in the study of Philippine-type languages in that these languages are known for having many homophonous nouns and verbs. Moreover, the so-called Actor Focus construction (typically the verb has the morphological shape *-um-* or *m-* in noncomplete forms), in fact, refers to a variety of construction types. It may refer to a construction that takes only one agentive phrase, or a construction that takes one agentive phrase and one locative phrase, or a construction that takes one agentive phrase and one indefinite theme phrase. Whether one treats all three construction types as one group or as two or three different groups will definitely affect the result of frequency counting (cf.

textual frequency of Tagalog reported in Constantino 1971 and Cooreman et al. 1984, 1988).

In sum, the textual frequency test appears to be a reliable test for distinguishing a marked construction from an unmarked construction cross-linguistically. However, when implementing this test, one needs to consider the following two factors: (i) genre, and (ii) construction type. If one can take into account these two factors in his/her textual frequency study, one should be able to get a more accurate picture of how a marked construction differs from an unmarked construction in terms of textual frequency.

2.4.1.3 Distribution

Third, let us consider the distribution test.

According to the distribution test, the more marked construction is expected to have a more limited distribution than the less marked construction. This appears to be true cross-linguistically.

Two points appear to be relevant to the distribution test. First, the less marked construction tends to occur in more construction types than the more marked one. For example, in many languages only the actives (but not the passives) can occur in the imperative construction.⁴ Second, more verbs can occur in the less marked construction than the more marked one, but not vice versa. For instance, Schachter (1976:517,

⁴ In Malagasy, Māori, and some other Austronesian languages, the so-called “passive” constructions have commonly been described as appearing more frequently than the “active” in imperatives (Keenan 1976:321; Sinclair 1976; Clark 1976; Chung 1978). This typological oddity is often explained in terms of “politeness”. Please refer to Chapter 3, section 3.3.1 for the discussion of “passive imperatives” in Malagasy.

footnote 10) states that some verbs (e.g., verbs with meanings like ‘frighten’, ‘surprise’, ‘starve’, ‘kill’, ‘break’, ‘grind’, ‘burn’, ‘remember’, and ‘forget’) in Tagalog are limited in their distribution such that the goal-topic form (i.e., the unmarked form in Tagalog) is the only form that can occur in a main clause.

2.4.1.4 Acquisition

Finally, let us look at the last test, acquisition, on Payne’s list.

According to the acquisition test, the more marked construction is expected to be acquired later than the less marked construction. When applying the acquisition test to Tagalog (see Tucker 1971; Segalowitz and Galang 1978; Galang 1982; Bautista 1983), the result one gets from this test appears to converge with that from other tests. However, the problem with the implementation of this test is that, practically speaking, it is impossible to obtain any acquisition data for the less well-studied languages. So far, most of the acquisition studies that have been done are for the well-described languages (e.g., English, Japanese, Korean, French, etc.). Unless more acquisition studies are done for the less well-studied languages, this test is of no use.

Having discussed Payne’s markedness test, now let us turn our attention to the transitivity tests proposed by Gibson and Starosta (1990).

2.4.2 Gibson and Starosta's (1990) Transitivity Tests

Gibson and Starosta (1990:198–205) outline a set of criteria that can be used for distinguishing canonical transitives from passives and antipassives.⁵ These criteria will be examined in sections 2.4.2.1–2.4.2.2 respectively.

2.4.2.1 Morphological criteria

Three sub-types of morphological criteria are proposed by Gibson and Starosta (1990). These criteria include markedness, productivity, and morphological identification.

2.4.2.1.1 Markedness

As for markedness, Gibson and Starosta propose five tests to distinguish basic or less marked construction from derived or more marked construction: (i) morphological markedness, (ii) text frequency, (iii) neutrality, (iv) ease of processing, and (v) order of acquisition. These five tests are summarized in table 2.5.

⁵ Gibson and Starosta (1990) consider both passives and antipassives as dyadic constructions. However, cross-linguistically, passivization and antipassivization are commonly considered as valency-decreasing devices (Dixon 1994; Dixon and Aikhenvald 2000; Whaley 1997; Payne 1997). In other words, passives and antipassives are both considered to be monadic rather than dyadic constructions. Although a number of cross-linguistic studies have successfully shown that antipassivization is NOT NECESSARILY a valency-decreasing device (see Nichols 1982; Tsunoda 1988; B. Blake 1993; Cooreman 1994; Manning 1996; Starosta 1997, 1998, 2002b; H. C. Liao 2002), so far no similar kind of evidence has been provided for passivization. Instead, cross-linguistic evidence reveals that agentless passives are far more common than those with an agent (see Svartvik 1966; Givón 1979; Yamamoto 1984; Foley and Van Valin 1984; Siewierska 1984; Shibatani 1988; Comrie 1988). Moreover, in many languages (e.g., Latvian, Urdu, Kupia, Chamorro, Fijian, Atjnjamathanha, Cupeño, Cora, Huichol, Cahuilla, Shoshoni and Pepecano), only the agentless passive construction is allowed (Siewierska 1984). It seems to me that Gibson and Starosta's (1990) characterization of passives as dyadic is not correct. Their treatment of passives as dyadic may be influenced by the fact that the so-called "passive" construction in Māori frequently appears with an agentive phrase.

Comparing the tests in table 2.5 with those in table 2.1, we find that three of the markedness tests are identical. Because I have already evaluated the morphological markedness, text frequency, and acquisition tests in sections 2.4.1.1, 2.4.1.2, and 2.4.1.4 respectively, the discussion here will be focused on the neutrality test and the processing test.

TABLE 2.5. MARKEDNESS TESTS (GIBSON AND STAROSTA 1990:198)

	LESS MARKED (BASIC)	MORE MARKED (DERIVED)
MORPHOLOGICAL MARKEDNESS	bare verb stem	affixed form
TEXT FREQUENCY	higher	lower
NEUTRALITY	the forms most often elicited with situationally neutral nonverbal cues	the forms less often elicited with situationally neutral nonverbal cues
EASE OF PROCESSING	more easily processed	less easily processed
ORDER OF ACQUISITION	acquired earlier	acquired later

The neutrality test predicts that the less-marked or basic construction, but not the more-marked or derived construction, will be the one that is most often elicited with situationally neutral nonverbal cues. This test may not always be reliable in that the frequency that speakers use their own native language may play a role here.

In the case that speakers mainly use the dominant language(s) but rarely use their own native language in their daily life, it is very probable that the most often elicited patterns are the translation correspondences of the basic construction in the dominant language. This is exactly what we experienced when Dr. Robert Blust, Dr. Laura Chang-Blust, and I conducted a field study with a Pazeh speaker in 1999. The Pazeh speaker that we worked with, Mrs. Pan, speaks mainly Taiwanese in her daily life and hardly had a chance to speak Pazeh because there was no other competent speaker that she could

converse with in Pazeh. When we first started eliciting sentences from her, she always produced sentences with verb-medial word order, the unmarked word order in Taiwanese. After we worked with her for a while, she started realizing that she has been producing sentences with Taiwanese word order, and then she would tell us that those verb-medial sentences were not correct. The correct way to say those sentences would be to put the verb at the beginning of each sentence.

Seeing that the frequency that one uses a second language may affect the result of this test, one should not be too dependent on the result that he or she obtains from this test.

Now, let us move on to the processing test. The processing test predicts that the less marked or basic construction, rather than the more marked or derived construction, is most easily processed. This test should hold cross-linguistically. However, practically speaking, this test, just like the acquisition test, is of no use in that relatively few, if any, processing studies have been done for the less well-known languages.

2.4.2.1.2 Productivity

As for productivity, Gibson and Starosta provide two tests: (i) regularity or productivity, and (ii) derivational target. The two tests are summarized in table 2.6.

TABLE 2.6. PRODUCTIVITY TESTS (GIBSON AND STAROSTA 1990:199)

	BASIC	DERIVED
REGULARITY OR PRODUCTIVITY	more regular or more productive (no gaps)	less regular or less productive (with gaps)
DERIVATIONAL TARGET	more likely to be the derivational target (from nonverbs and intransitive verb to dyadic verbs)	less likely to be the derivational target

The regularity or productivity test resembles the distribution test discussed in section 2.4.1.3. According to the regularity or productivity test, the basic construction is expected to be more regular or more productive than the derived one. For example, in Language A, if all semantically transitive verb roots can appear in the dyadic clause pattern 3, but not all of them can appear in the dyadic clause pattern 2, then pattern 3 is basic and pattern 2 is derived. This test appears to work for Tagalog data (see Schachter 1976; Ceña 1977).

A test related to the above regularity test is the choice of derivational target. In Language A, if all nonverbs or intransitive verbs can enter dyadic pattern 3, but not dyadic pattern 2, when derived as dyadic verbs, then pattern 3 is the basic transitive construction. This test appears to work for Tagalog, as can be seen from the data in De Guzman (1992:94). She reports that when deriving certain classes of nouns and monadic intransitive verbs into dyadic verbs in Tagalog, the derivational target can only be dyadic *-in* verbs and *-an* verbs, rather than dyadic *-um-* verbs. As shown in table 2.7, when deriving dyadic verbs from the inchoative verbs, the derivational target can only be the dyadic *-an* verbs rather than the dyadic *m-* or *-um-* verbs.

TABLE 2.7. DERIVATION OF TAGALOG VERBS (DE GUZMAN 1992:94)

STATIVE ⁶	INCHOATIVE	DYADIC TRANSITIVE
<i>malaki</i> 'big'	<i>lumaki</i> 'to become big'	<i>lakihan</i> 'to make s.th. big'
<i>matamis</i> 'sweet'	<i>tumamis</i> 'to become sweet'	<i>tamisan</i> 'to make s.th. sweet'
<i>maalat</i> 'salty'	<i>umalat</i> 'to become salty'	<i>alatan</i> 'to make s.th. salty'

2.4.2.1.3 Morphological identification

Now, let us turn to the last morphological test that Gibson and Starosta (1990:199) proposed, the morphological identification test.

The morphological identification test makes the following prediction.

If a language has three verbal clause patterns (one monadic pattern and two dyadic patterns) and the verbs in the three clause patterns are ALL MORPHOLOGICALLY COMPLEX, then the dyadic clause pattern that has the same verbal morphology as the intransitive clause pattern counts as intransitive, whereas the other dyadic clause pattern counts as transitive.

An application of this test can be exemplified by the Tsou data. According to Starosta (1997), (5)a is clearly an intransitive clause, but (5)b and (5)c are ambiguous in terms of transitivity. Adopting the morphological identification test, (5)b is considered to be dyadic intransitive whereas (5)c is transitive because the verbs (both the auxiliary verbs and the lexical verbs) in (5)a and (5)b have the morphological shape *m-*.

⁶ De Guzman (1992) labels the *ma-* forms as "adjectives," but I consider these forms as stative verbs, i.e., a subclass of intransitive verbs.

(5) Tsou (data from Zeitoun 1992; cited in Starosta 1997:146)

- a. canonical intransitive: the verbs (the auxiliary and the lexical verb) have the morphological shape *m-*

<i>mo</i>	_	<i>moŋsi</i>	ʔe	oko.
	NOM.3S ⁷	cry	ʔE	child
AUX		INTR.		S

‘The child is crying.’

- b. dyadic/extended intransitive: the verbs have the morphological shape *m-*

<i>mo</i>	_	<i>mavo</i>	ta	<i>piji</i>	si	amo.
	NOM.3S	open	GEN	door	SI	father
AUX		INTR.		E		S

‘Father is opening the door.’

- c. canonical transitive: the verbs do not have the morphological shape *m-*

i	si	<i>pavi</i>	ta	amo	si	<i>piji</i> .
	GEN.3S	open	GEN	father	SI	door
AUX		TR.		A		O

‘The father has opened the door.’

De Guzman (1988:340–42) reports that a similar kind of dichotomy is also observed in Tagalog. According to her, Tagalog intransitive verbs, whether monadic or dyadic, both have the morphological shape *m-* or *-um-*,⁸ whereas transitive verbs have the morphological shape *-in* (or its nonfuture form *-in-*), *-an*, or *i-* rather than *m-* or *-um-*.

Simply looking at the Formosan (Atayal, Tsou, and Paiwan) and Philippine languages data (Tagalog and Yami) that De Guzman (1988) and Starosta (1997, 1998, 2002b) presented in their papers, one may assume that verbal morphology really shows a neat dichotomy between transitive and intransitive verbs in these languages (and perhaps in

⁷ Like many Formosan languages, the third person singular nominative (short form) pronoun in Tsou is phonologically null. I use the symbol “_” to indicate the syntactic position for the third person singular nominative pronoun.

⁸ This is only true for the infinitive and nonfuture forms.

other Formosan and Philippine languages too). That is, the *m-* or *-um-* form verbs are intransitive (whether monadic or dyadic), but the *-en* form, *-an* form, and *i-* form verbs are transitive. However, a careful survey of the literature points out that things are not quite that simple. There are problems with applying this test to data from at least three Philippine languages (Ilokano, Tagalog, and Sorsoganon) and one Formosan language (Siraya).

Let us consider the Ilokano data first. Ilokano (a Cordilleran language) is commonly described as having three verbal class patterns:⁹ (i) Pattern 1: monadic *-um-/ag-/mang-* intransitive clauses, (ii) Pattern 2: dyadic *-um-/ag-/mang-* clauses, and (iii) Pattern 3: dyadic *-en/-an/i-* clauses.

TABLE 2.8. VERBAL CLAUSE PATTERNS IN ILOKANO

Pattern 1: <i>-um-/ag-/mang-V</i>	NP		
Intr.	Nom		
	agent/theme		
Pattern 2: <i>-um-/ag-/mang-V</i>	NP	NP	
Intr.? or Tr.?	Nom	Loc	
	agent	theme	
Pattern 3: <i>V-en/-an/i-</i>	NP	NP	
Intr.? or Tr.?	Gen	Nom	
	agent	theme/location/beneficiary/instrument, etc.	

Pattern 1 typically consists of monadic *-um-/ag-/mang-* intransitive verbs that expect only one nominative-marked NP, as in (6)a–c. Pattern 2 consists of dyadic *-um-/ag-/mang-* verbs that expect both a nominative-marked agent and a locative-marked theme,

⁹ Table 2.8 is a rough representation of Ilokano verbal clause patterns. The verb forms appear in table 2.8 are the noncompletive forms. The *-um-* and *mang-* forms that appear both have various morphophonemic alternates.

as in (6)d–f. Pattern 3 consists of dyadic *-en/-an/i-* verbs that expect both a genitive-marked agent and a nominative-marked NP (that can be interpreted as a theme, location, beneficiary, instrument, etc. depending on the combination of verb classes and verbal morphology), as in (6)g–i. One thing that needs to be noted is that the locative-marked theme NP in pattern 2 must be indefinite or nonspecific, whereas the nominative-marked NP in pattern 3 must be definite or specific.

(6) Ilokano (Vanoverbergh 1955:130, 132, 134, 137, 164)

- a. pattern 1: monadic *-um-* clause

uminúm ti áso.¹⁰

drink TI dog

‘The dog drinks.’

- b. pattern 1: monadic *ag-* clause (*nag-* is the completive form of *ag-*)

naggaddíl=kami ámin.

itch=NOM.1PE all

‘We (ex.) all had itch.’

- c. pattern 1: monadic *mang-* clause

mangán ní Juán.

eat NI John

‘John eats.’

- d. pattern 2: dyadic *mang-* clause

mangarámid=kami ití baláy.

build=NOM.1PE ITI house

‘We (ex.) make a house.’

¹⁰ Reid (2002b) reconsiders the categorical status of prenominal monosyllabic forms, such as *ti* in Ilokano and *ang* in Tagalog, that have been commonly referred to as “determiners” in Philippine languages. Based on syntactic distribution, he claims that some, if not all, of these elements are better analyzed as semantically empty “auxiliary nouns” that head the NPs that they are a part of. Supporting evidence for an “auxiliary noun” analysis of these forms in other Philippine-type languages is also presented in Chapters 5–7 of this dissertation. See Chapters 5–7 for details.

- e. pattern 2: dyadic *ag-* clause

agbása=ka ití líbro.
read=NOM.2S ITI book

‘You (sg.) read a book.’

- f. pattern 2: dyadic *-um-* clause

uminúm=ak ití danúm.
drink=NOM.1S ITI water

‘I drink water (any kind of water).’

- g. pattern 3: dyadic *-en* clause

inumek ti danúm.¹¹
drink.?1S TI water

‘I drink the water (not any kind of water).’

- h. pattern 3: dyadic *-an* clause

asinán=da ti kárne.
salt=GEN.3P TI meat

‘They salt the meat.’

- i. pattern 3: dyadic *i-* clause

íkáli=da ti púsa a natáy.
bury=GEN.3P TI cat LIG dead

‘They bury the dead cat.’

If we apply Gibson and Starosta’s morphological identification test to the above Ilokano examples, we get a very neat result. That is, intransitive verbs, whether monadic or dyadic, have the morphological shape *-um-*, *ag-*, or *mang-*, whereas transitive verbs have the morphological shape *-en*, *-an*, and *i-*. It seems that verbal morphology can be

¹¹ Synchronically, the form *inumek* (< *inumén* ‘drink’ + *=k* ‘GEN.1S’) is considered to be a transitive verb carrying an agreement feature for the A of the clause (see Reid 2001 for the agreement analysis of Ilokano “pronominal” forms).

used to determine transitivity in Ilokano. However, if we look at the other sets of data, we will find problems with the test.

Vanoverbergh (1955:147) reports that four classes of intransitive verbs in Ilokano have the morphological shape *-en* rather than *-um-*, *ag-*, or *mang-*.

First, the formative *-en* appears with “stems indicating ailments and the like” to form verbs with the meaning “to feel the symptoms of a certain disease,” as in (7).

(7) Ilokano (Vanoverbergh 1955:147)

- a. gaddilén ti ubíng=ko.
itch TI child=GEN.1S
'My child gets itch.'
- b. talimudáwen ni Juán.
dizzy NI John
'John is dizzy.'
- c. til-ién ti ubíng.
hiccups TI child
'The child has hiccups.'
- d. sakitén ti úlo=k.
ache TI head=GEN.1S
'My head aches.'

Second, the formative *-en* appears with “names of body parts or the like” to form verbs with the meaning “this or that part of the body aches or is sore,” as in (8).

(8) Ilokano (Vanoverbergh 1955:147)

- a. bakrángen ti anák=ko.
painful.side TI child=GEN.1S
[bakrángen 'to feel pain in the side of the body' < bakráng 'side of body']
'My child has pain in its side.'

- b. karabukob**én**=da ámin.
 sore.throat=NOM.3P all
 [karabukob**én** ‘to have a sore throat’ < karabukób ‘throat’]
 ‘All of them have a sore throat.’
- c. basisá**wen** ni Juán.
 feel.bloated NI John
 [basisá**wen** ‘to feel or hear water moving in the belly; to feel bloated’ < basisaw ‘bladder’]
 ‘The water gurgles in John’s belly (for having drunk too much of it).’
- d. rurusó**ken**=da.
 eructate=NOM.3P
 [rurusó**ken** ‘to eructate fetidly’ < rúsok ‘stomach’]
 ‘They eructate.’

Third, the formative *-en* appears with certain stems to form verbs with the meaning “have the quality of what the stem implies”. In this case, the first (C)V sequence of the stem is reduplicated, as in (9).

(9) Ilokano (Vanoverbergh 1955:147)

- a. babado**én** daytá lúpot.
 for.coat that cloth
 [bado**én** < bádo ‘dress; coat; shirt; jacket; clothes, attire’]
 ‘That cloth is good for coats.’
- b. guguyó**den** ti nuáng=na.
 for.drawing TI carabao=GEN.3S
 [guyó**den** ‘to pull, draw, haul, drag’ < gúyod ‘variety of awned rice; pull’]
 ‘His carabao is good for drawing purposes.’
- c. aadigi**én** toy káyo.
 for.post this timber
 [adigi**én** < adigi ‘post; pillar’]
 ‘This timber is good for posts.’

- d. sasapató**en** di lálat.
 for.shoes that leather
 [sasapató**en** < sapátos 'shoe; horseshoe']
 'That leather is good for shoes.'

Fourth, the formative *-en* appears with “names of animals, or the like” to indicate that “a certain animal or insect has started eating or consuming something,” as in (10).

(10) Ilokano (Vanoverbergh 1955:147)

- a. kuton**én** ti inapúy.
 anted TI rice
 'The rice is full of ants.'
- b. **inánay** ti lúpot=ko.
 termitted TI clothes=GEN.1S
 'My clothes were ruined by termites.'
- c. **ináso** ti kárne.
 dogged TI meat
 'The dog got at the meat.'
- d. pusá**en** ti tinápáy.
 catted TI bread
 'The cat is eating the bread.'

When applying the morphological identification test, if we compare the dyadic clause patterns with different subtypes of monadic clauses, we will reach a totally different conclusion. Comparing the dyadic *-um-*, *ag-*, or *mang-* verbs in pattern 2 and the dyadic *-en*, *-an*, and *i-* verbs in pattern 3 with the monadic *-en* verbs (rather than with the monadic *-um-*, *ag-*, or *mang-* verbs), we could end up concluding that pattern 3 is intransitive but pattern 2 is transitive. This result is totally different from when we

compare the dyadic verbs with monadic *-um-*, *ag-*, or *mang-* verbs. The existence of this type of data brings question into the validity of the morphological identification test.

The same kind of problem happens when we apply the morphological identification test to Tagalog and Sorsoganon.

In Tagalog, although the majority of monadic intransitive verbs have the morphological shape *(-)m-* or *-um-*, intransitive verbs with the morphological shape *-in* (or its completive aspect form *-in-* or *ni-*) are also observed. According to Schachter and Otnes (1972:307), most nouns that designate insects may occur as bases of *-in* verbs that express the meaning of “being infested with the specified insect”. For example, in (11), the monadic *-in* verbs *nilanggam* ‘be infested with ants’, *inanay* ‘be infested with termites’, *nilangaw* ‘be infested with flies’, and *nilamók* ‘be infested with mosquitoes’ are derivationally related to the nouns *langgam* ‘ant’, *anay* ‘termite’, *langaw* ‘fly’, and *lamók* ‘mosquito’, respectively.

(11) Tagalog (Sheila Zamar, pers. comm.)

- a. *nilanggam* ang kanin.
anted ANG rice
‘The (cooked/steamed) rice was infested with ants.’
- b. *inanay* ang damít=ko.
termited ANG clothes=GEN.IS
‘My clothes were infested with termites.’
- c. *nilangaw* ang isdá.
infested.with.flies ANG fish
‘The fish was covered with flies.’

- d. *nīlamók* *ang* *batà*.
 infested.with.mosquitoes ANG child
 ‘The child is covered with mosquitoes.’

In addition to the “be infested with insects” verbs discussed in Schachter and Otones (1972), De Guzman (1978:229–230, 273–274) also reports the existence of other types of “affliction verbs” in Tagalog. According to her, affliction verbs can be classified into two classes: (i) change-of-state verbs, and (ii) non-change-of-state verbs. Change-of-state affliction verbs are monadic intransitive *–in* verbs deriving from three types of nouns: (i) from nouns referring to insects or creatures, (ii) from inanimate nouns that leave a harmful effect on certain objects (such as *sipon* ‘cold’, *amag* ‘mold’, *antok* ‘drowsiness’, *lagnat* ‘fever’, *kalawang* ‘rust’, *malat* ‘hoarseness’, etc.), as in (12), and (iii) from phenomenal nouns (such as *ulán* ‘rain’, *bagyo* ‘storm’, *hangin* ‘wind’, *bahá* ‘flood’, *alon* ‘wave’, *lindól* ‘earthquake’, etc.), as in (13). Non-change-of-state affliction verbs are monadic intransitive *–an* verbs deriving from nouns such as *pawis* ‘perspiration’, *kilabot* ‘goose pimples’, *kati* ‘itch’, *kabag* ‘gas pain’, *kabá* ‘palpitation’, etc., as in (14)–(15).

(12) Tagalog (De Guzman 1978:230)

- lalagnatin* *ang* *mga* *batà* *dahil* *sa* *laganap* *na* ‘flu’.
 fever ANG PL child because LCV widespread LIG flu
 ‘The children will be afflicted with fever because of the flu epidemic.’

(13) Tagalog (De Guzman 1978:178)

- uulanin* *ang* *parada*.
 rain.on ANG parade
 ‘The parade will be overtaken by rain.’/‘The parade will be rained on.’

(14) Tagalog (De Guzman 1978:231)

pinapawisan=tayo kung tag-init.
 perspire=NOM.IPI when summer

‘We (in.) perspire in summer.’

(15) Tagalog (De Guzman 1978:274)

kinabagan ang batà sa kaiiyák.
 gas.pain ANG child LCV crying

‘The child suffered gas pain from crying too much.’

As in Ilokano, depending on whether we compare the dyadic *-um-* verbs and the dyadic *-in/-an/i-* verbs with the monadic *-um-* verbs or monadic *-in* or *-an* verbs, we will get a totally different result for morphological transitivity in Tagalog.

Having looked at Ilokano and Tagalog data, let us move on to Sorsoganon,¹² another language that also exhibits the “be infested with insects” construction. In Sorsoganon, the verbs appearing in the “be infested with insects” construction have the morphological shape *-un* or its completive aspect form *-in-*, as in (16).

(16) Sorsoganon (Sheila Zamar, pers. comm.)

- a. *inanay* an baláy=mi.
 termited AN house=GEN.IPE

‘Our (ex.) house is infested with termites.’

- b. *tinanga* an tsokolate.
 anted AN chocolate

‘The chocolate is full of ants.’

- c. *linangaw* an sirâ.
 infested.with.flies AN fish

‘The fish is covered with flies.’

¹² Sorsoganon is one of the Central Philippine languages.

- d. *in*namók an batít.
 mosquitoes AN child
 ‘The child is covered with mosquitoes.’

Again, if we apply the morphological identification test to Sorsoganon, we will find that the transitivity of dyadic clauses cannot be unambiguously determined by verbal morphology.

The monadic *-en/-un/-in* verbs or *-an* verbs are found not only in Philippine languages, but also in Formosan languages. The description of Siraya (an extinct Formosan language) by Adelaar (1997:381, 386) contains examples of monadic *-en* “affliction verbs,” as in (17)a, and some nominal forms that appear to be derived from these types of verbs in Siraya, as in (17)b–c.

(17) Siraya (Adelaar 1997:381, 386)

- a. alaei ka *nipasibain* ta neni¹³
 aley ka *nipasibaən* ta neni
 because PST.CAUS.tired TA 3P
 ‘...because they fainted.’ (ix:36)
- b. nimad tyniæn ki *dimmidimmien* ka malaliko
 nimad tīniän ki *dimmidimmīən* ka malaliko
 PST.bring OBL.3S KI (someone)sick.of.the.palsy LIG lying.down
 tou ‘æpaghin.
 tu äpaxən
 TOU bed
 ‘They brought to him a man sick of the palsy, lying on a bed.’ (vi:16)

¹³ Following Adelaar (1997), Siraya examples are presented in the following format: line 1 is the original spelling from the Gospel of Matthew, line 2 is Adelaar’s near-phonemic spelling, line 3 is the interlinear glosses, and line 4 is the free translation. On line 4, the Latin numeral indicates gospel chapter and the Arabic numeral following the semicolon indicates verse.

c.	ka	nipakasoummun	pakakouptigh	ta	<i>‘æutatäummun</i>	tyn
	ka	nipakasumən	pakakuptix	ta	<i>äwtataïmən</i>	tïn
	and	PST.AS.immediate	CAUS.clean	TA	leprosy	GEN.3S

‘And immediately his leprosy was cleansed.’ (viii:3)

One may argue that the morphological identification test works so well for several languages, its validity should not be challenged by the sporadic existence of the “be infested/afflicted with/by” construction. However, the fact that the “be infested/afflicted with/by” construction is not usually reported in other Formosan and Philippine languages should not be taken as evidence for the nonexistence of this type of construction. Instead, it only suggests that most of these languages are not well-described. Once better descriptions are done for these languages, we may find that many more languages exhibit this type of construction. Again, we will have the same kind of difficulty in applying the morphological identification test to these languages. Unless the test is modified, it is not a cross-linguistically valid test for morphological transitivity.

One modification that we can make for this test is to specify the kind of monadic clauses that the dyadic clause patterns should be compared with. Assuming that the verbs in all verbal clause patterns are ALL MORPHOLOGICALLY COMPLEX, we can restate the morphological identification test as follows:

If a language has two (or more) dyadic clause patterns but only one of them is transitive, the verb of the dyadic clause pattern that has the same verbal morphology as the verb in the MAJOR MONADIC INTRANSITIVE CLAUSE PATTERN is considered to be intransitive.

The MAJOR MONADIC INTRANSITIVE CLAUSE PATTERN refers to the monadic intransitive clause pattern that can appear in most verb classes rather than just a limited number of verb classes. For example, in Ilokano, the monadic *-um-*, *ag-*, or *mang-* clause pattern (rather than the monadic *-en* clause pattern) is considered to be the major intransitive clause pattern in that it appears with most classes of verbs. By contrast, the monadic *-en* clause pattern only occur with very limited classes of verbs (most of which have the meaning “the actant is negatively affected by”), and all of which are derived from nouns.

An advantage of this revision is that we may apply the same test to the so-called “split-S” (also called “active” or “agentive”) and “fluid-S” (also called “fluid active” or “fluid agentive”) languages.¹⁴ However, the revised morphological identification test has never been applied to the split-S and/or fluid-S languages. It is not clear whether it will work for these languages or not. If, when we apply the revised test to these languages, it does work, then it may be considered as a cross-linguistically valid test for morphological transitivity. If not, it may have to be abandoned completely.

¹⁴ The discussion of “split-S” and “fluid-S” languages will be presented in section 2.5.2.

Having discussed all the morphological tests, let us now turn our attention to the semantic criteria.

2.4.2.2 Semantic criteria

Traditionally, transitivity has been considered to involve at least two participants/arguments. This is true in the case of transitive clauses. However, two participants/arguments do NOT make clauses SYNTACTICALLY transitive. In their influential work on “Transitivity in grammar and discourse,” Hopper and Thompson (1980) propose that the notion of ‘transitivity’ can be considered to be a combination of semantic, morphological, and syntactic factors. Making use of a scale of ‘transitivity parameters’ by which clauses can be ranked, they demonstrate how semantic properties correlate with the coding of morphosyntactic transitivity cross-linguistically. The ten transitivity parameters that they provide are presented in table 2.9.

TABLE 2.9. PARAMETERS OF TRANSITIVITY (HOPPER AND THOMPSON 1980:252)

		HIGH	LOW
A.	PARTICIPANTS	2 or more participants	1 participant
B.	KINESIS	action	nonaction
C.	ASPECT	telic	atelic
D.	PUNCTUALITY	punctual	nonpunctual
E.	VOLITIONALITY	volitional	nonvolitional
F.	AFFIRMATION	affirmative	negative
G.	MODE	realis	irrealis
H.	AGENCY	agent high in potency ¹⁵	agent low in potency
I.	AFFECTEDNESS OF THEME	theme totally affected	theme not affected
J.	INDIVIDUATION OF THEME	theme highly individuated	theme nonindividuated

According to their survey of clause structures in a number of languages, they find that there is a strong correlation between semantic, morphological, and syntactic transitivity.

The correlations can be stated as follows. If semantic parameters covary with morphosyntactic manifestations of transitivity, clauses exhibiting high semantic transitivity are more likely to be encoded grammatically (i.e., morphologically and syntactically) as transitive. For example, if the semantic feature 'punctuality' covaries with morphosyntactic manifestations of transitivity, clauses exhibiting punctual actions (rather than nonpunctual actions) are likely to be encoded as grammatically transitive (rather than grammatically intransitive).

The correlation between semantic transitivity and grammatical transitivity can be demonstrated by the Central Arctic Inuit examples. In (18)a, the theme argument is definite (i.e., high in semantic transitivity) and the sentence is encoded as syntactically

¹⁵ Hopper and Thompson's usage of the notions "A" and "O" is different from that of Dixon (1994). Dixon (1994:7) uses "A" and "O" to refer to the two core arguments in TRANSITIVE clauses; however, Hopper and Thompson (1980:252) use them to refer to the two participants in a TWO-PARTICIPANT clause. The problem with Hopper and Thompson's usage is that NOT ALL two-participant clauses are TRANSITIVE. To avoid terminological confusion, I have changed their use of "A" and "O" to agent and theme respectively.

transitive (e.g., the verb agrees with both A and O). In contrast, in (18)b, the theme argument is indefinite (i.e., low in semantic transitivity) and the sentence is encoded as syntactically intransitive (e.g., the verb agrees with only S, but not E).

(18) Central Arctic Inuit (data from Manning 1996:15)

- a. canonical transitive with a definite theme NP:

Jaani-up	tuktu	taku-vaa.
Jaani-ERG	caribou.NOM	see-IND.TR.?3S.?3S
A	O	TR.

‘Jaani sees *the* caribou.’

- b. dyadic intransitive with an indefinite theme NP:

Jaani	tuktu-mik	taku-vuq.
Janni.NOM	caribou.MOD	see-IND.INTR.?3S
S	E	INTR.

‘Jaani sees *a* caribou.’

Incorporating Hopper and Thompson’s insights on transitivity, Gibson and Starosta (1990) propose that semantic parameters can be used in conjunction with morphological and syntactic criteria to determine canonical transitivity. We can illustrate this point by the Atayal examples.

According to Starosta (1998:283), (19)a is clearly a monadic intransitive clause, but (19)b–c are ambiguous regarding transitivity. Applying morphological, syntactic, and semantic tests to the Atayal examples, he concludes that (19)b is a dyadic intransitive whereas (19)c is a transitive. Morphologically, the dyadic verb in (19)c has the morphological shape *-an* ($p\lambda man < p\lambda ma + -an$), but the monadic verb and the dyadic verb in (19)a–b both lack the formative *-an*. Syntactically, the “actors” in (19)a–b are both expressed by the Nominative clitic pronoun, but the “actor” in (19)c is expressed by

the Genitive clitic pronoun. Semantically, (19)c is semantically MORE transitive than (19)b in that the theme in (19)b is partially affected, whereas the theme in (19)c is completely affected.

(19) Atayal (data from Starosta 1998:282–283)

a. monadic intransitive clause:

pima saku?
wash NOM.1S
INTR. S

‘I am going to wash.’

b. dyadic intransitive clause:

pɔpima saku? sunan.
wash NOM.1S LCV.2S
INTR. S E

‘I am going to wash you (sg.) (partially).’

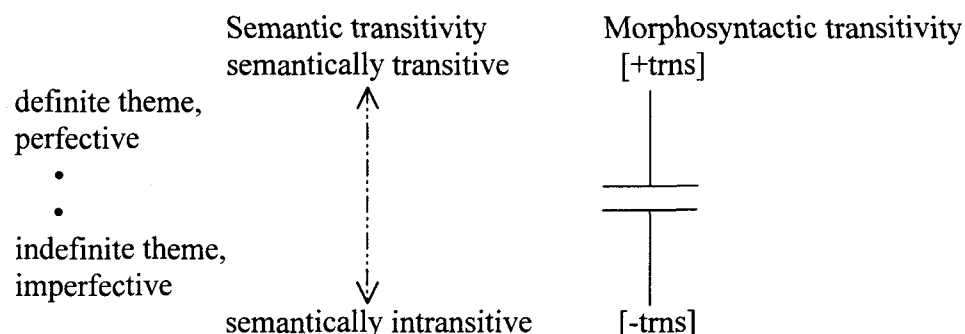
c. dyadic transitive clause:

pɔman saku? nya?
wash NOM.1S GEN.3S
TR. O A

‘He is going to bathe me.’

One important thing to be noted is that although semantic transitivity and morphosyntactic transitivity tend to correlate with each other, they are NOT the same thing. Semantic or functional transitivity differ from grammatical or morphosyntactic transitivity in that semantic transitivity is a SCALAR property, whereas grammatical transitivity is a POLAR property ([+trns] vs. [-trns]), as shown in figure 2.1 (Starosta 1997:129–131).

FIGURE 2.1. SEMANTIC TRANSITIVITY VS. MORPHOSYNTACTIC TRANSITIVITY



Two significant points should be noted in figure 2.1. First, semantic transitivity forms a scale of transitivity continuum with no clear cutting point between the two ends, whereas morphosyntactic transitivity shows two distinct poles (transitive vs. intransitive) with a clear cutting point between the two ends. Second, although semantic transitivity and syntactic transitivity are NOT the same thing, they are linked together in a very interesting way: SEMANTICALLY MORE TRANSITIVE situations (e.g., perfective aspect, definite theme, etc.) tend to be encoded by GRAMMATICALLY or MORPHOSYNTACTICALLY TRANSITIVE clauses and vice versa (Starosta 1997:129-130, 138, 143, 147).

2.4.3 Summary and Remarks on the Transitivity Tests

Having discussed the markedness or transitivity tests proposed by Payne (1982) and Gibson and Starosta (1990) in sections 2.4.1 and 2.4.2, I will summarize the applicability of the tests in this section. All of the tests discussed in the previous sections are presented in table 2.10.

In table 2.10, the symbol “√” stands for “applicable,” “X” stands for “problematic or not applicable”. As shown in table 2.10, not all tests are equally applicable. Some of the tests are easier to apply than others.

TABLE 2.10. TRANSITIVITY TESTS

	LESS MARKED/ CANONICAL TRANSITIVE	MORE MARKED/ NON-BASIC		REMARKS
TEXTUAL FREQUENCY	higher textual frequency	lower textual frequency	√	(i) genres (ii) construction types
NEUTRALITY	the forms most often elicited with situationally neutral nonverbal cues	the forms less often elicited with situationally neutral nonverbal cues	?	frequency
ORDER OF ACQUISITION	acquired earlier	acquired later	√?	hard to obtain data
EASE OF PROCESSING	more easily processed	less easily processed	√?	hard to obtain data
DISTRIBUTION	less limited distribution	more limited distribution	√	
REGULARITY OR PRODUCTIVITY	more regular or more productive (no gaps)	less regular or less productive	√	
DERIVATIONAL TARGET	more likely to be the derivational target	less likely to be the derivational target	√	
COMPLEXITY OF VERBAL MORPHOLOGY	less complex	more complex	X	problematic
MORPHOLOGICAL MARKEDNESS	bare verb stem	affixed form	X	problematic
MORPHOLOGICAL IDENTIFICATION	different verbal morphology from the monadic clauses	same verbal morphology as the monadic clauses	X?	problematic but may be applicable after modification
SEMANTIC TRANSITIVITY	high semantic transitivity	low semantic transitivity	√	

Among all tests, textual frequency, distribution, regularity or productive, derivational target, and semantic transitivity are tests that are useful and easier to apply. When applying the textual frequency test, one needs to consider two factors: (i) genres, and (ii) construction types. The relative frequency between canonical transitive and passive, and that of canonical and antipassive may vary depending on the genre of the texts. Passives and antipassives may occur more frequently in one genre than in the other genre. However, it is expected that the unmarked construction (i.e., the canonical transitive) will occur relatively more frequent than the marked constructions (i.e., passives and antipassives). Moreover, when employing the textual frequency test, it is necessary to base one's counting on CONSTRUCTION TYPES rather than on verbal morphology or nominal case-marking; otherwise, the result may not be reliable.

As for the order of acquisition and the ease of processing tests, they are useful but hard to apply because most of the acquisition and processing studies have been done so far are on well-described languages. It is almost impossible to obtain data for any of the less-known languages.

As for the neutrality test, it may not always be reliable because the relative frequency that speakers use their own native language may affect the result. If speakers use primarily the dominant language(s) in their daily life, it is very possible that the translation correspondences of the basic construction in the dominant language(s) are the patterns that are most often elicited with situationally neutral nonverbal cues.

As for the tests relating to verbal morphology (i.e., complexity of verbal morphology, morphological markedness, and morphological identification), they are the least reliable

among all tests. For example, when applying the complexity of verbal morphology test or morphological markedness test to the ergative Polynesian languages, one could reach the wrong conclusion for the grammatical transitivity of clauses in these languages.

When applying the morphological identification test to Ilokano, Tagalog, Sorsoganon, and Siraya, one finds that the existence of the “be infested/afflicted with/by” construction questions the validity of the test. Without modification, the morphological identification test will not be valid. It appears that one cannot use the verbal morphology test as the main criterion to determine canonical transitivity; instead, one can only use it as a supporting piece of evidence for deciding canonical transitivity.

2.4.4 More on Transitivity Tests

As shown in table 2.10, although some useful morphological and semantic tests for transitivity are proposed by Payne (1982) and Gibson and Starosta (1990), no syntactic test has been offered. Morphological and semantic criteria may provide good evidence for distinguishing canonical transitive from dyadic intransitive, but determining canonical transitivity without taking syntax into consideration seems less convincing. In what way can this situation be remedied? Starosta (1997, 1998, 2002b) provided some language-specific syntactic tests for determining canonical transitivity. He used two types of syntactic evidence for determining canonical transitivity in different Formosan (and Philippine) languages: (i) the types of clitics, and (ii) the relative order between clitics and lexical verbs.

The first type of evidence can be illustrated by the Yami examples.¹⁶ According to Starosta (1997:143), if a Formosan language has clitic pronouns, a genitive set will occur with transitive verbs and a nominative set with intransitive verbs. The third person nominative is commonly zero. There are two variants of this pattern. First, in languages that allow only one clitic per clause (e.g., Tsou and Yami), genitive pronouns occur with grammatical transitives and nominatives occur with grammatical intransitives (including dyadic intransitive or pseudo-transitive in Starosta's terminology). Second, in languages that have both genitive and nominative pronouns (e.g., Atayal), both sets of pronouns may cooccur in a grammatically transitive clause, while only the nominative pronouns occur in a grammatical intransitive clause (including dyadic intransitives).

Compare (20)a–c with (20)d. In (20)d, the auxiliary is cliticized by the genitive pronoun =*na* 'GEN.3S', whereas in (20)a–c the auxiliary is not cliticized by the genitive pronoun.¹⁷

(20) Yami (data from Ho 1990; cited in Starosta 1997:143–44)

a. intransitive:

ya	—	<i>mazies</i>	u	kanakan.
	NOM.3S	bathe.oneself	U	child
AUX		INTR.	S	

'The child is taking a bath.'

¹⁶ Acknowledging that Yami is genetically related to the Batanic languages (such as Ivatan, Itbayaten, and Babuyan) spoken in the Philippines, Starosta (1997) includes Yami in his survey of Formosan clause structure because it is spoken on Lanyu (or Orchid Island, or Botel Tobago) of Taiwan.

¹⁷ Like Tsou, the third person nominative (short form) pronoun is phonologically null.

b. intransitive:

ya	—	tumava	si	mapapu.
	NOM.3S	get.fat	SI	Mapapu
AUX		INTR.	S	

‘Mapapu is getting fat.’

c. extended intransitive:

ya	—	kuman	si	mapapu	su	suli.
	NOM.3S	eat	SI	Mapapu	GEN	taro
AUX		INTR.	S			E

‘Mapapu is eating taros.’

d. canonical transitive:

ya= na	nikan	ni	mapapu	u	suli.
=GEN.3S	eat	GEN	Mapapu	U	taro
AUX=3S.A	TR.	A		O	

‘Mapapu has eaten up the taros.’

The second type of evidence can be illustrated by the Paiwan data. According to Starosta (2002b:448), word order can be useful for determining canonical transitivity in Paiwan. Consider the Paiwan examples in (21). Compare (21)a–c with (21)d–e. When the verb is intransitive, whether monadic or dyadic, the (nominative) clitic pronoun follows the verb, as in (21)a–c. However, when the verb is transitive, the genitive clitic pronoun precedes the verb, as in (21)d–e.

(21) Paiwan (data from Starosta 2002b:448)

a. monadic intransitive: S (nominative clitic pronoun) follows the verb

mipuruk=akən.

jump=NOM.1S

INTR.=S

‘I jump.’

- b. extended intransitive: S (nominative clitic pronoun) follows the verb

dumukur=timadu ta nusun.
 hit=NOM.3S LCV 2S
 INTR.=S E

‘He hit you (sg.).’

- c. extended intransitive: S (Nominative clitic pronoun) follows the verb

dumukur=akən ta imadu.
 hit=NOM.1S LCV 3S
 INTR.=S E

‘I hit him.’ (past)

- d. canonical transitive: A (Genitive clitic pronoun) precedes the verb

su=*dinukur*=timadu.
 GEN.2S=hit=NOM.3S
 A=TR.=O

‘You (sg.) hit him.’ (past)

- e. canonical transitive: A (Genitive clitic pronoun) precedes the verb

ku=*dukurin*=su.
 GEN.1S=hit=NOM.2S
 A=TR.=O

‘I hit you (sg.).’

In addition to the language-specific tests that Starosta proposed, there are some cross-linguistically valid syntactic tests that can be used to determine canonical transitivity. These tests include (but are not limited to) depictive predicates (or resultative predicates) and agreement.

Typologically speaking, depictive predicates and agreement are properties that are more likely to be associated with the core arguments S, A, and O than with any other argument and/or adjuncts. If a depictive predicate (or secondary predicate) can be

associated with adjuncts or arguments other than the three core arguments S, A, and O,¹⁸ we would expect that it can also be associated with S, A, and O, and not vice versa. Similarly, if a verb agrees with adjuncts or arguments other than the three core arguments S, A, and O in some features, we would expect that it would also agree with S, A, and O in those features, and not vice versa (Whaley 1997:153, 164-165; Dixon 1994:45). These implicational universals can help us distinguish canonical transitive from dyadic intransitive constructions.

First, let us consider the depictive predicate or resultative predicate test.

In Pashto (an Indo-Iranian language), some dyadic verbs are ambiguous regarding syntactic transitivity, as in (22)a–b. To distinguish the canonical transitive from the dyadic intransitive, we can apply the depictive predicate test. Adding a depictive predicate to the sentences in (22)a–b, we find that the depictive predicate *nisa* ‘drunk’ can be associated with *tə* ‘NOM.2S’, as in (22)c, but not with *ta* ‘OBL.2S’, as in (22)d. This suggests that the pronominal form *tə* ‘NOM.2S’ in (22)c functions as an O of a transitive clause, but the pronominal form *ta* ‘OBL.2S’ in (22)d functions as an E of a dyadic intransitive clause.

(22) Pashto (data from O’Grady 1999)

a. canonical transitive:

ma	tə	wə-lid-e.
ERG.1S	NOM.2S	PERF-saw-?2S
A	O	TR.

‘I saw you (sg).’

¹⁸ A depictive predicate (or secondary predicate) refers to a predicate (typically an adjective, adjectival or stative verb) that is used to modify one of the core arguments in the main predicate of a sentence.

b. dyadic intransitive:

<i>zə</i>	<i>ta</i>	<i>gor-əm.</i>
NOM.1S	OBL.2S	see-?1S
S	E	INTR.

'I see you (sg.).'

c. a depictive predicate associated with the nominative pronoun:

<i>ma</i>	<i>tə</i>	<i>nisa</i>	<i>wə-lid-e.</i>
ERG.1S	NOM.2S	drunk	PERF-saw-?2S
A	O	TR.	INTR.

'I saw *you* (sg.) drunk.' (You are drunk.)

d. a depictive predicate can only be associated with the nominative pronoun, but NOT with the oblique pronoun:

<i>zə</i>	<i>ta</i>	<i>nisa</i>	<i>gor-əm.</i>
NOM.1S	OBL.2S	drunk	see-?1S
S	E	INTR.	INTR.

'I see you (sg.) drunk.' (I am drunk.)

Second, let us turn to the agreement test.

In Inuit Eskimo, some verbs are ambiguous regarding syntactic transitivity. To distinguish a canonical transitive clause from an antipassive clause and a passive clause, we can apply the agreement test.

Comparing (23)b with (23)c, we find that the dyadic verb in (23)b agrees with both arguments, whereas the dyadic verb in (23)c agrees with only the agent of the clause. This suggests that the theme NP in (23)b is an O, but the theme NP in (23)c is an E. This in turn suggests that (23)b is a canonical transitive construction, whereas (23)c is a dyadic intransitive construction.

Similarly, comparing (23)d with (23)e–f, we find that the verb in (23)d agrees with both arguments, whereas the verbs in (23)e–f agree only with the theme NPs but not with

the agentive NPs. This suggests that the agentive NP in (23)d is an A, but the agentive NPs in (23)e–f are oblique arguments or adjuncts. This further suggests that (23)d is a canonical transitive construction, whereas (23)e–f are passive constructions.

Such a result is a welcoming one. One can state that Inuit Eskimo exhibits a neat transitive-intransitive dichotomy in its agreement pattern. That is, transitive verbs agree with two core arguments (i.e., A and O), whereas intransitive verbs, whether monadic or dyadic, agree with only one core argument (i.e., S).

(23) Inuit Eskimo (data from Manning 1996:82–83)

- a. canonical intransitive: the verb agrees with S

Ani *atuar-poq.*
Ani.ABS read-IND.INTR.?3S
S INTR.

‘Ani reads.’

- b. canonical transitive: the verb agrees with both A and O

Hansi-p *inuit* *tuqup-paa.*¹⁹
Hansi-ERG people.ABS kill-IND.?3S.?3S
A O TR.

‘Hansi killed the people.’

- c. antipassive: the verb agrees with S only

Hansi *inun-nik* *tuqut-si-vuq.*
Hansi.ABS people-MOD kill-ANTIP-IND.?3S
S E INTR.

‘Hansi killed people.’

¹⁹ The interlinear glosses and free translation used here are taken from Manning 1996. The form *inuit*, translated as ‘people’ by Manning (1996), may be better translated as ‘an Inuit person’ in that the agreement for this noun is third person singular, not plural.

- d. canonical transitive: the verb agrees with both A and O

Juuna-p	miiqqa-t	paar(i-v)-a-i.
Juuna-ERG	children-PL.ABS	look.after-IND-TR-?3S.?3P
A	O	TR.

‘Juuna is looking after the children.’

- e. dynamic passive: the verb agrees with S only

miiqqa-t	Juuna-mit	paari-ni-qar-p-u-t.
children-PL.ABS	Juuna-ABL	look.after-GER-have-IND-INTR-?3P
S		V

‘The children were looked after by Juuna.’

- f. stative passive: the verb agrees with S only

miiqqa-t	Juuna-mit	paari-sa-u-pp-u-t.
children-PL.ABS	Juuna-ABL	look.after-PART-COP-IND-INTR-?3P
S		V

‘The children are looked after by Juuna.’

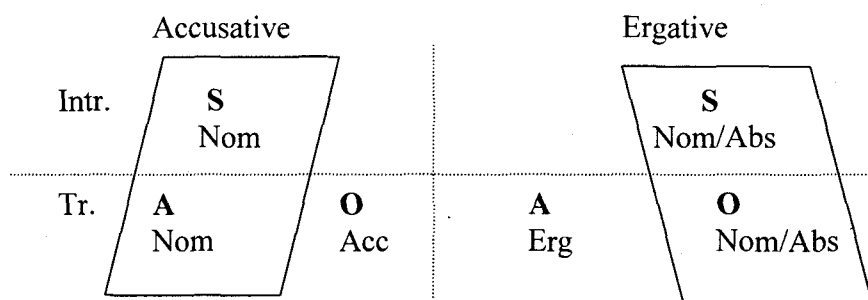
2.5 ACTANCY STRUCTURE

The term “actance structure” or “actancy structure,” following Lazard (1984, 1995, 1997, and 1998), is used as a neutral term for referring to the patterns of nominal case-marking systems (manifested by nominal case inflection, adpositions, determiners, or contrastive word order) and/or verbal agreement systems that are commonly called ergative, accusative, active, and so forth. Four types of actancy structure are observed in the world’s languages: (i) an accusative system, (ii) an ergative system, (iii) an active system, and (iv) a tripartite or three-way system. Section 2.5.1 discusses the distinction between accusative and ergative systems. Section 2.5.2 deals with the active system. Section 2.5.3 deals with the three-way system.

2.5.1 Accusative vs. Ergative

A system is accusative if S and A have the same grammatical relation coding (i.e., nominal case-marking, cross-referencing on the verb, and/or contrastive word order), while O has distinct grammatical relation coding. A system is ergative if S and O have the same grammatical relation coding, while A has distinct grammatical relation coding (Comrie 1978, 1981; Dixon 1979, 1994; Payne 1997; Whaley 1997). In an accusative system, S and A are marked by the nominative case, whereas O is marked by the accusative case. In an ergative system, S and O are marked by the nominative case,²⁰ whereas A is marked by the ergative case.²¹ The contrast between these two types of systems can be illustrated in table 2.11.

TABLE 2.11. ACCUSATIVE VERSUS ERGATIVE SYSTEMS



An accusative actancy structure can be illustrated by the Latin examples. As shown in (24), the S of an intransitive verb and the A of a transitive verb are both marked by the

²⁰ Although other linguists use the term “absolutive” to refer to the S and O in ergative languages, I will use the typologically more general term “nominative” to cover the S and A in accusative languages and the S and O in ergative languages in order to capture more cross-linguistic generalizations. For example, the nominative NP tends to be the least marked NP in both accusative and ergative languages (Dixon 1994:57).

²¹ The case-marking of noun phrases that are the agent of transitive constructions in most Formosan and Philippine languages is identical to that which marks the possessors of possessed nouns. I choose to use the more general term “genitive” (rather than “ergative”) as the label for the case that marks both of these noun phrases in such languages. The term “ergative” is only used when the case form of the A is not homophonous with the case forms of other NPs.

nominative case ending (for the second declension) *-us* (singular) or *-i* (plural), whereas the O of a transitive verb is marked by the accusative case ending *-um* (singular) or *-ōs* (plural). Moreover, the verb agrees with the S of an intransitive verb and the A of a transitive verb, but not with the O of a transitive verb.

(24) Latin (data from Dixon 1994: 9)

- a. intransitive clause: the verb agrees with S

<i>dominus</i>	<i>venit.</i>
master.NOM.S	come.PRES.IND.?3S
S	INTR.

‘The master comes.’

- b. intransitive clause: the verb agrees with S

<i>servus</i>	<i>venit.</i>
slave.NOM.S	come.PRES.IND.?3S
S	INTR.

‘The slave comes.’

- c. transitive clause: the verb agrees with the A rather than O

<i>dominus</i>	<i>servum</i>	<i>audit.</i>
master.NOM.S	slave.ACC.S	hear.PRES.IND.?3S
A	O	TR.

‘The master hears the slave.’

- d. transitive clause: the verb agrees with the A rather than the O

<i>servī</i>	<i>dominum</i>	<i>audiunt.</i>
slave.NOM.P	master.ACC.S	hear.PRES.IND.?3P
A	O	TR.

‘The slaves hear the master.’

- e. transitive clause: the verb agrees with the A rather than the O

<i>servus</i>	<i>dominōs</i>	<i>audit.</i>
slave.NOM.S	master.ACC.P	hear.PRES.IND.?3S
A	O	TR.

‘The slave hears the masters.’

Contrast the above Latin actancy structure with that in Avar, a Northeast Caucasian language with both nominal case inflection and verbal agreement determined on an ergative basis. As shown in (25), both the S of an intransitive verb and the O of a transitive verb are unmarked, but the A of a transitive verb is marked by the ergative case inflection *-as:*. Moreover, verbs show class agreement (*v-* for masculine singular; *j-* for feminine singular) with the S and O, but not with the A.

(25) Avar (data from Anderson 1976:4)

- a. intransitive clause: the verb agrees with S

Vas *vekerula.*
 boy.NOM ?S.MASC.NOM.run
 S INTR.

‘The boy runs.’

- b. intransitive clause: the verb agrees with S

Jas *jekerula.*
 girl.NOM ?S.FEM.NOM.run
 S INTR.

‘The girl runs.’

- c. transitive clause: the verb agrees with O rather than A

Vasas: *jas* *jec:ula.*
 boy.ERG girl.NOM ?S.FEM.NOM.praise
 A O TR.

‘The boy praises the girl.’

Not all languages exhibit accusativity or ergativity in both nominal case-marking and verbal agreement systems. Some languages exhibit accusativity or ergativity only in one of the three grammatical relation coding strategies (nominal case-marking system, word order, or the verbal agreement system).

Yalarnnga (an Australian aboriginal language) is an example of a language that exhibits ergativity only in its nominal case-marking pattern, but not in its word order or verbal agreement pattern. In Yalarnnga, both common nouns and personal pronouns exhibit an ergative case-marking system. As shown in (26)b–d, when the common noun *kupi* ‘fish’ functions as both the S of an intransitive verb and the O of a transitive verb, it is unmarked for case; however, when it functions as the A of a transitive verb, it is marked by the ergative case inflection *-ŋku*. Moreover, when the pronoun ‘I’ functions as both the S of an intransitive verb and the O of a transitive verb, it takes the form *ŋia* ‘NOM.1S’; however, when it functions as the A of a transitive verb, it takes the form *ŋaŋu* ‘ERG.1S’, as in (26)a, c–d.

(26) Yalarnnga (data from B. Blake 1977:8; cited in Song 2001:144)

a. intransitive clause:

ŋia wakamu.

NOM.1S fall.PST

S INTR.

‘I fell.’

b. intransitive clause:

kupi waya kunhuŋka.

fish that water.LCV

S INTR.

‘That fish is in the water.’

c. transitive clause:

kupiŋku ŋia tacamu.

fish.ERG NOM.1S bite.PST

A O TR.

‘A fish bit me.’

d. transitive clause:

ṅaṭu	kupi	waḷamu.
ERG.1S	fish	kill.PST
A	O	TR.

'I killed a fish.'

A language may exhibit ergativity in its constituent order but not in its nominal case inflections. Makusi (Carib, Brazil) is a language that displays ergativity in word order. Makusi is a verb-medial language with core arguments either preceding or following the verb. As shown in (27), when a nominal functions as the S of an intransitive clause or the O of a transitive clause, it appears before the verb; however, when a nominal functions as the A of a transitive clause, it appears after the verb.

(27) Makusi (data from Whaley 1997:157)

a. intransitive clause: S precedes the verb

pemonkonyami	witi'pi.
man.PL	go.PST
S	INTR.

'The men went.'

b. transitive clause: O precedes the verb, but A follows the verb

tuna	ekaranmapo'pi	uuriya.
water	ask.for.PST	ERG.1S
O	TR.	A

'I asked for water.'

One thing to be noticed is that languages rarely use constituent order as the sole indicator of syntactic function. If a language does, a combination **SV/AVO** or **VS/OVA** would be an indication of accusativity, and **SV/OVA** or **VS/AVO** of ergativity (Dixon 1994:49–50). Note that this sort of categorization is only possible for verb-medial languages, but not for verb-initial or verb-final languages. In verb-initial or verb-final

languages, core arguments either all precede the verb or follow the verb. In such cases, it is practically impossible to argue whether S and A, or S and O are treated in the same way in terms of constituent order.

There are even some languages that use their verbal agreement system as the sole indication of ergativity or accusativity.²² According to Comrie (1978:340), this type of language is not particularly rare. It is found for instance in some of the Northwest Caucasian languages, such as Abkhaz and Abaza (see Allen 1956), and quite generally in the Mayan languages of Mexico and Central America. The examples below are from Quiché, a Mayan language of Guatemala.

In Quiché, independent pronouns are normally omitted, unless stressed. Independent pronouns and other noun phrases are not case-marked, and verb-agreement is on an ergative-absolutive basis. Like other Mayan languages, verbal agreement forms in Quiché are divided into two sets: Set A (also referred to as “ergative”) and Set B (also referred to as “absolutive”). As shown in (28), when the agreement form refers to the S of an intransitive clause and the O of a transitive clause, the Set B forms (*ox-* for first person plural and *at-* for second person singular) are used. However, when the agreement form refers to the A of a transitive clause, the Set A forms (*ka-* for first person plural and *a-* for second person singular) are used. One interesting thing to be noted is that, as in many ergative languages, the Set A forms (“ergative” forms) in Quiché are also used to

²² This type of language is often referred to as “head-marking,” in contrast with “dependent marking” languages (Nichols 1986; Whaley 1997; Song 2001). In head-marking languages, the morphological marking of a head-dependent relationship occurs on the head element (e.g., verbs); whereas in dependent-marking languages, the morphological marking of a head-dependent relationship occurs on the dependent element (e.g., determiners).

indicate possession. For example, in the noun phrase *ka-c'i:* 'our dog', the Set A form *ka-* '1P' refers to the possessor.

(28) Quiché (data from Campbell 1976; cited in Comrie 1978:339)

- a. intransitive clause: *ox-* as the agreement form for the first person plural S
k-ox-kam-ik.
 ASP-B.1P-die-PTC
 S.INTR.
 'We die.'

- b. intransitive clause: *at-* as the agreement form for the second person singular S
k-at-kam-ik.
 ASP-B.2S-die-PTC
 S.INTR.
 'You (sg.) die.'

- c. transitive clause: *at-* as the agreement form for the second person singular O, and *ka-* as the agreement form for the first person plural A
k-at-ka-cuku-x.
 ASP-B.2S-A.1P-seek-ACT
 O.A.TR.
 'We seek you (sg).'

- d. transitive clause: *ox-* as the agreement form for the first person plural O, and *a-* as the agreement form for the second person singular A
k-ox-a-cuku-x.
 ASP-B.1P-A.2S-seek-ACT
 O.A.TR.
 'You (sg.) seek us.'

Although the languages discussed so far all exhibit a purely ergative or purely accusative actancy structure, not all languages in the world exhibit this kind of system. Instead, many languages are described as exhibiting so-called "split-ergativity," "split accusativity" (Dixon 1979, 1994), or "split actancy" (Lazard 1986, 1997, 1998).

The term “split ergativity” has been used in a number of senses in the literature. It is necessary to clarify what one means by “split ergativity” when using the term. Four diverse senses of “split ergativity” have been used in the literature. These include: (i) a split conditioned by the semantic nature of the core NPs, (ii) a split between the case-marking system and the agreement system, (iii) a split conditioned by the tense, aspect, or mood of a clause, (iv) a split conditioned by the grammatical status of a clause, whether it is main or subordinate, etc.

First, let us consider “split ergativity” conditioned by the semantic nature of the core NPs.

An actancy split determined by the semantics of core NPs can be exemplified by the Dyirbal examples. In Dyirbal, when the core NPs are common nouns, both the S of an intransitive clause and the O of a transitive clause are unmarked, whereas the A of a transitive clause is marked by the ergative case ending *-ŋgu*, as in (29)a–c. However, when the core NPs are first and second person pronouns, both the S of an intransitive clause and the A of a transitive clause are unmarked, whereas the O is marked by the accusative case ending *-na*, as in (29)d–f.

(29) Dyirbal (data from Dixon 1994:10, 14)

- a. intransitive clause with a common noun S:

ŋuma	banagan ^y u.
father.NOM	return.NONFUT
S	INTR.

‘Father returned.’

- b. intransitive clause with a common noun S:

yabu banagan^yu.
 mother.NOM return.NONFUT
 S INTR.

‘Mother returned.’

- c. transitive clause with two common nouns A and O:

ɲuma yabu^ɲgu buran.
 father.NOM mother.ERG see.NONFUT
 O A TR.

‘Mother saw father.’

- d. intransitive clause with a personal pronoun S:

ɲana banagan^yu.
 NOM.1P return.NONFUT
 S INTR.

‘We all returned.’

- e. intransitive clause with a personal pronoun S:

n^yurra banagan^yu.
 NOM.2P return.NONFUT
 S INTR.

‘You (pl.) all returned.’

- f. transitive clause with personal pronouns A and O:

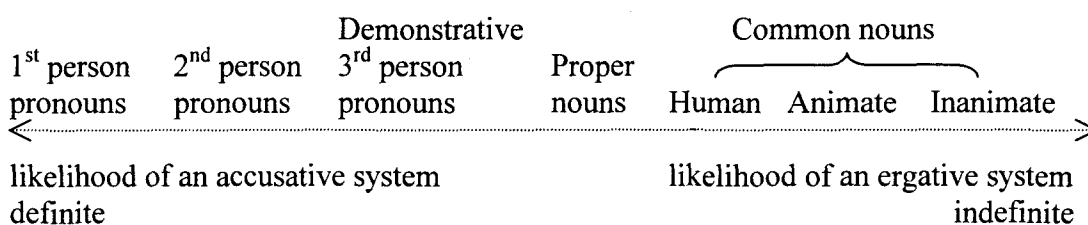
n^yurra ɲanana buran.
 NOM.2P ACC.1P see.NONFUT
 A O TR.

‘You (pl.) all saw us.’

This type of split-ergative system is very common in ergative languages. It appears to follow from a general principle, the Nominal Hierarchy (also called Animacy Hierarchy, or Empathy Hierarchy), which was first proposed by Silverstein (1976). The interaction between the Nominal Hierarchy and split ergativity can be stated as follows:

If a language exhibits split ergativity conditioned by the referents of the core NPs, the ergative pattern is more likely to appear with elements toward the righthand end of the Nominal Hierarchy, whereas the accusative pattern is more likely to appear with elements toward the left end of the hierarchy, and not vice versa (Dixon 1979, 1994:84).

FIGURE 2.2. THE NOMINAL HIERARCHY (DIXON 1994; ADAPTED FROM SILVERSTEIN 1976)



Second, let us look at a split between the case-marking system and the agreement system.

A split between the agreement system and the case-marking system is often referred to as a “bound” vs. “free” split, with the verbal cross-referencing agreement markings being considered as “bound” pronominals and the case-marked nominals as “free”-form nominals (Dixon 1994:94). This type of split is commonly treated as a secondary phenomenon that can be explained in terms of the Nominal Hierarchy. Because cross-referencing systems are basically pronominal (with the affixes probably having developed from free-form pronouns historically), we would expect them to follow an accusative pattern. By contrast, case-marking on NPs is under no such constraint, and can be either nominative-accusative or absolutive-ergative (Dixon 1994:94–95).

An implicational universal that one can formulate for the “bound” vs. “free” split is stated as follows. If there is a split between “bound” cross-referencing forms and “free”

case-marked nominals, then “bound” forms will follow the accusative pattern and “free” forms the ergative pattern (as in Murinypata), but not vice versa (Dixon 1994:95–96).

An example of a “bound” vs. “free” split, or a split between agreement system and nominal case-marking system can be exemplified by Walbiri and Enga examples.

Let us consider Walbiri data first.

Walbiri (also called Walpiri), a Pama-Nyungan language spoken in Central Australia, is often described as a language with an ergative case-marking system, but an accusative agreement system. As shown in (30), when the first person singular free form pronoun functions as the S of an intransitive clause and the O of a transitive clause, the absolutive form *ŋa^yu* is used; but, when it functions as the A of a transitive clause, the ergative form is *n^yuntulu^u* used. However, we find that the first person singular agreement form *-ŋa* is used when it cross-references with the S of an intransitive clause and the A of a transitive clause; but the first person singular agreement form *-^yu* is used when it cross-references with the O of a transitive clause.

(30) Walbiri (data from Hale 1973:309, 328; cited in Comrie 1978:340)

a. intransitive clause:

<i>ŋa^yu</i>	<i>ka-ŋa</i>	<i>pu₃lami.</i>
ABS.1S	TENSE-?NOM.1S	shot
S	INTR.	

‘I shot.’

b. transitive clause:

<i>ŋat^yulu₁u</i>	<i>ka-ŋa-ŋku</i>	<i>n^yuntu</i>	<i>n^yanyi.</i>
ERG.1S	TENSE-?NOM.1S-?ACC.2S	ABS.2S	see
A	TR.	O	

‘I see you (sg.).’

c. transitive clause:

n ^y untulu <u>lu</u>	ka- <i>npa-t^y</i> u	ŋat ^y u	n ^y anyi.
ERG.2S	TENSE-?NOM.2S-?ACC.1S	ABS.1S	see
A	TR.	O	

‘You (sg.) see me.’

Now let us turn to the Enga examples.

Enga, a Papuan language, exhibits another type of “bound” vs. “free” split. In Enga, the nominal case-marking system follows an ergative pattern, but the verbal agreement system follows an accusative pattern. However, unlike Walbiri (and most languages that are reported to exhibit this kind of split), Enga only has agreement forms cross-referencing with the S of an intransitive clause and the A of a transitive clause, but does not have any agreement forms cross-referencing with the O of a transitive clause.

As shown in (31), when the third person singular pronoun *baa* or the common noun *mená lóngó* ‘many pigs’ functions as the S of an intransitive clause or the O of a transitive clause, they are unmarked for case. However, when the third person singular pronoun functions as the A of a transitive clause, it is marked by the ergative case ending *-mé*. In contrast, when we look at the agreement forms, we find that they can only agree with the A of a transitive clause (as in (31)a) and the S of an intransitive clause (as in (31)c), but not with the O of a transitive clause (as in (31)b).

(31) Enga (data from Lang 1973, and Li and Lang 1979; cited in Van Valin and LaPolla 1997:254)

a. transitive clause: the verb agrees with A, but not with O

(<i>baamé</i>)	mená	lóngó	píá.
ERG.3S	pig	many.ABS	hit.PST.?3S
A	O		TR.

‘He killed many pigs.’

- b. transitive clause: the verb agrees with O, but not with A (unacceptable)

***(baamé)* *mená* *lóngó* *piámi.*
 ERG.3S pig many.ABS hit.PST.?3P
 A O TR.

‘He killed many pigs.’

- c. intransitive clause: the verb agrees with S

(baá) *pelyámo.*
 ABS.3S go.PRES.?3S.DEC
 S INTR.

‘He is going.’

Third, let us consider a split conditioned by the tense, aspect, or mood of the clause.

An actancy split determined by the tense, aspect, or mood of the clause can be exemplified by the Hindi examples. Hindi, an Indo-Aryan language spoken in parts of Northern India, is often described as a language with a split actancy system conditioned by the aspect of the clause. That is, in Hindi, case-marking and agreement systems both follow an ergative pattern in the perfective aspect; however, in the imperfective aspect, the case-marking system follows either an accusative pattern or a neutral system and the agreement system follows the accusative pattern.²³

As shown in (32)a–b, when the clause is in the imperfective aspect, S, A, and O are all expressed by unmarked nominative forms (i.e., a neutral case-marking system), and the verb agrees with the S of an intransitive clause and the A of a transitive clause (i.e., an accusative agreement system). By contrast, when the clause is in the perfective aspect, both the S of an intransitive clause and the O of a transitive clause are expressed by unmarked nominative forms whereas the A of a transitive clause is expressed by the

²³ The case-marking system in Hindi is much more complicated than what is discussed here. For detailed discussion of the Hindi case-marking system, please refer to Mohanan (1994).

ergative *-nee* form (i.e., an ergative case-marking system), and the verb agrees with the S of an intransitive clause and the O of a transitive clause (i.e., an ergative agreement system), as in (32)c–d.

(32) Hindi (data from Bhat 1991; cited in Van Valin and LaPolla 1997:364)

a. intransitive clause in the present tense:

Raam sootaa hai.
 Ram.NOM sleep is.?MASC.SG
 S INTR.
 ‘Ram sleeps.’

b. transitive clause in the present tense:

Raam kitaab parhataa hai.
 Ram.NOM.MASC book.NOM.FEM read is.?MASC.SG
 A O TR.
 ‘Ram reads the book.’

c. intransitive clause in the past tense:

Raam sooyaa.
 Ram.NOM.MASC slept.?MASC.SG
 S INTR.
 ‘Ram slept.’

d. transitive clause in the past tense:

Raam^{nee} kitaab parhiii.
 Ram.ERG.MASC book.NOM.FEM read.?FEM.SG
 A O TR.
 ‘Ram read the book.’

The type of split ergative system exhibited in Hindi follows from the following universal tendency. That is, an ergative system is most likely to be found in clauses that describe some definite result, in past tense or perfective aspect, but is less likely to be used in clauses that refer to something that has not yet happened (in future tense), or is

not complete (imperfective aspect) or did not happen (negative polarity), or where there is emphasis on the agent's role (imperative or hortative moods) (Dixon 1994:101).

We can formulate an implicational universal regarding a split system conditioned by tense, aspect, or mood as follows. If a language exhibits a split in actancy structure, the ergative system tends to occur in the past tense, the perfective aspect, or the indicative mood, whereas the accusative system (or the neutral system) tends to occur in the present tense, the imperfective aspect, or the 'interactive' mood (imperative, hortative, or intentional) (Dixon 1994:99–101).

Fourth, let us consider a split conditioned by the grammatical status of a clause, whether it is main or subordinate, etc.

An actancy split determined by the grammatical status of the clause can be exemplified by the Mam examples. Mam (Mayan, Central America) exhibits a split marking system in main and subordinate clauses. In Mam, main clauses exhibit an ergative marking system, whereas subordinate clauses exhibit a neutral system (i.e., S, A, and O are all marked as ergative).

As shown in (33)a–c, when the first person singular pronoun functions as the S of an intransitive main clause and the O of a transitive main clause, it is expressed by the absolutive form *chin*; however, when it functions as the A of a transitive main clause, it is expressed by the ergative form *n-*. By contrast, when pronouns occur in subordinate clauses, as in (33)d–e, S, A, and O are all expressed by the ergative pronominal forms *n-* 'ERG.1S' and *t-* 'ERG.2S'.

(33) Mam (data from England 1983; cited in Palmer 1994:61–62)

a. main clause—intransitive:

ma	<i>chin</i>	b'eet- <i>a</i> .
ASP	ABS.1S	walk-1S
	S	INTR.

‘I walked.’

b. main clause—transitive:

ma	<i>chin</i>	ok	<i>t-tzeeq'a-n-a</i> .
ASP	ABS.1S	DIR	ERG.2S-hit-DS-2S/1S
	O		A-TR.

‘You (sg.) hit me.’

c. main clause—transitive:

ma	<i>tz-'ok</i>	<i>n-tzeeq'a-n-a</i> .
ASP	ABS.2S-DIR	ERG.1S-hit-DS-1S/2S
	O	A-TR.

‘I hit you (sg.).’

d. subordinate clause—intransitive:

<i>n-chi</i>	ooq'	[<i>n-poon-a</i>].
ASP-ABS.3P	cry	[ERG.1S-arrive-1S]
S	INTR.	[S-INTR.]

‘They were crying when I arrived.’

e. subordinate clause—transitive:

o	<i>chin</i>	ooq'-a	[aj	<i>n-kub'</i>	<i>t-tzeeq'a-n-a</i>].
ASP	ABS.1S	cry-1S	[when	ERG.1S-DIR	ERG.2S-hit-DS-2S/1S]
	S	INTR.	[O	A-TR.]

‘I cried when you (sg.) hit me.’

A split marking system determined by the grammatical status of clauses is less commonly found in languages of the world. Apart from Mam, it is also found in Shimshian (British Columbia/Alaska) (Boas 1911; reported in Palmer 1994:61). However, the kind of split marking system found in Shimshian is different from that

found in Mam. In Mam, main clauses exhibit an ergative marking system, whereas subordinate clauses exhibit a neutral system. However, in Shimshian, subordinate clauses display an ergative system, but main clauses display either an ergative system or no marking depending on the grammatical person of A and O.

Dixon (1994:102) remarks that a split marking system between main clauses and subordinate clauses can be divided into two types: (i) Type 1: a split between main clauses and purposive clauses, and (ii) Type 2: a split between main clauses and relative clauses.

Two implicational universals concerning the split marking system determined by the grammatical status of clauses are suggested by Dixon (1979, 1994). First, if there is a split in morphological marking between main clauses and purposive subordinate clauses, purposive subordinate clauses are expected to follow an accusative pattern, while main clauses are expected to follow an ergative pattern. Second, if there is a split morphological marking between main clauses and relative clauses, relative clauses are expected to follow an ergative pattern, whereas main clauses are expected to follow an accusative pattern.

According to Dixon (1994:102), purposive clauses are like main clauses in the future tense (or in the imperfective aspect) in that they typically express some potential event as a propensity of the agent (A or S), and thus demand an accusative marking. However, relative clauses resemble main clauses in the past tense (or the perfective aspect) in simply describing something that has happened or is happening, and thus demand an ergative marking.

Dixon (1979, 1994) does not provide data to support the two proposed implicational universals. It is not clear whether the two universals will hold cross-linguistically.

2.5.2 Active System

In addition to the above two types of actancy structure, languages may exhibit one of the following two types of actancy structure: active and tripartite systems. The active system will be discussed in this section. Section 2.5.3 deals with the tripartite system.

In an active system (also called agentive, or dual actancy), depending on the verbal semantics,²⁴ the single actant of an intransitive verb can receive the same grammatical relation coding as either the A or the O of a transitive verb, as sketched in table 2.12.

TABLE 2.12. ACTIVE SYSTEM

Intr.	S_a Erg agent	S_o Nom theme
Tr.	A Erg agent	O Nom theme

For example, when the intransitive verb has a volitional reading, the single core actant S_a (i.e., an agent-like actant) will have the same grammatical relation coding as the A of a transitive verb. However, when the intransitive verb has a nonvolitional reading, the

²⁴ The grammatical relation coding of the sole actant of intransitive verbs can be conditioned by a number of semantic factors, such as lexical aspect or Aktionsart (e.g., events vs. states), agency, affectedness, etc. See Mithun (1991) for a detailed discussion of active/agentive systems.

single core actant S_o (i.e., a theme-like actant) will have the same grammatical relation coding as the O of a transitive verb.

An active system can be divided into two subtypes: a split active (also called “split-S”) system and a fluid active (also called “fluid-S”) system. In a split active system, individual intransitive verbs are more or less fixed in terms of the case that appears on the S. In a fluid active system, by contrast, many intransitive verbs permit either case, depending on the extent to which the action they denote falls under the control of the referent of the S (Dixon 1979, 1994; Merlan 1985; Van Valin 1985; Verhaar 1990; Mithun 1991; Whaley 1997; Payne 1997; Song 2001; B. Blake 1994; Palmer 1994; Croft 1990).

A split active or split-S system can be illustrated by the Laz examples. As shown in (34), the S of an unergative intransitive verb (i.e., an intransitive verb that takes an agent-like actant) and the A of a transitive verb are both marked by the ergative case *-k*, whereas the S of an unaccusative intransitive verb (i.e., intransitive verbs that take a theme-like actant) and the O of a transitive are both unmarked. This phenomenon is also referred to as “split intransitivity” in the literature. However, the term “split intransitivity” is also used to refer to accusative languages (e.g., English, French, Dutch, Italian, Japanese,...etc.) that exhibit splits in terms of syntactic processes (rather than in terms of nominal case-marking or verbal agreement). For instance, it is reported that French unaccusative verbs form their perfective aspect with the auxiliary verb ‘be’ and the unergative verbs with ‘have’ (Burzio 1986). To avoid confusion, I will refrain from using the term “split intransitivity” in the discussion.

(34) Laz (data from Givón 1984: 149-50)

a. transitive:

koči-k doqvilu *γji.*
 man-ERG ?3S.kill.?3S pig.NOM
 A TR. O

‘The man killed the pig.’

b. unergative intransitive:

jo γo-epe-k-ti lales.
 dog-P-ERG-too ?3P.bark
 S_a INTR.

‘The dogs barked too.’

c. unaccusative intransitive:

koči doγur.
 man.NOM ?3S.died
 S_o INTR.

‘The man died.’

By contrast, in a fluid active or fluid-S system, the marking of the sole actant of (certain) intransitive verbs (e.g., ‘go’, ‘play’, ‘speak’, etc.) may vary depending upon whether or not the S can control the action expressed by the verb. If the S can control the action, it is marked the same way as the A of a transitive verb, whereas if the S cannot control the action, it receives the same marking as the O of a transitive verb. A fluid-S system can be illustrated by Eastern Pomo (a Hokan languages spoken in California) examples.

Eastern Pomo is a language with both a split-S system and a fluid-S system. The split-S system can be illustrated by examples (35)c–d. The S of an unergative verb and the A of the transitive verb use the identical first person singular pronominal form *há*: ‘1s

(A/S_a)’, whereas the S of an unaccusative verb and the O of a transitive use the same first person singular pronominal form *wí* ‘1s (O/S_o)’.

The fluid-S system can be exemplified by examples (35)e–f. In Eastern Pomo, some intransitive verbs can have either a volitional (i.e., with an agent) or a nonvolitional (i.e., with a theme) reading. The forms of the sole actant of such intransitive verbs alter to match the semantics of the verbs. As shown in (35)e–f, when a “fluid” intransitive verb takes a volitional actant, the actant has the form *há:* ‘1s (A/S_a)’; but when the same “fluid” intransitive verb takes a nonvolitional actant, the actant has the form *wí* ‘1s (O/S_o)’.

(35) Eastern Pomo (data from McLendon 1978; cited in Whaley 1997:161–162)

a. transitive verb:

xá:su:là wí ko:k^hóya.
 rattlesnake 1S bit
 A O TR.

‘A rattlesnake bit me.’

b. transitive verb:

há: mí:pal sá:ka.
 1S 3S killed
 A O TR.

‘I killed him.’

c. unergative verb with an agent actant:

há: xá:qákki.
 1S bathe
 S_a INTR.

‘I (S_a) bathed.’

- d. unaccusative verb with a theme actant:

wí *q̄a:lálma.*
 1S sick
 S_o INTR.

‘I (S_o) got sick.’

- e. “fluid” intransitive verb with a volitional reading taking an agent actant:

há: *ce:xélka.*
 1S slip
 S_a INTR.

‘I (S_a) am sliding (deliberately).’

- f. “fluid” intransitive verb with a nonvolitional reading taking a theme actant:

wí *ce:xélka.*
 1S slip
 S_o INTR.

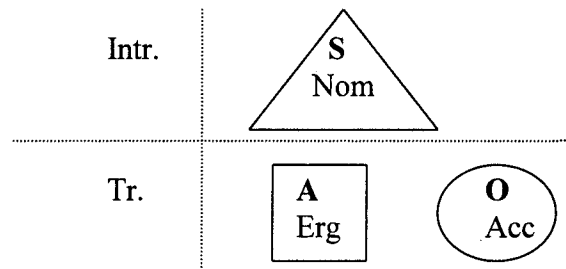
‘I (S_o) am slipping (accidentally).’

Although the split-S and the fluid-S systems are both related to the marking of the single core argument of intransitive verbs, they differ fundamentally in the following way. In a split-S system, intransitive verbs are divided into two sets, roughly on semantic grounds, but each still has a single syntactic frame available, according to its prototypical assignment. By contrast, in a fluid-S system, each intransitive verb has the potential to take either A-marking or O-marking to directly reflect its context of use (Dixon 1994:82).

2.5.3 Tripartite or Three-Way System

In a tripartite or three-way system, the S of an intransitive verb and the A and the O of a transitive verb each has its their own distinct grammatical relation coding, as sketched in table 2.13 (Comrie 1978; Mallinson and Blake 1981; Dixon 1994; Whaley 1997; Payne 1997; Song 2001).

TABLE 2.13. TRIPARTITE/THREE-WAY SYSTEM



A tripartite system can be illustrated by the Wangkumara (Pama-Nyungan, Australia) examples. As shown in (36), in Wangkumara, the three major core arguments S, A, and O each receives distinct case-marking: A is marked by the ergative case ending *-ulu*, O is marked by the accusative case ending *-nana*, and S is marked by the nominative case ending *-ia*.

(36) Wangkumara (data from Mallinson and Blake 1981:50–51; cited in Whaley 1997:158)

a. canonical transitive:

kanaulu	kalkana	titnana.
man.ERG	hit	dog.ACC.FEM
A	TR.	O

‘The man hit the dog.’

b. canonical intransitive:

kanaia	paluna.
man.NOM	died
S	INTR.

‘The man died.’

2.6 OTHER USES OF THE TERM “ERGATIVE”

The term “ergative,” in its standard usage, refers to a type of actancy structure in which S and O have the same grammatical relation coding (i.e., nominal case-marking, cross-referencing on the verb, and/or contrastive word order), while A has a distinct

grammatical relation coding. In addition to this standard usage, it has also been used in a variety of other ways in the literature. For instance, some linguists discuss concepts such as “syntactic ergativity,” “discourse ergativity,” and “lexical ergativity,” and so forth. The diverse uses of the term “ergative” often creates confusion. It is necessary to clarify what one means by “ergative” when using it.

In what follows, I will discuss the various uses of the term “ergative”. Section 2.6.1 deals with the notion of “syntactic ergativity”. Section 2.6.2 discusses the notion of “discourse ergativity”. Section 2.6.3 discusses the definition of “ergative” employed by DeLancey (1981). Section 2.6.4 deals with “lexical ergativity”. Section 2.6.5 summarizes the discussion of the use of the term “ergative”.

2.6.1 “Syntactic Ergativity”

The term “ergativity,” in addition to its original use in a “morphological” sense, has often been expanded to be used in a “syntactic” sense, which refers to the grouping of core NPs in terms of their (in)ability to undergo syntactic processes. Some linguists (such as Anderson and Dixon) even distinguish two types of ergative languages, “morphologically ergative” languages and “syntactically ergative” languages.

The idea that ergative languages are of two types, “morphologically ergative” and “syntactically ergative,” is first proposed by Anderson (1976). A language is “morphologically ergative” if it displays “morphological ergativity” (i.e., S/O grouping in terms of grammatical relation coding), but “syntactic accusativity” (i.e., S/A grouping in terms of syntactic processes, such as reflexivization, equi-NP deletion, conjunction

formation, subject raising, etc.). A language is “syntactically ergative” if it displays both “morphological ergativity” (i.e., S/O grouping in terms of both grammatical relation coding) and “syntactic ergativity” (i.e., S/O grouping in terms of syntactic processes).

One of the most-often cited “syntactically ergative” languages is Dyirbal (a Pama-Nyungan language spoken in Australia). Dyirbal exhibits a split ergative case-marking system with the nouns and third person pronouns following an ergative pattern, but first and second person pronouns following an accusative pattern. It is commonly claimed that most of the syntactic processes in Dyirbal follow an ergative pattern (i.e., S/O grouping) (Dixon 1972, 1979, 1994; Anderson 1976; etc.). We can illustrate the “ergative syntax” of Dyirbal by the data in (37).

In Dyirbal, relativization can only be applied to the nominative NPs (S and O), but not the ergative NP (A). As shown in (37)a–b, when the relativized position is the S of an intransitive clause or the O of a transitive clause, the NP can be relativized directly.

(37) Dyirbal (data from Dixon 1972:99-105; Dixon 1994:169-171)

- a. relativization of the Nominative (S) of an intransitive relative clause:

ŋuma [banaga-ŋu] yabu-ŋgu buran.
 father.NOM [return-REL] mother-ERG see-REAL

‘Mother saw father who was returning.’

- b. relativization of the Nominative (O) of a transitive relative clause:

baŋgu yugu-ŋgu [gunba-ŋu-ru _ baŋgul yaŋa-ŋgu] ŋayguna
 DET.ERG tree-ERG [cut-REL-ERG _ DET.ERG man-ERG] ACC.IS

biridu balga-n.
 almost.EMPH hit-REAL

‘The tree which the man had cut nearly fell on me (i.e., it could have fallen on me but luckily it did not.)’

However, when the relativized position is the A of a transitive clause, it is not possible to relativize the A directly by leaving a gap inside the relative clause, as in (37)c. Rather, it is necessary to first apply antipassivization to detransitivize the verb and thereby to convert the A of a transitive clause into the S of an intransitive clause, then it can be relativized, as in (37)d.

- c. relativization of the Ergative (A) of a transitive relative clause: impossible

** η uma [bura- η u yabu] $\text{d}\eta$ gara- η u.
 father [see-REL mother.NOM] cry-REAL
 ‘Father, who saw mother, was crying.’

- d. relativization of the subject of a formerly transitive clause after detransitivization:

η uma [bural- η a- η u yabu-gu] $\text{d}\eta$ gara- η u.
 father [see-ANTIP-REL mother-DAT] cry-REAL
 ‘Father, who saw mother, was crying.’

As illustrated in (37)a–d, both the S of an intransitive clause and the O of a transitive clause behave the same with respect to relativization, whereas the A of a transitive clause behaves differently. Therefore, Dyirbal is considered to exhibit “syntactic ergativity”. This in turn suggests that Dyirbal is a “syntactically ergative” language.

It is commonly claimed that the majority of ergative languages are “morphologically ergative” and only relatively few ergative languages (e.g., Dyirbal and Hurrian) are “syntactically ergative” (see Anderson 1976; Dixon 1979 and 1994). This does not seem to be a cross-linguistically valid claim in that the establishment of “syntactic accusativity” or “syntactic ergativity” of a language has been based on different syntactic

processes by linguists. The incomparability of data is a problem commonly found in syntactic literature and is evident in Anderson's and Dixon's works.

Anderson (1976) claims that Basque, Tongan, Kate, and Abkhazian are "morphologically ergative" languages, but Dyirbal and Hurrian are "syntactically ergative" languages. His claim is based on the following facts: (i) Basque exhibits an S/A grouping in terms of "equi-NP deletion"; (ii) Tongan exhibits an S/A grouping in terms of "subject raising"; (iii) Kate exhibits an S/A grouping in terms of "conjunction formation"; and (iv) Abkhazian exhibits an S/A grouping in terms of "reflexivization" (Anderson 1976:11–16). As for the "syntactically ergative" status of Dyirbal and Hurrian, he makes the claim on the basis of other linguists' work without providing any syntactic evidence to justify it.

Dixon (1979, 1994) claims that Dyirbal is a "syntactically ergative" language in that it exhibits an S/O grouping with respect to syntactic processes such as "coordination reduction" and "relativization". However, based on Hudson's (1976) work on Walmatjari, he claims that Walmatjari is a "morphologically ergative" language in that three syntactic operations, *-ula* '...-ing', *-u* 'in order to', and *-tja:* 'and' constructions, are all sensitive to S/A pivots (Dixon 1994:173–174).

As we can see from Anderson's and Dixon's discussion about "syntactic ergativity," neither one of them use (a) consistent syntactic process(es) to determine whether a language exhibits "syntactic ergativity" or "syntactic accusativity". The common practice of using different syntactic processes to establish the "syntactic ergativity or accusativity" of a language poses a major problem to the study of "syntactic ergativity".

One will draw a different conclusion as to whether a language is “morphologically ergative” or “syntactically ergative,” depending on which syntactic process(es) that one looks at.

As we already know from the discussion in this section, there is no general consensus as to which syntactic processes should be used for determining “syntactic ergativity” or “syntactic accusativity”. Before such an agreement is reached, it is confusing and meaningless to divide ergative languages into two types.

2.6.2 “Discourse Ergativity”

As a response to Anderson’ (1976) claim that ergative languages can be distinguished into “morphologically ergative” (or “surface ergative”) and “syntactically ergative” (or “deep ergative”), Cooreman et al. (1984, 1988) study clause structure from a discourse perspective. They examine the relative topicality of the agent and the patient in various clause patterns in Chamorro (a “morphologically ergative” language) and Tagalog (a “syntactically ergative” language) connected discourse. Based on quantified frequency studies of the actual topicality of agents and patients in Chamorro and Tagalog connected texts, they argue that the division of ergative languages into two groups is unwarranted (Cooreman et al. 1984:5).

Rejecting a structure-based definition of “(syntax) ergativity,” Cooreman et al. (1984:29) claim that it is only meaningful if one defines the term “ergative” in terms of “the discourse distribution of constructions and participant NPs”. According to their discourse-based definition of “ergativity,” a language is “ergative” if the bulk of

transitive events in discourse are encoded by the ergative clause-type. A clause-type is “ergative” if it has high-frequency distribution in connected discourse and if the agent NP demonstrates high topicality (in contrast with the expected low topicality of agents in passive constructions) in connected discourse. They claim that there is nothing STRUCTURALLY distinct in an ergative clause that could tell anyone whether it is FUNCTIONALLY an ergative or a passive clause type.

Although Cooreman et al.’s (1984) total rejection of a structure-based definition of “ergativity” is an unfortunate one, the study of “discourse ergativity” provides us with good tools for distinguishing canonical transitive from passive and antipassive constructions. Because the frequency distribution of various construction types and the topicality of the agent and patient NPs in connected discourse differ depending on construction type, one can distinguish a passive construction from an ergative construction and an antipassive construction from an active-transitive construction through an examination of their discourse frequency.

A passive construction is different from an ergative construction in two ways. First, an ergative construction has much higher frequency distribution in connected discourse than a passive one. Second, the agentive NP in an ergative construction demonstrates high topicality, but the agentive NP in a passive construction demonstrates low topicality.

An antipassive construction differs from an active-transitive construction in two ways. First, an antipassive has much lower frequency distribution in connected discourse than an active-transitive one. Second, the theme/patient NP in an antipassive construction demonstrates much lower topicality than an active-transitive one.

2.6.3 DeLancey's Definition of "Ergative"

DeLancey uses the term "ergative" in a novel way. He considers an ergative construction to be "a transitive clause in which a special case-form or adposition marks the semantic agent, or verb agreement is with patient in preference to agent" (DeLancey 1981:627). This notion of "ergative" differs from the standard usage of "ergative" in that it is only concerned with the unique case-marking of the A of a transitive clause without requiring the O of a transitive clause and the S of an intransitive clause to be marked identically.

2.6.4 "Lexical Ergativity"

Although the above three uses of "ergative" digress from the standard use of "ergative" in some ways, they are related to various aspects of morphologically ergative languages. The most unfortunate and confusing use of the term "ergative" is practiced by transformational grammarians, who extend the notion of "ergative" to cover some of the S = O lexical pairs in English and other accusative languages.

Some transformational grammarians, such as Burzio (1986) and his followers Keyser and Roeper (1984), classify verbs into three classes: (i) Class 1: transitive verbs, (ii) Class 2: "unergative" verbs, and (iii) Class 3: "unaccusative" verbs or "ergative" verbs. Class 1 verbs are transitive verbs that have two arguments and assign two theta roles, e.g., *abandon* (which assigns the roles of AGENT and THEME). Class 2 verbs are intransitive verbs that have only an external argument, such as *work* (which assigns the

external role of AGENT). Class 3 verbs are intransitive verbs that have only an internal argument, such as *break* (which assigns the internal role of THEME).

Other transformational grammarians, such as Belletti (1988:4, 14) and Haegeman (1991:331–337), disagree with Burzio’s two-way distinction of intransitive verbs by further dividing Class 3 verbs into two groups, that is, “unaccusatives” and “ergatives”. “Unaccusatives” include passive verbs, raising verbs, verbs of movement, and (change of) state verbs; “ergatives” include one-argument verbs like *sink*, *open*, *close*, *increase*, etc. (Haegeman 1991:331–337). The following evidence is given by Haegemann to support such a classification. First, unlike the “unaccusative” verbs of movement and (change of) state verbs, “ergative” verbs do not appear in the *there*-construction (e.g., *There came three new sailors on board.* vs. **There sank three ships last week.*). Second, unlike the “unaccusative” verbs (such as *arrive*), “ergative” verbs such as *sink* have a corresponding transitive pattern that assigns accusative case (e.g., *The enemy sank the ship.* vs. **I arrived the baby to the crèche.*).

The classification of intransitive verbs into two classes or three classes is not the main concern of this section, so I will not go into detail here. What really matters is the fact that there is a subclass of intransitive verbs called “ergatives”. They are called “ergative” because the “subjects” of this class of intransitive verbs can appear as “direct objects” of their corresponding transitive verbs (Radford 1988:374, 446–447, 601). In the following pairs of English sentences, (38)b and (39)b are considered to be “ergative” structures because the S NPs *the door* and *the ship* appear as the O NPs of their corresponding transitive patterns (Radford 1988:374, 446).

(38) English “ergative” verb and its corresponding transitive verb (data from Radford 1988:446)

a. John **broke** *the door*.

A TR. O

b. *The door* **broke**.

S INTR.

(39) English “ergative” verb and its corresponding transitive verb (data from Radford 1988:446)

a. The artillery will **sink** *the ship*.

A TR. O

b. *The ship* will **sink**.

S INTR.

This use of term “ergative” is very misleading in that the relationship between the S of an “ergative” verb and the O of its transitive verb is in no sense parallel to “nominatives” (or “absolutives”) in morphologically ergative languages. The so-called “ergative” verbs in English are in fact related to their corresponding transitive verbs by “causative” derivation in languages that show a more extensive morphology, hence the use of the term “causative-ergative” for this phenomenon by Haegeman (1991:334). As shown in (40), in Turkish, the S of an “ergative” verb and the A of its corresponding causative transitive verb are both expressed by unmarked nominative forms, whereas the O of a causative transitive verb is marked by the accusative case *-i*. This is totally different from the grouping of case forms in morphologically ergative languages.

(40) Turkish (data from Dixon 1994:19)

a. “ergative” intransitive:

<i>otobüs</i>	<i>harekit</i>	<i>etti.</i>
bus.NOM	start	do.PST
S	INTR.	

‘The bus started.’

b. transitive:

<i>şoför</i>	<i>otobüs-ü</i>	<i>harekit</i>	<i>et-tir-di.</i>
driver.NOM	bus-ACC	start	do-CAUS-PST
A	O	TR.	

‘The driver started the bus.’

2.6.5 Summary

In the previous sections, I have reviewed the various uses of the term “ergative” in the literature. Section 2.6.1 covers the notion of “syntactic ergativity,” section 2.6.2 the notion of “discourse ergativity,” section 2.6.3 DeLancey’s unique definition of “ergative,” section 2.6.4 the use of “lexical ergativity” in English and other accusative languages.

In this dissertation, unless otherwise specified, the term “ergative” will be used in the standard morphological sense. That is, “ergative” refers to a type of actancy structure in which S and O have the same grammatical relation coding (i.e., nominal case-marking, cross-referencing on the verb, and/or contrastive word order), while A has a distinct grammatical relation coding.

CHAPTER 3

PREVIOUS STUDIES OF PHILIPPINE-TYPE LANGUAGES

3.1 INTRODUCTION

Philippine languages have traditionally been considered to form a typologically distinct group in that they are assumed to have a unique type of grammatical system, known as the “focus system”. The so-called “focus system” is characterized by the use of various verbal affixes to indicate the thematic role of the NP bearing the nominative case in a sentence. It is found in virtually all Philippine languages,¹ in many of the Formosan languages, in the languages spoken in Sabah, northern Sarawak, and northern Sulawesi, in Malagasy, in Palauan, and in Chamorro. Because the so-called “focus system” is a characteristic feature of nearly all Philippine languages and also the term “focus system” was first introduced to describe the languages of the Philippines, other Austronesian languages exhibiting a similar type of grammatical system are often said to have a “Philippine-type” syntax (Reid 1975, 2002a; Foley 1976; Blust 1998a, 2002; Himmelmann 2002; Ross 2002; Wolff 2002).

¹ Blaan and Tboli, the Bilic languages spoken in Mindanao, exhibit a “focus system” that is radically different from that of Tagalog. Unlike the “focus system” found in Tagalog and many other Philippine languages, the verbal “focus” morphology in Blaan and Tboli itself does not provide sufficient information about the thematic role of the NP bearing the nominative case in a sentence in Blaan and Tboli. The thematic role of the NP bearing the nominative case is jointly determined by “focus” type and “prefocus” type (Abrams 1961, 1970; Forsberg 1992). “Prefocus” is a notion related to the classification of verb bases. In Blaan and Tboli, verb bases (i.e., unaffixed verb forms) are divided into three groups according to “prefocus” types: Actor Prefocus (APF) bases, Goal Prefocus (GPF) bases, and Instrument Prefocus (IPF) bases. Depending on which “prefocus” type that the verb bases belong to, Actor Focus and Non-Actor Focus (including Goal Focus and Instrumental Focus) constructions can appear with or without affixation.

The grammatical system of Philippine-type languages has been a topic of great controversy in linguistic analysis. In addition to the “focus system” analysis mentioned above, Philippine-type languages have also been variously analyzed as having an accusative (Bloomfield 1917, 1942; F. Blake 1906a, 1906b, 1917, 1925; Egerod 1965, 1966, 1978; Wolff 1973, 1979; etc.), active (Drossard 1984, 1994), ergative (Payne 1982; Walton 1986; Gerdts 1988; De Guzman 1988; B. Blake 1988; Gibson and Starosta 1990; Starosta 1986, 1988, 1995, 1997, 1998, 1999, 2002b; Mithun 1994; Brainard 1994a, 1996, 1997; Rubino 2000; Gault 1999a, 1999b, 2002; Reid and Liao 2004a, Reid and Liao 2004b; etc.), or hybrid (Maclachlan 1996) case-marking system, or having a fluid voice (Shibatani 1988, 1999, 2001), or a symmetrical voice system (Foley 1998). To understand why so many different analyses have been applied to these languages, it is necessary to examine clause structure in Philippine-type languages.

Before reviewing previous analyses, I first discuss verbal clause patterns in Philippine-type languages in section 3.2. Then I discuss various analyses concerning clause structure in Philippine-type languages in section 3.3. These analyses will be introduced according to the order that they appeared in the literature: (i) the analysis of the “traditional period,” (ii) the analysis of the “classical period,” and (iii) the analyses of the “modern period”. The discussion of each type of analysis consists of two parts: (i) a brief introduction of the analysis in question with the help of sentence examples from Tagalog (and other Philippine-type languages if relevant), and (ii) an evaluation of the analysis.

The discussion of previous analyses begins with the “passive” analyses of the “traditional period” in section 3.3.1, then moves on to the “focus” analyses of the “classical period” in section 3.3.2, and finally to the various analyses that appeared in the “modern period” in sections 3.3.3–3.3.7. A representative analysis of the “modern period,” that is, the ergative analysis, will be first introduced in section 3.3.3. Then, the “active” analysis, the “fluid voice” analysis, the “hybrid” analysis, and the “symmetrical voice” analysis of the “modern period” will be discussed in sections 3.3.4–3.3.7 respectively.

Finally, a summary of the discussion in this chapter will be provided in section 3.4.

3.2 VERBAL CONSTRUCTIONS IN PHILIPPINE-TYPE LANGUAGES

As mentioned above, Philippine-type languages have been variously analyzed as having an accusative, active, ergative, or hybrid case-marking system or having a focus, fluid, or symmetrical voice system. These different analyses stem from the following facts found in these languages. First, there are at least two or more SEMANTICALLY transitive clause patterns (i.e., clauses with at least two arguments) that are ambiguous regarding SYNTACTIC transitivity. Second, event-denoting words, property-denoting words, and entity-denoting words frequently have identical forms and/or can appear in similar syntactic environments. For example, event-denoting words, property-denoting words, and entity-denoting words all can appear as the predicate of a sentence.

This seemingly unusual nature of clause structure results in the controversy regarding the typological status of Philippine-type languages. To understand more about the nature

of this typological puzzle, it is necessary to consider verbal constructions in these languages. Therefore, before reviewing all previous analyses, I will first examine clause structures in Philippine-type languages. The discussion here will be divided into two parts. First, section 3.2.1 introduces verbal clause patterns in Philippine-type languages. Then section 3.2.2 discusses the forms of verbs, with a special focus on reflexes of PAN **-um-*, **-en-*, **-an-*, and **Si-*, in Formosan and Philippine languages.

3.2.1 Verbal Clause Patterns in Philippine-type Languages

Philippine-type languages are commonly described as exhibiting the following verbal clause patterns: (i) pattern 1: monadic **-um-* clauses, (ii) pattern 2: dyadic **-um-* clauses, (iii) pattern 3: (a) dyadic **-en* clauses, (b) dyadic **-an* clauses, and (c) dyadic **Si-* clauses. Pattern 1 and pattern 2 clauses have commonly been labeled as “actor/agent focus” (abbreviated as AF). Pattern 3a clauses have commonly been labeled as “goal/object/patient/theme focus” (abbreviated as GF/OF/PF/TF); pattern 3b clauses as “locative/referent focus” (abbreviated as LF/RF), and pattern 3c clauses as “instrument(al)/associative/accessory focus” (abbreviated as IF/AssF/AccF). Patterns 3a-3c are often collectively labeled as “non-actor focus” (abbreviated as NAF) (Tsuchida 1976: 43). These clause patterns are represented schematically in table 3.1.

Table 3.1 is a rough representation of the verbal clause patterns commonly found in Philippine-type languages. It is intended to illustrate only the salient features that are commonly associated with most Philippine-type languages, rather than as an exhaustive display of all the verbal clause patterns that can be found in these languages. Moreover,

it does not claim that all Philippine-type languages exhibit all the verbal clause patterns sketched in table 3.1.

TABLE 3.1. VERBAL CLAUSE PATTERNS IN PHILIPPINE-TYPE LANGUAGES

“AF”	Pattern 1: <i>*-um-V</i>	NP	
	Intr.	NOM agent	
	Pattern 2: <i>*-um-V</i>	NP	NP
	Intr.? or Tr.?	NOM agent	GEN/LCV/OBL patient/theme
“NAF”	Pattern 3a: <i>*-en V</i>	NP	NP
	Intr.? or Tr.?	GEN agent	NOM patient/theme
	Pattern 3b: <i>*-an V</i>	NP	NP
	Intr.? or Tr.?	GEN agent	NOM location
	Pattern 3c: <i>*Si-V</i>	NP	NP
	Intr.? or Tr.?	GEN agent	NOM instrument

In table 3.1, the non-completive forms of the reconstructed Proto-Austronesian (PAN) verbal affixes **-um-*, **-en-*, **-an-*, and **Si-* are used to represent the verbal clause patterns found in Philippine-type languages. However, it should be noted that the verbal clause patterns sketched in this table do NOT necessarily represent the verbal clause patterns found in Proto-Austronesian. For example, pattern 2 may not be securely reconstructed for PAN.² The reason for employing the reconstructed forms to represent verbal clause patterns in Philippine-type languages is that it is practically impossible to list in a table all

² Blust (2002:67) states that “PAN **-um-* can only be securely reconstructed in intransitive verbs such as **q-um-uzaN* ‘to rain’, **k-um-aen* ‘to eat’, or **N-um-aŋuy* ‘to swim’...”. Roughly speaking, Blust’s intransitive verbs correspond to monadic verbs in my description and his transitive verbs correspond to my dyadic verbs.

the possible reflexes of these forms in all Philippine-type languages. Strictly speaking, both pattern 2 and pattern 3 can be dyadic or triadic clauses. To simplify the discussion, I will refer to both pattern 2 and pattern 3 as dyadic clause patterns in my discussion.

Pattern 1 typically consists of a monadic verb that contains a reflex of PAN **-um-* (or its probably historically related form PMP **maN*³ and PMP **maR*⁴) and expects only one nominative NP, as in (1)–(3).

(1) Masbatenyo (Wolfenden 2001:40)

pattern 1: monadic **-um-* clause

lumakat=na kamo.
go=now NOM.2P

‘You (pl.) go now.’

(2) Mamanwa (Miller and Miller 1976:50)

pattern 1: monadic **-um-* clause

minlabay siran kazina.
passed.by NOM.3P awhile.ago

‘They passed by awhile ago.’

³ Blust (1999a:68) suggests that **maN-* can be reconstructed for PAN because the traces of **maN-* are found in not only Philippine languages, but also in Formosan and Oceanic languages. The only Formosan evidence that Blust provides is a synchronically unanalyzable form /mangayaw/ ‘to hunt heads’ in Puyuma. In the discussion here, I attribute the reconstructed form **maN-* to PMP (Proto-Malayo-Polynesian) in that verbs with a reflex of **maN-* have never been reported to productively appear in either Pattern 1 or Pattern 2 clauses in any Formosan languages.

⁴ Zeitoun (2002) reconstructs **maR-* as a reciprocal prefix for PAN (Proto-Austronesian) in that the reflexes of **maR-* can be found in some Formosan languages (e.g., Rukai, Paiwan, Puyuma, etc.). However, in the discussion here, I attribute the form **maR-* to PMP because the reflexes of **maR-* are reported to mark only reciprocal verbs in the Formosan languages where it appears and it does not play a role in the “focus systems” of Formosan languages (Ross 1995:772; Zobel 2002:408).

(3) Karao (Brainard 1994a:366)pattern 1: monadic **-um-* clause

ʔonjoʔkow ʔi nga'nga.
 sleep ʔi child

‘The child will sleep.’

Pattern 2 typically consists of a dyadic verb that contains a reflex of PAN **-um-* (or its probably historically related form PMP **maN-* and PMP **maR-*) and expects both a nominative-marked agent and a locative/genitive/oblique-marked patient or theme, as illustrated in the examples from Balangao (4), Tagalog (5), and Maranao (6).

(4) Balangao (Shetler 1976:50)pattern 2: dyadic **-um-* clause

omanop=ayu ah ugha.
 hunt=NOM.2S LCV deer

‘You (sg.) hunt a deer.’

(5) Tagalog (De Guzman 1978:35)pattern 2: dyadic **-um-* clause

gumawaʔ si Angel ng tugtugin.
 make SI Angel GEN music.piece

‘Angel composed a music piece.’

(6) Maranao (McKaughan and Macaraya 1967:xxxiii)pattern 2: dyadic **-um-* clause

tomabas so bebai sa dinis.
 cut SO woman OBL cloth

‘The woman will cut cloth.’

Pattern 3 consists of three subtypes: (a) dyadic **-en* verbs, (b) dyadic **-an* verbs, and (c) dyadic **Si-* verbs. Pattern 3a typically consists of a dyadic verb that contains a reflex of PAN **-en* and expects both a genitive-marked agent and a nominative-marked patient

or theme, as in (7)a. Pattern 3b typically consists of a dyadic verb that contains a reflex of PAN **-an* and expects both a genitive-marked agent and a nominative-marked location, as in (7)b. Pattern 3c typically consists of a dyadic verb that contains a reflex of PAN **Si-* (or PMP **hi-*) and expects both a genitive-marked agent and a nominative-marked instrument, as in (8).⁵

(7) Central Ivatan (Reid 1966:24, 31)

a. pattern 3a: dyadic **-en* clause

<i>kaanárohen</i>	no	tao	<i>qo</i>	<i>hovid.</i>
lengthen	GEN	man	QO	string
<i>*-EN</i>		AGENT		PATIENT/THEME

‘The man is lengthening the string.’

b. pattern 3b: dyadic **-an* clause

<i>qasngenán</i>	no	tao	<i>qo</i>	<i>vahay.</i>
draw.near.to	GEN	man	QO	house
<i>*-AN</i>		AGENT		LOCATION

‘The man is drawing near to the house.’

(8) Mamanwa (Miller and Miller 1976:96)

pattern 3c: dyadic **Si-* clause

<i>Ihawaq=o</i>	kaan	<i>ini=ng</i>	<i>dazopak.</i>
weed.with=GEN.IS	soon	this(NOM)-LIG	knife
<i>*Si=-AGENT</i>			INSTRUMENT

‘I will weed with this knife soon.’

As shown in (7)-(8), all three subtypes of pattern 3 clauses share the same case frame; that is, they all expect a genitive-marked agent and a nominative NP. However, they

⁵ The PMP continuation of PAN **Si-* is often reconstructed as PMP **i-* (rather than **hi*) (see Wolff 1973; Blust 1998a, 2002:66). However, a careful study of verbal morphology in Philippine languages suggests that **hi-*, rather than **i-*, should be reconstructed for PMP. See section 3.2.2.4.2 for details.

differ from each other in the interpretation of the nominative NP. In dyadic **-en* clauses, the nominative NP is usually interpreted as a directly affected theme, as in (9)a and (10)a. In dyadic **-an* clauses, the nominative NP is usually interpreted as a location, as in (9)b and (10)b, or a less directly affected theme, as in (9)c. In dyadic **Si-* clauses, the nominative NP is usually interpreted as an instrument, as in (11).

(9) Botolan Sambal (Antworth 1979:46, 47)

- a. pattern 3a: dyadic **-en* clause

<i>kinan</i>	<i>nin</i>	<i>anak</i>	<i>ya</i>	<i>kanen.</i>
eat	GEN	child	YA	rice
<i>*-EN</i>		AGENT		THEME (DIRECTLY AFFECTED)

‘The child ate the rice.’

- b. pattern 3b: dyadic **-an* clause

<i>inikno-an</i>	<i>ni</i>	Pedro	<i>ya</i>	<i>silya.</i>
sit.on	GEN	Pedro	YA	chair
<i>*-AN</i>		AGENT		LOCATION

‘Pedro sat (down) on the chair.’

- c. pattern 3b: dyadic **-an* clause

<i>tinambayan</i>	<i>ni</i>	Mari	<i>ya</i>	<i>anak.</i>
help.to	GEN	Maria	YA	child
<i>*-AN</i>		AGENT		THEME (LESS DIRECTLY-AFFECTED)

‘Maria helped the child.’

(10) Sarangani Manobo (C. DuBois 1976:43, 46)

- a. pattern 3a: dyadic **-en* clause

<i>kànen</i>	<i>te</i>	toyang	<i>se</i>	<i>osa.</i>
eat	GEN	dog	SE	pig
<i>*-EN</i>		AGENT		THEME

‘The dog will eat the pig.’

- b. pattern 3b: dyadic **-an* clause

inineman te kodà se payà.
 drank.from GEN horse SE coconut.shell
 **-AN* AGENT LOCATION

‘The horse drank from the coconut shell.’

- (11) Southern Ivatan (Hidalgo and Hidalgo 1971:180)

pattern 3c: dyadic **Si-* clause

ipangamung nu tau u pana.
 catch.fish.with GEN man U spear
 **Si-* AGENT INSTRUMENT

‘The man catches fish with the spear.’

Having considered verbal clause patterns in Philippine-type languages, I will move on to the forms of verbs in the next section.

3.2.2 The Forms of Verbs in Formosan and Philippine Languages

Philippine-type languages are known for the inordinate complexity of their verb forms and seemingly unusual type of clause structures. Much has been made in the literature about the “uniqueness” of clause structures in Philippine-type languages, I will not replicate that kind of study here. Instead, I will consider an important topic that is less commonly covered in the literature; that is, the diachronic development of verb forms (and possibly verbal constructions too) in Philippine-type languages. For the purpose of this study, the discussion will focus on the development of verb forms,

particularly the so-called “focus affixes,” in Formosan and Philippine languages.⁶

Readers who are interested in the development of verb forms in other Philippine-type languages are directed to a collection of papers that appeared in *The history and typology of western Austronesian voice systems* (Wouk and Ross 2002).

In the past two decades, great advances have been made in the study of Formosan and Philippine linguistics. A great number of grammars and dictionaries have been produced during this period. With the increased number of grammars and dictionaries, our understanding of individual Formosan and Philippine languages has greatly improved. However, our understanding of the historical development of morphosyntax in these languages is still quite limited and deserves more attention.

This study surveys verb forms in Formosan and Philippine languages. It presents the result of a preliminary typological survey of verb forms in these languages and links the reconstructed PAN and/or PMP verbal affixes (*-um-, *maN-, *maR-, *-en, *-an, and *Si-) with the forms that appear in its or their daughter languages synchronically. After discussing the development of verbal affixes, it suggests some directions for future research. All statements made in the following subsections are based on a careful study of published and unpublished materials of Formosan and Philippine languages that are available to me. A list of references that I consulted for this study will be presented in Appendix 1.

⁶ The term “Formosan languages” is commonly used to refer to all indigenous languages (except Yami) spoken in Taiwan. Formosan languages form several primary subgroups within the Austronesian language family. Yami, spoken on Lanyu (or Orchid Island, or Botel Tobago) of Taiwan, is generally considered to be a Philippine language. Its close relatives are the Batanic languages (include Ivatan, Itbayaten, and Babuyan) spoken in the Philippines.

Proto-Austronesian is often characterized as exhibiting the following system of verbal affixation and “voice” contrast: (i) **-um-*: “active” or “Actor Focus,” (ii) **-en-*: “direct passive” or “Goal Focus,” (iii) **-an-*: “local passive” or “Locative Focus,” and (iv) **Si-*: “instrumental passive” or “Instrumental Focus” (Wolff 1973, 1979; Dahl 1976; Ross 1995, 2002; Blust 1998a, 2002; etc.). This system undergoes a great variety of formal and/or functional changes. In some cases, the formal change is so transparent that reflexes of these forms can be easily identified. In other cases, the change is so drastic that reflexes of these forms can hardly be identified. The function associated with a certain form, in some cases, has been expanded so that the function formerly associated with another form in the system has been taken over by this form. In other cases, the function associated with certain form has been replaced by a new form that was not formerly in the system.

This study links the reconstructed PAN verbal affixes (**-um-*, **-en-*, **-an-*, and **Si-*) with forms that appear in modern Formosan and Philippine languages. It discusses the changes in forms as well as in the functions associated with them. In what follows, the discussion is divided into five parts. Section 3.2.2.1 discusses reflexes of PAN **-um-* in Formosan and Philippine languages and reflexes of PMP **maR-* and **maN-* in Philippine languages. The discussion here is further divided into four parts: section 3.2.2.1.1 deals with reflexes of PAN **-um-* in Formosan languages, section 3.2.2.1.2 deals with reflexes of PAN **-um-* in Philippine languages, section 3.2.2.1.3 deals with reflexes of PMP **maR-* in Philippine languages, and section 3.2.2.1.4 deals with reflexes of PMP **maN-* in Philippine languages. Sections 3.2.2.2–3.2.2.4 cover reflexes of PAN **-en-*, **-an-*, and

**Si-* in Formosan and Philippine languages respectively. Section 3.2.2.5 discusses the formal marking of “Benefactive Focus” verbs in Formosan and Philippine languages.

3.2.2.1 Reflexes of PAN **-um-* and PMP **maR-* and **maN-*

Most, if not all, Formosan and Philippine languages make use of verbs that contain reflexes of PAN **-um-* in verbal clause patterns 1 and 2 (i.e., “Actor Focus” constructions). However, Formosan languages differ from Philippine languages (and other “western Malayo-Polynesian languages”) in the following respect.⁷ “Actor Focus” verbs may be morphologically marked in more than one way in Philippine languages (and other “western Malayo-Polynesian languages”), but not in Formosan languages.⁸

In most Philippine languages, “Actor Focus” verbs may be morphologically marked in three different ways: they may be marked by reflexes of PAN **-um-*, reflexes of PMP **maR-*, or reflexes of PMP **maN-*. The choice of one form over the others is determined by verb class and the meaning that one intends to convey, and it may vary from one language to another. In general, **-um-* verbs are typically used to express either punctual or inchoative events, **maR-* verbs are typically used to describe reciprocal, reflexive, or

⁷ The term “Western Malayo-Polynesian languages” covers the Austronesian languages spoken in the Philippines, western Indonesia-Malaysia, Malagasy, Chamorro, and Palauan. These languages are similar in their grammatical systems (i.e., the existence of the so-called “focus system”), but do not form a single subgroup within the Austronesian language family (see Blust 1999a for detailed discussion).

⁸ In some Formosan languages, dynamic “Actor Focus” verbs may have the phonological shape *ma-* (as in Mayrinax Atayal, Puyuma, Isbukun Bunun, and Takbanuað Bunun, etc.) or *mi-* (as in Takbanuað Bunun and Amis). However, dynamic verbs in Formosan languages having *ma-* or *mi-* forms are not as widespread as **maR-* verbs or **maN-* verbs, which are present in nearly all Philippine languages. Whether these *ma-* dynamic verbs in Formosan languages may be the historical source of PMP **maN-* and **maR-*, as suggested by Laurie Reid (pers. comm.), is a question that deserves further investigation.

durative events, and **maN-* verbs are typically used to describe distributive events (i.e., events that imply multiple activities, actions, or actors over time or space).

3.2.2.1.1 Reflexes of PAN **-um-* in Formosan languages

Most, if not all, Formosan languages retain a reflex of PAN **-um-*.⁹ Three variants of reflexes of PAN **-um-* are attested in Formosan languages. The first variant is an infix form with the phonological shape *-(V)m-*, the second variant is a prefix with the phonological shape *mV-*, and the third variant is a prefix with the phonological shape *m-*.

Most Formosan languages reflect PAN **-um-* as an infix (*-um-*, *-om-*, *-em-*, or *-m-*).¹⁰ The form *-um-* appears in C?uli? Atayal (Mayrinax), Seediq (Y. L. Chang 1997, 2000b), Kanakanabu, Saaroa, Central Amis (Wu 2000), Basay, and Thao (Blust 2003a).¹¹ The form *-om-* appears in Central Amis (Fey 1986). The form *-em-* occurs in Nataoran Amis, Northern Paiwan, Nanwang Puyuma, and Kanakanabu (as a variant of *-um-* that appears only in combination with a perfective form, *-inem-*). In Squiliq Atayal (Wulai), Paran Seediq, Siraya, Kavalan, and Thao (stems beginning with *s-*, or *k-*, or *t-*), the reflex of **-um-* undergoes vowel deletion and appears as *-m-*.

Less commonly, reflexes of **-um-* appear as the second variant, a prefix with the phonological shape *mV-* (*mu-* or *me-*) in some Formosan languages. The prefix form probably developed historically from a metathesis of the initial root consonant with the

⁹ I exclude all dialects of Rukai from my survey of reflexes of PAN verbal affixes in that Rukai is generally considered not to be a Philippine-type language.

¹⁰ Following the tradition in Austronesian literature, I use the letter *e* to represent a schwa /ə/ in Formosan and Philippine languages in this chapter.

¹¹ Please refer to Blust (2003a:184–186) for the form and function associated with the reflex of PAN **-um-* in Thao.

nasal of the infix **-um-*. The prefix form *mu-* occurs in Tsou, Kanakanabu, and Pazih/Pazeh, (and possibly in Takbanuað Bunun too).¹² The form *me-* occurs in Nanwang Puyuma (and in Tsou and Pazih/Pazeh as a phonologically-conditioned variant of *mu-*).

The third variant *m-*, found in virtually all Formosan languages, typically appears as a phonologically conditioned variant of the first or the second variant, but in the Southern Tsouic languages Kanakanabu and Saaroa, its occurrence is lexically conditioned (it occurs with verb Classes II and III). In languages where *m-* is phonologically conditioned, two major conditioning factors are found. First, *m-* occurs with stems beginning with a vowel, as in Cʔuliʔ Atayal (Mayrinax), Paran Seediq, Tsou, Pazih/Pazeh, Basay, Siraya, Thao, Isbukun Bunun, Northern Paiwan, and Nanwang Puyuma. Second, *m-* appears with stems beginning with a labial, glottal stop, uvular stop, *R*, *r*, or *k* and creates “pseudo nasal substitution” (e.g., Sqliq Atayal *miq* (< **-um-* + *big*) ‘give’). For example, in Thao and Pazeh, *m-* occurs with *p*-initial stems (Blust 1998b, To appear). In some languages, *m-* appears not only with labial-initial stem (*p* or

¹² Blust claims that, the form *mu-* in Formosan languages may come from two sources: (i) it may reflect the infix **-um-* that occurs in the “active” or “Actor Focus” verbs, and (ii) it may reflect the prefix **mu-* that occurs in motion verbs only. In some Formosan languages (such as Thao, Paiwan, and Siraya), the form *mu-* is associated with motion verbs only (Blust 1999a, 2003b; Adelaar 1997). In Pazeh, *mu-* is associated with the “active” or “Actor Focus” verbs. In Kanakanabu, *mu-* can be associated with either one of the two sources depending on verb classes. In Takbanuað Bunun, it is not clear whether *mu-* is associated with motion verbs only or not. Although Jeng (1977) considers *mu-* as an “Actor Focus” marker in Takbanuað Bunun, the examples appear in his book are all motion verbs (e.g., *musuqais* ‘return’, *muqalqal* ‘fall down’). More study needs to be carried out in order to figure out the source(s) of *mu-* in Takbanuað Bunun (and other Formosan languages too). An alternative account for this is that reflexes of **-um-* undergo morphological split in some Formosan languages, resulting in *mu-* being associated with motion verbs only, but *-um-* with “Actor Focus” verbs. Such an explanation can provide a simple account for the fact that *-um-* is associated with “motion verbs” (such as *lumangngan* ‘walk’, *sumakat* ‘go up’, etc.) in Sama Bangingi’ (Gault 2002:376).

b) but also with a uvular stop (Kavalan, Squaliq Atayal, and Paran Seediq) or glottal stop (Squaliq Atayal). In Tsou, *m-* occurs with *r*-initial stems (e.g., Tsou *mufʔo* (< **-um-* + *rúfoʔ*) ‘bury’). In Saisiyat, *m-* occurs with stems beginning with non-coronal stops *p*, *k*, or *ʔ* (e.g., Saisiyat *maNraLan* (**-um-* + *paNraLan*) ‘walk’, *malas* (< **-um-* + *ʔalas*) ‘take away’, *marmaʔ* (< **-um-* + *parmaʔ*) ‘steal’).

3.2.2.1.2 Reflexes of PAN **-um-* in Philippine languages

Most, if not all, Philippine languages retain a reflex of PAN **-um-*. Like Formosan languages, there are also three variants of reflexes of PAN **-um-* attested in Philippine languages. However, the phonological shape of reflexes of PAN **-um-* found in Philippine languages is somewhat more diverse than that found in Formosan languages. The first and the third variants in Philippine languages, as in Formosan languages, are an infix with the phonological shape *-(V)m-* and a prefix with the phonological shape *m-* respectively. However, the phonological realization of the second variant is somewhat different between Formosan and Philippine languages. The second variant in Formosan languages is a prefix with the phonological shape *mV-*; in Philippine languages, it is also a prefix but with three possible phonological shapes *mV-*, *(ʔ)Vm-*, or *(ʔ)Vn-*.

Most Philippine languages retain reflexes of PAN **-um-* as an infix (*-um-*, *-om-*, *-em-*, or *-m-*). The form *-um-* is found in the majority of Cordilleran languages (e.g., Ilokano, Artá, Kalinga, Ifugao, Balangao, Bontok, Isnag, Yogad, Ibanag, Agta, Casiguran Dumagat, etc.), in Bashiic languages (Yami and Southern Ivatan), in Kapampangan, in Central Philippine languages (e.g., Tagalog, Bikol, Waray, Sorsoganon, Masbatenyo,

Aklanon, etc.), in Manobo languages (e.g., Cotabato Manobo, Tasaday, etc.), in Sama Bajaw languages (e.g., Sama Bangingi', Mapun, Yakan, etc.). The form *-om-* appears in Northern Kankanay, Central Ivatan, Itbayat, Sambal, Agutaynen, Mansaka, Sarangani Manobo, Maranao, etc. Tboli has a form *-em-* or *-m-*, and Blaan has a form *-m-*.

Relatively fewer Philippine languages reflect PAN **-um-* as a prefixal form (*mu-*, *mo-*, *om-*, *ʔum-*, *ʔun-*, *un-*, *ʔon-*, or *an-*). The prefix form *mu-* probably developed historically from a metathesis of the initial root consonant with the nasal of the infix **-um-*, and is found in some Central Philippine languages (e.g., Cebuano, Boholano, Leyteño, Surigaonon, and Naturalis).¹³ In Botolan Sambal, the prefix *mo-* appears with bases beginning with *ow* (phonemically /w/) (e.g., *mowako* 'walk', *mowayo* 'run') (Antworth 1979:15). In Sarangani Manobo, the infix form *-om-* /-um-/ infrequently occurs with stems beginning with a glottal stop, although it is often replaced by the short form *m-* (e.g., *omoli* /ʔumuliʔ/ or *moli* /muliʔ/ 'will go home') (C. DuBois 1976:21).¹⁴ In all Southern Cordilleran languages (Ibaloy (or Inibaloi or Nabaloi), Kalanguya (or Kallahan), Karao/Karaw, Pangasinan, and Ilongot), the infix **-um-* has changed to the prefix PSC (Proto-Southern Cordilleran) **ʔum-* in the imperfective aspect, although the perfective remains an infix (e.g., Pangasinan *-inm-*; Ibaloy and Karao *-im-*). Four different prefixal forms are found in descriptions of Southern Cordilleran languages: *ʔum-* (Keley-i Kallahan), *ʔun-* (Kayapa Kallahan), *un-* (Pangasinan),¹⁵ *ʔon-* (Ibaloy and

¹³ Jason Lobel (pers. comm.) points out to me that Boholano and Leytenyo are very clearly dialects of Cebuano.

¹⁴ The stem-initial glottal stop is not represented in Sarangani Manobo orthography.

¹⁵ Benton (1971) uses the form *on-* for the imperfective in Pangasinan.

Karao) (Himes 1998:140).¹⁶ In the Central Philippine language Mamanwa, the non-perfective aspect has a prefix form *an-*, but the perfective aspect has a form *min-*. It is clear that the *m-* in the form *min-* is a reflex of **-um-*, but it is not clear whether the prefix *an-* might have developed from **-um-* or from other source(s).¹⁷

In some Philippine languages, the third variant *m-* occurs as a phonologically conditioned form of the first or the second variant. Two factors condition the occurrence of the prefix *m-*. First, it occurs before stems beginning with a vowel, as in Arta, Ivatan, Botolan Sambal, Kakilingan Sambal, Mansaka, Maranao, Tboli, Kagayanen, etc. Second, it replaces the stem-initial labial consonant (e.g., Yami, Kakilingan Sambal, Maranao, Tausug, Tboli, etc.) and/or a glottal stop (e.g., Sarangani Manobo).¹⁸

Comparing Philippine languages with Formosan languages, we find that they differ in that segments such as *r*, *k*, *q*, or *R* can condition the occurrence of *m-* in Formosan languages, but cannot do so in Philippine languages.

¹⁶ Using data from multiple sources, Himes (1998) describes four different prefixal forms in Southern Cordilleran languages. Reid (pers. comm.) has pointed out to me that the difference between forms showing glottal stop versus vowel initial, and forms which differ depending on whether they have *u* or *o* as the vowel might be the result of orthographic (or analytic) differences between authors.

¹⁷ Reid suggests the following scenario as to how Pangasinan *un-* or Ibaloi (Inibaloi) *ʔon-* and Mamanwa *an-* may have developed. “Re the *an-* form in Mamanwa. Of course *min-* would have developed from **-umin-*. No problem there. I suspect that *an-* is a continuation of *-um-*, but one can hardly call it a “reflex” because it is irregular. Remember that Inibaloi (and Pangasinan) has *ʔon* (and *un-*) with alveolar nasal as the “reflex” of *-um-*. In Inibaloi, the *m* changed to *n* probably by analogy with the ending of the *man-* affix. In Mamanwa it could have changed to *n* by analogy with the corresponding past tense form *min-*. The change of the vowel to *a* from *u* could have been by analogy with other prefixes, *mag-* and *mang-*, all of which have an *a* vowel. Although speculative, the kinds of changes are quite expected, and I prefer this to proposing that Mamanwa completely replaced *-um-* with a reflex of a form which is not well established... there are certainly no possible reflexes of a **man-* in any of the other Central Philippine languages. Also the lack of an initial *m-* on Mamanwa *an-* implies that it may have originated from *um-*. If it were a reflex of a *man-* why would it not have retained the initial *m-* to match *mag-* and *mang-*? The *man-* in Pangasinan, is, as you say, the irregular reflex of **maR-* as in other South-Central Cordilleran languages....” (Laurie Reid pers. comm.)

¹⁸ I would like to thank Carl Rubino for sharing with me some Tausug data that he collected to conduct this study.

One thing that needs to be noted is that the domain that reflexes of PAN *-um- can occur has been gradually taken over by reflexes of *maR- (or *maN-), so that in some Central Philippine languages, Manobo languages, and Sama Bajaw languages *-um- verbs occur in very limited environments. For example, in Bikol, -um- only occurs in two situations: (a) it sometimes can be used as an alternative form of mag- in giving commands (e.g., *Magbakál* (or *Bumakál*) *ka nin gátas*. ‘Buy milk.’); (b) it occurs as part of the “consequential” affix -umin- (Mintz 1971:143, 260, and pers. comm.).¹⁹ In Cotabato Manobo, the form -um- only appears in future, desire, or mild imperative verbs (with first person plural). In Sama Bangingi’, it is reported that -um- only occurs with a restricted set of motion verbs (e.g., *lumangngan* ‘walk’, *sumakat* ‘go up’) (Gault 2002:376). In Mapun, -um- usually occurs with non-volitional intransitive verbs (e.g., *Lay humaya? anak nu*. ‘Your (sg.) child fell on his back.’) (Collins et. al., 2001:581). In Yakan, -um- signifies abilitative, circumstantial, or involuntary aspect in intransitive construction (e.g., *tumuli ku ensini?*. ‘I fell asleep earlier.’) (Behrens 2002:439). In Manuk Mangkaw Sinama, as described by Akamine (1996:114, footnote 13), the infix -um- is not productive and occurs in only two intransitive sentences, e.g., *Anak-anak iya lumangngan tudju tahik*. ‘The child is the one who walked to the sea.’ and *Ingkanda bey kumahappaq*. ‘The maiden tumbled.’

¹⁹ Mintz (pers. comm.) states that “when the consequential affix is chosen, the indicated action occurs as the result of some previous action, and because of this, it is not under the complete control of the agent.” The following examples exemplify the use of the consequential affix -umin-. For example,

- (a) *Suminakát siyá kan nagapód an mamá niyá ta? da?i siyá tinutugótan na magkawat sa luwás*.
‘She went upstairs when her mother called because she was not permitted to play outside.’
- (b) *Uminapód akó nin bombéro kan nakapárong akó nin asó*.
‘I called the fireman when I smelled smoke.’

3.2.2.1.3 Reflexes of PMP **maR-* in Philippine languages

As mentioned in section 3.2.1, unlike Formosan languages, Philippine languages make use not only of verbs containing reflexes of PAN **-um-*, but also of verbs containing reflexes of PMP **maR-* and **maN-* productively in pattern 1 and pattern 2 clauses. The latter two classes of verbs are probably historically related to the first class of verbs. That is, **maR-* verbs and **maN-* verbs probably developed historically by attaching **-um-* to a word that has been previously derived with either PMP **paR-* or PMP **paN-*. There are a wide range of functions associated with each of these verbs and they differ from language to language. In general, **-um-* verbs express either punctual or inchoative events, **maR-* verbs describe reciprocal, reflexive, or durative events, and **maN-* verbs describe distributive events. In what follows, I first discuss reflexes of PMP **maR-* in Philippine languages in this section, and then discuss reflexes of PMP **maN-* in the next section.

Reflex of PMP **maR-* are found in most, if not all, Philippine languages. The actual form that occurs typically depends upon the reflex of PAN/PMP **R*.²⁰ In languages in which the expected reflex of **R* is *g*, reflexes of PMP **maR-* appears as *mag-*, *meg-*, *eg-* [əg], or *og-*. The form *mag-* appears in the majority of Philippine languages, including the Northern Cordilleran languages (e.g., Casiguran Dumagat, Agta, Isnag, Ga'dang, Itawes/Itawis, Atta, Yogad, etc.), Central Philippine languages (e.g., Tagalog, Bikol, Cebuano, Waray, Sorsoganon, Masbatenyo, Hiligaynon/Ilonggo, Mansaka, Mamanwa, etc.), some Manobo languages (e.g., Kagayanen Manobo), Danao languages (e.g.,

²⁰ Please refer to Conant (1911) for detailed discussion of reflexes of PAN/PMP **R* in Philippine languages.

Maranao, Magindanao, etc.), Sama Bajaw languages (e.g., Yakan, Mapun, etc.). Among the languages that reflect **maR-* as *mag-*, most of the languages invariantly retain it as *mag-*, as in (12). However, in some of the Cagayan Valley languages of the Northern Cordilleran group (Ga'dang, Itawes/Itawis, Atta, Ibanag, Yogad, but not Agta and Isnag) *mag-* undergoes complete assimilation with the initial consonant to which it is attached creating a geminate cluster such as *magg-*, *mall-*, *maww-*, *matt-*, etc., as shown in (13).

(12) Bikol (Mintz 1971:9, 26)

mag- as a reflex of **maR-* (completive aspect *nag-*):

- a. *nagpulí* si José.
go.home SI José
(*nagpulí* < *mag-* + *-in-* 'completive' + *pulí* 'to go home')
'José went home.'
- b. *nagbakál* ako nin tinápáy.
bought NOM.IS GEN bread
(*nagbakál* < *mag-* + *-in-* 'completive' + *bakál* 'to buy')
'I bought bread.'

(13) Yogad (Davis et al. 1998:23, 169, 175, 178)

mag- as a reflex of **maR-* (with complete assimilation):

- a. *mageksirsísyu*=kan.
exercise=NOM.IS
(*mageksirsísyu* < *mag-* + *eksirsísyu* 'exercise')
'I am going to do exercise.' (*I am going to exercise someone.)
- b. *mattúrut*=(da) yu atáp.
leak(=now) YU roof
(*mattúrut* < *mag-* + *túrut* 'leak')
'The roof is leaking (now).'

- c. *mallukág=kan tu ulú nu familya.*
wake=NOM.1S LCV head GEN family

(*mallukág* < *mag-* + *lukág* 'wake')

'I'll wake the head of the family.'

- d. *mabbibbíd=kan tu nobéla.*
read=NOM.1S LCV novel

(*mabbibbíd* < *mag-* + *bibbíd* 'read')

'I am reading a novel.'

In some of the languages spoken in Mindanao, Proto-Philippine (PPh) **a* has raised to a mid vowel *e* [ə] in prepenultimate syllables in Ilianen Manobo and Western Bukidnon Manobo (Elkins 1963; Reid 1973:491); consequently, reflexes of **maR-* appear as *meg-*, *eg-*, or *og-*. In languages such as Sarangani Manobo, Sindangan Subanen, Tboli, Blaan, etc., PPh **a* has changed to *e* [ə], and reflexes of **maR-* appear as *meg-* (14); in Cotobato Manobo, Tasaday, Agusan Manobo, Dibabawon Manobo, and Ata Manobo, etc., reflexes of **maR-* undergo further reduction and appear as *eg-* [əg] (15), or *og-* [ig] (16).²¹

(14) Sarangani Manobo (C. DuBois 1976:28, 58)

meg- as a reflex of **maR-* (completive aspect *mig-*):

- a. *meglegeb=a melaw.*
visit=NOM.1S unexpectedly
(*meglegeb* < *meg-* + *legeb* 'to visit')
- 'I will visit around instead.'

²¹ In the orthography of Dibabawon Manobo and Ata Manobo, the letter *o* represents a high back open unrounded "pepet" vowel [i].

- b. *meg-elomo se esawa=din te kànen.*
 cook SE wife=GEN.3S LCV food
 (*meg-elomo* < *meg-* + *-elomo* ‘cook’)
 ‘His wife will cook food.’
- c. *mig-elomo se esawa=din te kànen.*
 cook SE wife=GEN.3S LCV food
 (*mig-elomo* < *meg-* + *-in-* ‘completive’ + *-elomo* ‘cook’)
 ‘His wife cooked food.’

(15) Tasaday (Reid 1993:11)

əg- as a reflex of **maR-*:

əgfəlakət=da baŋi?

wear=NOM.3P clothes

(*əgfəlakət* < *əg-* + *fəlakət* ‘wear’)

‘They are wearing clothes.’

(16) Ata Manobo (Morey 1964:73)

og- as a reflex of **maR-*:

ogqaad=a to babuy asoom.

fence=NOM.1S TO pig tomorrow

(*ogqaad* < *og-* + *qaad* ‘fence’)

‘Tomorrow I will fence in a pig.’

In languages in which the expected reflex of **R* is *r* (e.g., Ilokano and Arta), reflexes of **maR-* exhibit irregularity. In Ilokano, the expected reflex of **maR-* would be **(*m*)*ar-*,²² but the form that is found is *ag-* (completive form is *nag-*) (17). Similarly, in Arta, the expected reflex of **maR-* would be ***mar-*. Instead, it is simply *ma-* (e.g., *ma-luwág* ‘awaken’, *ma-ratáng* ‘buy’, *ma-tatagdu* ‘drip’, *ma-ttalípa* ‘dance’, *ma-llegut* ‘revolve’, *ma-ggurugud* ‘run’, etc.) (Reid 1989:62). In some of the above Arta examples,

²² In this study, a single asterisk (*) is used for a reconstructed form, and a double asterisk (**) is used for a non-occurring form.

the initial consonant of the root to which this prefix attached is sporadically geminated, possibly in imitation of the result of the assimilation rule in Cagayan Valley languages (e.g., Ga'dang).

(17) Ilokano (Vanoverbergh 1955:130, 132)

ag- as a reflex of **maR-* (completive aspect *nag-*):

- a. ***agbása=ka*** ití líbro.
 read=NOM.2S ITI book
 'You (sg.) read a book.'
- b. ***nagkatáwa*** dagití balásang.
 laugh DAGITI girls
 'The girls laughed.'

Languages such as Western Bukidnon Manobo and Ilianen Manobo, in which the expected reflex of **R* is *g*, the final consonant assimilated to the point of articulation of the initial consonant of the stem resulting in the variants *mag-*, *mab-*, *mad-*. Subsequently the *mad-* variant generalized to precede also glottal stop initial stems, replacing the inherited *mag-* in this position. Since the prefixes are in the prepenultimate position, **a* became *e*, resulting in *med-*, *meb-*, and *meg-*. In present day Western Bukidnon Manobo, *med-*, *meb-*, and *meg-* mark 'unactualized' forms of the verb, while *ed-*, *eb-*, and *eg-* mark 'non-past' forms of the verb, and *mid-*, *mib-*, and *mig-* mark 'past' forms of the verb, as in (18)a–b.

(18) Western Bukidnon Manobo (Elkins 1968:xvi, xii)

med- as a reflex of **maR-* (unactualized aspect *med-*; non-past aspect *ed-*):

- a. wazaʔ=kew *med*ʔuwit.
 NEG=NOM.2P carry
 (*med*ʔuwit < *med-* + ʔuwit ‘to carry’)
 ‘You (pl.) didn’t carry.’
- b. emun duan begas *ebpemasa*=a.
 if EXIST rice buy=NOM.1S
 (*ebpemasa* < *ed-* + *pemasa* ‘buy’)
 ‘If there is rice, I will buy some.’

In the language group consisting of Bashiic languages, Sambalic languages, Kapampangan, Northern Mangyan (Iraya, Alangan, Tadyawan) where the expected reflex of **R* is *y*,²³ reflexes of PMP **maR-* appear as *may-*, or a further development *mi-* (<?Proto-Bashiic **may-* < **maR-*). The reflex *may-* is found in some Bashiic languages, such as Central Ivatan (19), Southern Ivatan, and Babuyan. The form *mi-* occurs in some Bashiic languages (Yami and Itbayat (20)), Sambalic languages (Botolan Sambal and Kakilingan Sambal), and Kapampangan. The fact that reflexes of **maR-* appear as *may-* in some languages but *mi-* in some languages raises two interesting issues regarding the internal relationships among these languages. First, Itbayat, which is commonly assumed to be more closely related to Ivatan than Yami, shares the same development from **maR-* to *mi-* with Yami. Whether this fact suggests that Itbayat might be more closely related to Yami than to Ivatan is a topic deserving further investigation. Second, whether all languages that show a *mi-* reflex of **maR-* might have developed the *mi-* form because of

²³ This subgroup was proposed by David Zorc (1974, 1986).

descent from a common ancestor (i.e., these languages form a single subgroup), or have developed it independently is a topic that deserves further research.

(19) Central Ivatan (Reid 1966:39, 42)

may- as a reflex of **maR-*:

- a. *mayliliak* qo tao.
 speak QO man
 (*mayliliak* < *may-* + *liliak* ‘to speak’)
 ‘The man is speaking.’
- b. *maynasnas* qo tao so/do láta.
 scrape QO man OBL/LCV can
 (*maynasnas* < *may-* + *nasnas* ‘scrape’)
 ‘The man is scraping a can.’

(20) Itbayat (Yamada 2002:20, 22)

mi- as a reflex of **maR-*:

- a. *mittado* o angang awi.
 leak O jar that
 (*mittado* < *mi-* + *t* (consonant gemination) + *tado* ‘to leak’)²⁴
 ‘That jar is really leaking.’
- b. *miraʔmon* si apsergag no ranom=ta.
 wash.own.face SI Apsergag GEN water=GEN.ID
 (*miraʔmon* < *mi-* + *raʔmon* ‘wash.face’)
 ‘Apsergag washes her own face with our (dl.) water.’

One more fact found in this group of languages is of great interest to historical linguists. In Kapampangan and Sambalic languages (Botolan Sambal and Kakilingan Sambal), reflexes of **maR-* appear in two forms: *mi-* ((21)a) and *mag-* ((21)b). These two forms are associated with different functions: *mi-* is mainly associated with verbs

²⁴ Yamada (2002:15) states that “The consonant gemination (C₁C₁) expresses augmentation of such meanings as habit, time, space, smell and/or taste, plurality, superlative, process, shape, imminence, etc.”

encoding collective or reciprocal situation, and *mag-* with other functions. Because the regular reflex of **R* in these languages is *y* rather than *g-*, the expected reflex would not be *mag-*. One question arises, “Where does the form *mag-* come from?”. Two hypotheses might account for the origin of *mag-* in these languages. First, it is a borrowed form from Tagalog (or other prestigious language in this area).²⁵ Second, it was introduced by the same prehistoric language that brought about the doublet *g* reflex of **R* in languages such as Ilokano.²⁶ The actual reflex of **maR-* in Ilokano is *ag-* rather than the expected form **(*m*)*ar-*.

(21) Kapampangan (Forman 1971:123, 103)

a. *mi-* as a reflex of **maR-*:

adúa=la=ng *mípaté*.

two=NOM.3P=LIG fight

(*mípaté* < *mi-* + *paté* ‘fight’)

‘They two fight each other.’

b. *mag-* as a reflex of **maR-*:

magmanéu=ya=ng *jíp*.

drive=NOM.3S=LIG jeep

(*magmanéu* < *mag-* + *manéu* ‘drive’)

‘He drives a jeep.’

²⁵ Reid (pers. comm.) considers that the existence of *mag-* in Kapampangan and Sambalic languages is less likely to be the result of Tagalog influence in that “Tagalog influence in this region is relatively recent. The whole of the Manila area was once settled by Kapampangan speakers and Tagalogs were much further to the south, only in Marinduque, and adjoining coastal areas of Luzon.”

²⁶ Referred to by Conant (1911) as the “stereotyped Philippine *g*”. Blust (1991:100–101) states: “The simple existence of Conant’s “stereotyped *g*” could be explained as the product of borrowing between geographical contiguous languages, many of which had independently undergone the change in question. However, the language which regularly underwent the change **R* > /*g*/ almost invariably is the predominant donor language. From this observation we can reasonably infer that languages showing the regular change **R* > *g* tended to have superior prestige in these prehistoric contact situations. If the merger of **R* and **g* occurred repeatedly only once in the linguistic history of the central and southern Philippines we must ask why the languages which underwent this change appear to have acquired prestige with it.”

The Meso-Cordilleran languages, including South-Central Cordilleran languages, Northern Alta, and Southern Alta, in which the reflex of **R* is *l*, all show the innovated form *man-*, or a further development, such as *mon-*, *mun-*, *men-* [m̄in or m̄ən], *min-*, *an-*, *ʔin-*, *ʔen-* [ʔən]. The form *man-* occurs in most of the West Southern Cordilleran languages and in some Central Cordilleran languages.²⁷ The /n/ in *man-* does not undergo nasal assimilation in most of the West Southern Cordilleran (such as Karao, Ibaloy (or Inibaloi), Pangasinan (22), etc.),²⁸ but does undergo homorganic nasal assimilation in some Central Cordilleran languages (such as Balangao, Limos Kalinga (23), etc.) and in Keley-i Kallahan (a Southern Cordilleran language). In cases where *man-* undergoes homorganic nasal assimilation, the reflex of **maR-* (*man-* with nasal assimilation) and the reflex of **maN-* (*mang-* with nasal assimilation and consonant deletion) are sometimes hard to distinguish. The only key that one can use to distinguish reflexes of **maR-* and **maN-* is to check whether the stem initial consonant is retained

²⁷ See Himes (1998) for a description of the internal relationships of Southern Cordilleran languages.

²⁸ Benton (1971:23-24) observes that the /n/ of *man-* (irregular reflex of **maR-*) and *on-* (irregular reflex of **-um-*) is likely to be retained in slow speech, but it will undergo nasal assimilation in normal to rapid speech; thus *manbása* (*man-* 'future, active, transitive' plus *bása* 'read') will become *mambása* in rapid speech.

after nasal assimilation.²⁹ If the stem initial consonant is retained after nasal assimilation, as in (23), then the prefix attached to the stem is a reflex of **maR-*. If it is deleted after the assimilation, as in (24), then the prefix attached to the stem is a reflex of **maN-*.

(22) Pangasinan (Benton 1971:55, 158, 192)

- a. *man-* as a reflex of **maR-* (without nasal assimilation):

manpátanír=ak=la.

say.goodbye=NOM.1S=already

(*manpátanír* < *man-* + *pátanír* ‘to say goodbye’)

‘I will say goodbye already.’

- b. *man-* as a reflex of **maR-* (completive aspect *nan-*):

nanlóto si Juan na báaw.

cook SI John GEN rice

(*nanlóto* < *man-* + *-in-* ‘completive’ + *lutó* ‘cook’)

‘John cooked rice.’

- c. *man-* as a reflex of **maR-* (completive aspect *nan-*):

nanpékpek=ak na duég.

hit=NOM.1S GEN carabao

(*nanpékpek* < *man-* + *-in-* ‘completive’ + *pékpek* ‘hit’)

‘I hit a carabao.’

²⁹ Some language-specific phenomena may be used to distinguish reflexes of **maN-* and **maR-* in Meso-Cordilleran languages. For example, in Pangasinan, *man-*, the reflexes of **maR-*, may undergo nasal assimilation only in normal and rapid speech, but not in the slow speech. When *man-* does undergo nasal assimilation, in addition to the consonant deletion test, one can use the completive aspect form to distinguish *man-* from *maN-* (the reflex of **maN-*). In Pangasinan (but not in other Cordilleran languages), the incomplete form *man-* (the reflex of **maR-*) has a corresponding completive form *nan-*, whereas the incomplete form *maN-* (the reflex of **maN-*) has a corresponding completive form *aN-*. Moreover, *man-* triggers stress shift, but *maN-* does not. *Man-* usually requires stress on the syllable immediately following it, but *maN-* does not. For example, when the roots *paltóg* and *kawés* occur with *man-*, the stress shifts from the last syllable of the root to the syllable immediately following *man-* (*manpáltog* ‘hunt’ and *mankáwes* ‘dress oneself’). By contrast, when *paltóg* and *kawés* occur with *maN-*, stress is retained on the last syllable of the root (*mamáltóg* ‘hunt’ and *mangawés* ‘dress oneself’) (Benton 1971:23–24, 133–134).

(23) Limos Kalinga (Ferreirinho 1993:27, 39)

- a.
- man-*
- as a reflex of *
- maR-*
- (with nasal ASSIMILATION):

mambadut.³⁰

put.on.clothes

(*mambadut* < *man-* + *badut* 'clothes')

'She put clothes on.'

- b.
- man-*
- as a reflex of *
- maR-*
- (completive aspect
- nan-*
-):

nandalus si Malia=t danat palatu.

wash SI Maria=LCV PL plate

(*nandalus* < *man-* + *-in-* 'completive' + *dalus* 'to wash')

'Maria washed some plates.' (The action is non-durative, the plates are only partially affected, and they are referred to indefinitely.)

(24) Limos Kalinga (Ferreirinho 1993:29)*mang-* as a reflex of **maN-* (with nasal SUBSTITUTION).³¹*mananum*=ak.

fetch.water=NOM.1S

(*mananum* < *mang-* + *danum* 'water')

'I'm fetching water.'

In Kadaklan Bontok (or Eastern Bontok), the reflex of **maR-* appears as *mon-* (with no nasal assimilation), as in (25). In Batad Ifugao, the form *mun-* (with homorganic nasal assimilation) is found, as in (26). The /n/ in *mun-* is realized as *m* when followed by *b*, *p*, or *m* (e.g., *mumbuhug* < *mun-* + *buhug*), as *ŋ* when followed by *g*, *k*, *ŋ*, or *w* (e.g.,

³⁰ The third person singular nominative pronoun is phonologically null in Limos Kalinga.

³¹ Ferreirinho (1993:39) uses the form *nangalus* in the following example. It seems that this form might be a typographical error for *nanalus*.

Limos Kalinga*nangalus* si Malia=t danat palatu.

wash SI Maria=LCV PL plate

(*nangalus* < *mang-* + *-in-* 'completive' + *dalus* 'to wash')

'Maria washed some of the plates' (The action is distributive, that is, the plates were washed individually, one after another.)

munngādan < *mun-* + *ngādan*), and as *n* in other environment (e.g., *munhādag* < *mun-* + *hādag*) (Newell 1993:7-8). In Upper Tanudan Kalinga, both *man-* and *an-* occur. It is not clear whether these two forms are in free variation or not.

In Southern Alta, reflexes of **maR-* appear in several variant forms. On roots that appear to be inherited, *man-* (the reflex of Proto-Meso-Cordilleran **man-*), *mon-*, or *mun-* (reflexes of **men-*, showing sporadic raising of the vowel in **man-*) is used. On some roots that are clearly Tagalog loans, *mag-* or *mog-* is used, perhaps developed by analogy with *man-/mon-*. It is still not clear whether the different forms may mark different aspectual or other syntactic information (Reid 1991:274).

(25) Kadaklan Bontok/Eastern Bontok (Fukuda 1997:35, 40)

mon- as a reflex of **maR-* (without nasal assimilation):

- a. *monkilo* he Pedro he fokas.
weight HE Pedro HE rice
(*monkilo* < *mon-* + *kilo* ‘kilogram’)
‘Pedro weights rice.’
- b. *monʔakhas* he Pedro hen anak=na.
treat HE Pedro HEN child=GEN.3S
(*monʔakhas* < *mon-* + *ʔakhas* ‘medicine’)
‘Pedro treats his child with medicine.’

(26) Batad Ifugao (Newell 1993:467)

- a. *mun*ʔahāwa da Ālig ay Rosa.
marry DA Ālig LCV Rosa
(*mun*ʔahāwa < *mun-* + *ʔahāwa* ‘spouse’)
‘Ālig and Rosa will marry each other.’

- b. *mun-* as a reflex of **maR-* (completive aspect *nun-*):

nun?apuy nan babaih nan galut.
burn NAN woman NAN trash

(*nun*?apuy < *mun-* + *-in-* ‘completive’ + ?apuy ‘fire’)

‘The woman burned the trash.’

Unlike Southern Alta, Northern Alta consistently uses *men-* [min] (with homorganic nasal assimilation) even with verbs that are clearly borrowings from Tagalog, or some other languages (e.g., dance, sell, sweep, wash clothes, wash face, weave cloth, etc.), as in (27) (Reid 1991:274).

In Central Bontok and Northern Kankanay,³² reflexes of **maR-* occurs as *men-* [mən] (with no nasal assimilation), as in (28). In Talubin Bontok, *min-* and ?*in-* seem to appear in free variation, as in (29) (Laurie Reid pers. comm.). Guinaang Bontok shows ?*in-*, as in (30).³³ In Bontoc town, the form ?*en-* [ʔən] is used.

(27) Northern Alta (AltN128, 161)³⁴

men- as a reflex of **maR-* (with nasal assimilation):

- a. ***mendilus*** sEpla in madi?it ten *dinomateng*=e?.
bathe still IN maiden when arrive=NOM.IS

(*mendilus* < *men-* + *dilus* ‘bathe’)

‘The lady was still taking a bath when I arrived.’

³² Northern Kankanay is also referred to as Western Bontok in the literature (Reid 1964).

³³ The form *min-* typically occurs in Guinaang Bontok as a reflex of *maN-* preceding roots beginning with *l*, *r*, *w*, *y*, and nasal consonants in nominal contexts (e.g., *si Juan nan minlayad ?an sik?a*. ‘Juan is the one who likes you.’)

³⁴ The Northern Alta data used in the paper are from Reid’s fieldnotes. I have used the SIL Shoebox program to analyze the Northern Alta sentences collected by Reid. AltN 128 and AltN 161 are the reference numbers with which these sentences appear in the Shoebox Northern Alta sentence database.

- b. *mempakolu* ti waget=ti in madi?it.
boil LCV water=DET IN maiden

(*mempakolu* < *men-* + *pakolu* ‘boil’)

‘The lady boiled some water.’

(28) Northern Kankanay (Porter 1979:24, 25)

men- as a reflex of **maR-* (without nasal assimilation):

- a. *mendaan*=ka issa.
walk=NOM.2S here

(*mendaan* < *men-* + *daan* ‘to walk’)

‘You (sg.) walk here.’

- b. *men-ay-ayam* nan oongong-a isnan disik.³⁵
play NAN children in.the creek

(*men-ay-ayam* < *men-* + *ay-ayam* ‘play’)

‘The children are playing in the creek.’

(29) Talubin Bontok (Kikusawa and Reid 2003:104, 106)

- a. *min-* as a reflex of **maR-* (without nasal assimilation):

Istulyaek han hin-agik, hin-agi é *min*vakvako
story.GEN.1S HAN pair.sibling pair.siblings LIG go.headhunting

ad Jawwang.

LCV Jawwang

(*min*vakvako < *min-* + *vakvako* ‘head-hunting’)

‘I will tell the story of the two siblings, the two siblings who went headhunting at Jawwang River.’

³⁵ Following the standard orthography of Tagalog, the symbol ‘-’ is the orthographic representation of a glottal stop following a consonant.

- b. *?in-* as a reflex of **maR-* (without nasal assimilation):

Nanganangan=ja pé a, umey=jat *?intikid*=jad
 having.eaten=3P more.over TAG go=3P.SEQ climb=3P=LCV

han hana jallan é umey ad Kallawitan.
 HAN that trail LIG go LCV Kallawitan

(*?intikid* < *?in-* + *tikid* 'climb')

'When they had eaten, they went and climbed up that trail that goes to Kallawitan.'

- (30) Guinaang Bontok (Reid 1992:3, 54)

?in- as a reflex of **maR-* (without nasal assimilation):

- a. ...*?insagána*=da ay *?in?ag?águm*.
 prepare=NOM.3P LIG feast

(*?insagána* < *?in-* + *sagána* 'prepare'; *?in?ag?águm* < *?in-* + *?ag?águm* 'feast')

'..., they prepare for the postharvest feasting.'

- b. *?insublát*=da ay *?inbáyu*....
 exchange=NOM.3P LIG pound

(*?insublát* < *?in-* + *sublát* 'exchange'; *?inbáyu* < *?in-* + *báyu* 'pound')

'They take turns pounding....'

3.2.2.1.4 Reflexes of PMP **maN-* in Philippine languages

The second form that productively occurs in pattern 1 and pattern 2 clauses in Philippine languages (but not in Formosan languages) is the reflex of PMP **maN-*.³⁶ Reflexes of PMP **maN-* are widespread in Philippine languages and other Western Malayo-Polynesian languages. In the Philippines, reflexes of **maN-* are found in most Philippine languages except in some Manobo languages (e.g., ?Cotabato Manobo, ?Tasaday, etc.) and other languages in the south of Mindanao (e.g., Tboli, Blaan, etc.).

In languages that maintain a reflex, **maN-* appears as *maN-* (*mang-* [maŋ] as the default form in the great majority of languages), *meN-* [mən], *aN-*, or *N-*. The form *maN-* is found in the great majority of Philippine languages, including most Cordilleran (e.g., Pangasinan (31), Kalinga, Balangao, Bontok, Yogad, Isnag, Agta, Casiguran Dumagat, etc.), Bashiic languages (Yami, Ivatan, Itbayat, etc.), Sambalic languages (Botolan,

³⁶ Two Formosan languages, Puyuma and Nataoran Amis, have been reported to have a small number of forms that might be related to ?PAN/PMP **maN-*. First, in Puyuma, as reported in Blust (1999a:68, footnote 68), there is a synchronically unanalyzable form *mangayaw* ‘to hunt heads’ which seems to have a historical prefix **maN-*.

Second, Starosta (2002a) reports the possible existence of the reflex of **maN-* in Nataoran Amis. By comparing (1a) with (1b), Starosta interpreted *mami-* in (1a) as a combination of *maN-* + *pi-*. However, if we examine the data carefully, we will find that the Nataoran Amis sentence in (1a) does NOT belong to the same type of dyadic clauses as the Philippine dyadic *maN-* clauses. In Nataoran Amis *mami-* clauses, the agent is always marked by Gen and the patient is marked by Nom, but in Philippine languages the agent of a dyadic *maN-* clause would be marked by Nom rather than Gen. The only way that one might be able to relate the *mami-* clause in Nataoran Amis with the *maN-* clauses in Philippine languages is to reanalyze *kina waco no lomaq ako* as a possessive phrase meaning ‘my family’s dog’ and to reinterpret (1a) as a monadic clause with the meaning ‘My family’s dog is assigned to hunt.’

(1) Nataoran Amis (data from T. Chen 1987:83; cited in Starosta 2002a)

- a. *mamiadop kina waco no lomaq ako.*
 assigned.to.hunt this(NOM) dog GEN family 1S
 ‘My family assigns this dog to hunt.’ (Lit. ‘This dog is assigned to hunt by my family.’)
- b. *sapiadop kina waco no lomaq ako.*
 used.for.hunting this(NOM) dog GEN family 1S
 ‘My family used this dog for hunting.’ (Lit. ‘This dog is used for hunting by my family.’)

Kakilingan and Tina Sambal), Kapampangan (*man-*, rather than *mang-* [maŋ], as the default form), Central Philippine languages (e.g., Tagalog, Bikol, Mamanwa (32), Tausug, etc.), Manobo languages (Ata, Dibabawon, Kagayanen, etc.), Maranao, etc. The form *meN-* is found in some Cordilleran languages (Karao, Ibaloy, and Northern Alta (*maN-* or *meN-*)) and some Manobo languages (Sarangani Manobo (32), Western Bukidnon Manobo). In Sindangan Subanen, both *meN-* and *N-* appear. In the Sama Bajaw languages, *aN-*, and *(Na)N-* are found. For example, Sama Bangingi' shows *aN-*, as in (34).³⁷ Manuk Mangkaw Sinama, Sama (Pangutaran Island),³⁸ Mapun, and Yakan (*ng* [ŋ] as the default of *N-*) have *(Na)N-*, as in (35).

(31) Pangasinan (Benton 1971:49, 64, 77)

mang- as a reflex of **mang-* (completive aspect *ang-*):

- a. *mangán*=ak=la=n *mangán*.
 eat=NOM.1S=already=LIG eat
 (*mangan* < *mang-* + *kan* 'eat')
 'I will eat and eat.'

³⁷ Gault (1999a:401, footnote 6) states the following rules for the phonological realization of *aN-* in Sama Bangingi'. "The phonological derivations of *N* are: $aN \Rightarrow aN_i/_C_i$ ($C_i = p, b, t, k$); $aN \Rightarrow angaN_j/_C_j$ ($C_j = d, g$); $aN \Rightarrow anga/_C_k$ ($C_k = l, h$); $aN \Rightarrow ang/_V$; $C_i \Rightarrow \emptyset / aN_i$

$aN + allang \Rightarrow angallang$;

$aN + bowa \Rightarrow amowa$;

$aN + geret \Rightarrow angangeret$;

$aN + ligan \Rightarrow angalingan$; $aN + hinang \Rightarrow angahinang$ "

³⁸ The phonological realization of *(Na)N-* in most Sama Bajaw languages are quite similar to the one described by Walton for Sama (Pangutaran Island). Walton (1986:44-45, footnote 6) notes: "The *N-* in Sama is a nasal that undergoes assimilation in some environments but is realized as allophonic variants in others. Preceding /p, b, t, s, k/, *N* assimilates to the point of articulation of the stem initial consonant and that consonant is deleted. In other environments, *N-* is realized by the following allophonic variants: *nga* occurs preceding /l, m, n/, *ngan* occurs preceding /d, j/, and *ngang-* occurs preceding /g/."

- b. *mangán=ak labát na púto insán=ak lamét onogíp.*
 eat=NOM.IS just GEN *púto* then=NOM.IS again sleep
 (*mangan* < *mang-* + *kan* 'eat')
 'I will just eat some *púto*, then I will sleep again.'
- c. *angan na mangga may ogáw.*
 eat GEN mango MAY boy
 (*angan* < *ang-* 'completive aspect of *mang-*' + *kan* 'eat')
 'The boy ate a mango.'

(32) Mamanwa (Miller and Miller 1976:53)*mang-* as a reflex of **mang-* (completive aspect *nang-*):

- a. *nangaen siran ka baay.*
 eat NOM.3P LCV wild.root
 (*nangaen* < *mang-* + *-in-* '[+begun]' + *kaen* 'eat')
 'They ate wild root.'
- b. *namalit siran ka begas.*
 buy NOM.3P LCV rice
 (*namalit* < *mang-* + *-in-* '[+begun]' + *palit* 'buy')
 'They bought rice.'

(33) Sarangani Manobo (C. DuBois 1976:30, 57)*meng-* as a reflex of **mang-* (completive aspect *neng-*):

- a. *nematay lebò se osa.*
 die probably SE pig
 (*nematay* < *meng-* + *-in-* 'completive' + *patay* 'died')
 'The pig has probably died.'
- b. *menokdok se batà te toyang.*
 beat SE child LCV dog
 (*menokdok* < *meng-* + *dokdok* 'beat')
 'The child beat a dog.'

(34) Sama Bangingi' (Gault 1999b:397, 406)*ang-* as a reflex of **mang-*:

- a. **angallang** iya.
shout NOM.3S
(*angallang* < *aN-* + *allang* 'shout')
'He is shouting.'
- b. **angalangpas** sigaam alta? aa.
plunder NOM.3P wealth people
(*angalangpas* < *aN-* + *langpas* 'plunder')
'They plunder people wealth.'

(35) Yakan (Brainard and Behrens 2002:37, 53, 194)*N-* as a reflex of **mang-*:

- a. **ningko?** nakanak=in.
sit child=DET
(*ningko?* < *N-* + *tingko?* 'sit')
'The child is sitting.'
- b. **ngalagna?** iye **mella** kamunti?u.
start NOM.3S cook camote
(*ngalagna?* < *N-* + *lagna?* 'start'; *mella* < *N-* + *bella* 'cook')
'She start to cook camote.'
- c. **ngehet** ingket nakanak=in.
cut rope child=DET
(*ngehet* < *N-* + *kehet* 'cut')
'A/The child cut a rope.'

Reflexes of **maN-* in most Philippine languages characteristically are associated with two phonological processes: (a) homorganic nasal assimilation, and (b) consonant deletion (in particular voiceless obstruent deletion). First, the final nasal of **maN-* changes its point of articulation to that of the initial consonant of the root to which it is attached, so the prefix becomes *mam-* before bilabial consonants, *man-* before alveolar

and dental consonants, and *mang-* before velar and glottal consonants. Second, after nasal assimilation applies, the initial consonant of the root is deleted under certain conditions, usually at least if that consonant is a voiceless obstruent, and in some languages, if it is any obstruent (e.g., Limos Kalinga, Sarangani Manobo, etc.).³⁹

Although reflexes of **maN-* in Philippine languages typically undergo both the nasal assimilation and the consonant deletion processes, there are some exceptions. In Ilokano, both of these processes appears to have been lost when *maN-* functions as a verbal prefix (e.g., *mangpili* ‘to choose’ and *mangkalap* ‘to catch fish’), although evidence of their earlier presence in the language remains in nominal forms (e.g., *mangngalap* ‘fisherman’). In Arta, the nasal assimilation process still occurs, but the consonant deletion rule has been lost (Reid 1989:65).

3.2.2.2 Reflexes of PAN **-en*

After discussing the forms of verbs that occur in pattern 1 and pattern 2 clauses, let us look at the forms of verbs that occur in patterns 3a–c. This section discusses **-en* verbs that occur in pattern 3a. The discussion here is divided into two parts: section 3.2.2.2.1 deals with reflexes of **-en* in Formosan languages, and section 3.2.2.2.2 deals with reflexes of **-en* in Philippines languages. After discussing reflexes of **-en*, sections 3.2.2.3 and 3.2.2.4 will discuss reflexes of **-an* (verbs that occur in pattern 3b) and reflexes of **Si-* (verbs that occur in pattern 3c) respectively.

³⁹ The actual phonological realization of reflexes of **maN-* is quite complex and varies from one language to another. For a detailed study of reflexes of **maN-*, readers are referred to Blust (To appear), Tharp (1974b), and Newman (1984–1985).

3.2.2.2.1 Reflexes of PAN **-en* in Formosan languages

Reflexes of PAN **-en* [ən] are found in the majority of Formosan languages. Tsou, Saaroa, and Puyuma have lost the form. In Kavalan and Basay (Trobiawan), reflexes of this form have merged with reflexes of PAN **-an* as *-an* (Li 1996a:73; 1999:652). In languages in which a reflex is found, the actual form that occurs depends upon the reflex of PAN **e* [ə]. Some Formosan languages maintain the reconstructed form unchanged as *-en*, as in Amis (Central and Nataoran), Pazih/Pazeh, Siraya, Northern Paiwan, and in Kanakanabu (in durative aspect only) (Ross 1995:777). Some reflect it with a high back vowel, *-un*, as in the Atayalic languages (Squliq Atayal (Wulai), C?uli? Atayal (Mayrinax), and Seediq), Saisiyat, and Bunun (Isbukun and Takbanuað). Thao reflects it with a high front vowel, *-in*.

3.2.2.2.2 Reflexes of PAN **-en* in Philippine languages

Reflexes of PAN **-en* /ən/ are found in all but a few languages of the Philippines. In languages in which a reflex is maintained, the actual form that occurs depends upon the reflex of PAN **e* /ə/.⁴⁰ In the majority of Philippine languages, the reconstructed form is maintained unchanged as *-en* /ən/. For example, *-en* is found in Cordilleran languages (such as Ilokano, Northern Alta, all West Southern Cordilleran languages (Pangasinan,

⁴⁰ Please refer to Conant (1912) and Reid (1973) for detailed discussion of reflexes of PAN/PMP **e* in Philippine languages.

Ibaloy/Inibaloi, Karao, Kalanguya/Kallahan), Balangao,⁴¹ Northern Kankanay, Guinaang Bontok, Ga'dang/Gaddang of the Cagayan Valley, Casiguran Dumagat, etc.), Bashiic languages (e.g., Yami, Ivatan, Itbayat, etc.), Sambalic languages (Botolan, Kakilingan, and Tina Sambal), some Central Philippine languages (e.g., Samar-Leyte, Mamanwa, Cebuano, Waray, Southern Bikol (more than half of its dialects), most dialects of Kinaray-a, etc.), most of the Manobo languages (such as Cotabato Manobo (non-completive aspect only), Blit Manobo (both past and non-past tense, as in (36)), Western Bukidnon Manobo, Sarangani Manobo, Dibabawon Manobo and Ata Manobo, etc.),⁴² and in the Danao languages (e.g., Maranao, Magindanao, etc.).

(36) Blit Manobo (Reid 1993:16)

- a. reflexes of **-en* used in the non-past tense:

kaʔənən=ku siniʔi sini sigəf.
eat=NOM.IS this this night

'I will eat this tonight.'

- b. reflexes of **-en* used in the past tense:

kaʔənən=ku siniʔi əgoh sigəf.
eat=NOM.IS this last night

'I ate this last night.'

Some reflect it with a mid back vowel, *-on*. For example, *-on* is found in some of the North-Central Cordilleran languages (such as Kalinga, Batad Ifugao, Kadaklan Bontok/Eastern Bontok) which have a contrast between /o/ and /u/. Some Central

⁴¹ In Balangao, the suffix *-én* [ən] has three allomorphs: *-én*, *-un*, and *-on*. The occurrence of one allomorph rather than the other two allomorphs is generally conditioned by a vowel harmony rule: *-un* and *-on* occur when the final syllable of a word is CVC and the vowel of that syllable is *u* and *o* respectively, whereas *-én* occurs elsewhere (see Shetler 1976:38–39 for details).

⁴² In Dibabawon Manobo and Ata Manobo, the reflex of **-en* is written as *-on* /-in/.

Philippine languages (such as Bikol, Masbatenyo, Hiligaynon/Ilonggo, Aklanon) also represent the reflex as *-on*, however, this is an orthographic representation of /-un/.

Others reflect it with a high back vowel, *-un*. For example, *-un* is found in the Sama Bajaw languages (Sama Banging', Manuk Mangkaw Sinama, Mapun, Yakan, etc.) and the Central Philippine languages (Cebuano, Waray, Sorsoganon, Mansaka, Tausug, etc.).

Tagalog, however, reflects it with a high front vowel, *-in*.

In languages in which the reflex of PAN **e* has fallen together with the reflex of PAN **a*, such as Ibanag and Itawes/Itawis of the Cagayan Valley, as well as Kapampangan, the reflexes of this suffix have fallen together with the reflexes of PAN **-an* and appear as *-an*. In Tboli and Blaan (and possibly in Tasaday too), reflexes of **-en* have been lost.⁴³

Notice that in most Formosan and Philippine languages, **-en* verbs often imply that the Nominative NP is a DIRECTLY and ENTIRELY AFFECTED PATIENT/THEME. However, this function has gradually been replaced by reflexes of PAN **-in-*, as we move from Taiwan to the southern part of the Philippines. In the Sama Bajaw languages, *-un* (the reflex of PAN **-en*) occurs only in the imperative mood; in the indicative mood, whether perfective or imperfective, *-in-* (the reflex of PAN **-in-*) is used. In Tboli and Blaan, reflexes of **-in-* have replaced **-en* completely and occur in both indicative and imperative moods.

⁴³ Although Blit Manobo has a reflex of **-en*, its closely related language Tasaday seems to have lost this form. In Blit Manobo, "Non-Actor Focus" verbs, whether completed actions or non-completed actions, are typically marked by *-ən*. However, in Tasaday, they are marked by *-in-* (reflex of **-in-*) (Reid 1993:15–17).

Such a development may be related to the fact that **-in-*, a perfective/past marker, can cooccur with **-um-* (“Actor Focus”), **-an* (“Locative Focus”), or **Si-* (“Instrumental Focus”) in the perfective aspect, but not with **-en* “Goal Focus/Patient Focus” in the perfective aspect.⁴⁴ In the “Goal Focus” construction, **-in-* is often assumed to have a portmanteau function, that is, marking perfective aspect as well as “Goal Focus”.

Speakers of Sama Bajaw languages and some of the southern Mindanao languages might have interpreted **-in-* as a “Goal Focus” marker rather than as an aspect marker in the “Goal Focus” construction. Another fact that may be related to the development of **-in-* is that aspects are no longer marked by reflexes of **-in-*, instead they are expressed by aspectual auxiliaries (e.g., Manuk Mangkaw Sinama) or by adverbs or temporal phrases (e.g., Tasaday and Blit Manobo) in these languages.

3.2.2.3 Reflexes of PAN **-an*

The second subtype of pattern 3 clauses makes use of verbs containing reflexes of PAN **-an*. In this section, the form and function associated with reflexes of **-an* in Formosan and Philippine languages will be discussed. The discussion here is divided into two subsections. Section 3.2.2.3.1 deals with the form and function associated with **-an* verbs in Formosan languages. Section 3.2.2.3.2 deals with the form and function associated with **-an* verbs in Philippine languages.

⁴⁴ Blust (1998a) reports that reflexes of **-en* can cooccur with reflexes of **-in-* in Patient Focus perfective in Thao. According to him, Patient Focus perfective in Thao can be marked either by *-in-* (< **-in-*) or by *-in- + -in* (< **-in- + *-en*).

3.2.2.3.1 Reflexes of PAN **-an* in Formosan languages

Reflexes of PAN **-an* are found in most Formosan languages. Puyuma and Tsou, however, have lost the form.⁴⁵ In most, if not all, languages that maintain a reflex of **-an*, the reconstructed form remains unchanged as *-an*. In most Formosan languages, reflexes of **-an* verbs often imply that the Nominative NP is a PARTLY OR LESS DIRECTLY AFFECTED PATIENT/THEME (an entity that is partly or less directly affected, or only the surface is affected), or a LOCATION (including the end point of the action, the place to which or from which some other entity is directed, etc.). In Basay and Kavalan, due to the merger of **-en* and **-an*, the function associated with *-an* verbs has been expanded. That is, *-an* clauses in Basay and Kavalan may have a Nominative NP that is a DIRECTLY AFFECTED PATIENT/THEME, or may have a Nominative NP that is a LOCATION, or a PARTLY OR LESS DIRECTLY AFFECTED PATIENT/THEME, depending on the verb class and the meaning that one intends to convey.

Apart from marking “Locus Focus” and “Goal Focus” that were discussed in the above paragraph, Ross suggests a third function, “Benefactive Focus,” that may be associated with reflexes of **-an* in Formosan languages. Ross (1995:741) states: “The LC pivot also seems to have served as a Benefactive pivot in PAN, as it does in a number of daughter languages. In other words, with semantically appropriate verbs, a human LC pivot was interpreted as Benefactive, as in these examples.”

⁴⁵ In Puyuma, reflexes of **-an* are not found in verbal contexts, but are found in nominal forms.

(37) Paiwan (Egli 1990: 296; cited in Ross 1995:741)

uri ku=su=pavayan tua kakudan.

FUT GEN.1S=NOM.2S=give LCV power

'I will give you (sg.) power.'

(38) Seediq (Asai 1953:46; cited in Ross 1995:742)

skatani=ku qəhuni.

cut.for=NOM.1S tree

'Please cut the tree for me.'

Ross's statement is not quite accurate. At least, from the Paiwan (37) and Seediq (38) examples that he provided, one cannot state with confidence that "The LC pivot also seems to have served as a Benefactive pivot in PAN". Here are some facts that may weaken Ross's statement.

First, if we examine the above Paiwan and Seediq examples carefully, we will find that the Paiwan example cannot be securely classified as a "Benefactive Focus" construction in Philippine-type languages.

If we consider the Mayrinax Atayal examples, we can see that the verb *baiqan* 'give' behaves very differently from prototypical "Benefactive Focus" verbs,⁴⁶ such as *siaras* 'bring for', *sicabu?* 'wrap for'. In Mayrinax Atayal, "Locative Focus" verbs are marked by *-an* in the indicative mood, but by *-i* in the imperative mood; "Benefactive Focus" (and also "Instrumental Focus") verbs are marked by *si-* in the indicative mood, but by *-ani* in the imperative mood, as shown in (39)c–e.

⁴⁶ Prototypical "Benefactive Focus" verbs refer to verbs that express the meaning "the agent is performing an action FOR or ON BEHALF OF"

(39) Mayrinax Atayal (Huang 1995:58, 66-68)

- a. *baiqan*=mi? cu? pila? ku? ?ulaqi?
give=GEN.IS OBL money KU? child
'I gave the child money.'
- b. *baiqi* cu? pila? ku? ?ulaqi?
give OBL money KU? child
'Give the child money.'
- c. *sjaras*=mu kariariax cu? qusia? ?i? Watan.⁴⁷
bring.for=GEN.IS every.day OBL water ?i? Watan
'I bring water for Watan.'
- d. *rasani* cu? qusia? ?i? Watan.
bring.for OBL water ?i? Watan
'Bring Watan water.'
- e. *sicabu?* cu? qulih nku? nabakis ?i? Yumin.
wrap.for OBL fish GEN old.man ?i? Yumin
'The old man wrapped fish for Yumin?.'

If we follow Ross's classification by considering *baiqan* 'give' as a "Benefactive Focus" verb, then we can say that *-an* marks "Benefactive Focus" as well as "Locative Focus" verbs in Mayrinax Atayal just like Paiwan. On the surface, it looks very neat that both Mayrinax Atayal and Paiwan use *-an* to mark "Benefactive Focus". However, one question arises. "Is this the best analysis of the Mayrinax Atayal and Paiwan examples?". The answer is "No".

Let me justify my answer here. We cannot completely rule out the possibility that THE PARTICIPANT WHOM THE AGENT "GIVES" SOMETHING TO might be interpreted as a

⁴⁷ Both =mi? and =mu are 'first person singular genitive' pronoun in Mayrinax Atayal. It is not clear what conditions the occurrence of one pronominal form rather than the other.

BENEFICIARY because such a participant typically benefits from the action of “giving”. However, if we interpret this participant as a BENEFICIARY in Mayrinax Atayal, we would have to explain why the verb ‘give’ is the only “Benefactive Focus” verb (in Huang’s Mayrinax Atayal grammar) that is marked by *-an* in the indicative mood and by *-i* in the imperative mood. One solution might be that a verb is marked by *si-* or by *-an* for “Benefactive Focus” depending on the verb class to which it belongs. This is not a totally implausible answer, but might not be the best answer for the facts that we found in Mayrinax Atayal.⁴⁸

It seems to me that a much better analysis of the verb ‘give’ in Mayrinax Atayal and Paiwan is to consider it as a “Locative Focus” verb rather than a “Benefactive Focus” verb. If we consider ‘give’ as a “Locative Focus” verb, we can see that ‘give’ behaves just like other “Locative Focus” verbs in that it is marked by *-an* in the indicative mood, but by *-i* in the imperative mood. Moreover, semantically speaking, THE PARTICIPANT WHOM THE AGENT “GIVES” SOMETHING TO can easily be interpreted as a LOCATION because the participant involved is the end point of the action of ‘giving’.

Let me sum up the discussion of the Paiwan example here. If the Paiwan example that Ross chose could be securely classified as “Benefactive Focus,” then his claim that “The LC pivot also seems to have served as a Benefactive pivot in PAN” would have been strengthened. However, as shown in the previous few paragraphs, even the only representative Paiwan example that he selected could not be securely classified as

⁴⁸ As already discussed in section 3.2.2.3.2, some Philippine languages (such as Cebuano, Tagalog, etc.) do have some verb classes marking “Benefactive Focus” by *-an*, some by *i-*, and others by either *-an* or *i-*. However, the facts that we found in Mayrinax Atayal are very different from those that we found in Philippine languages.

“Benefactive Focus,” thus casting doubt on the assertion that *-an* served as a “Benefactive pivot” in PAN.

Second, if we examine the Seediq example (repeated as (40)) carefully, we will find that this example does contain *-an* (in the complex *-ani*), but this *-an* occurs in the imperative mood not in the indicative mood. Consulting several grammars of Seediq, I could only find two additional examples of *-an* (in the *-ani* complex) marking “Benefactive Focus”. Again, in these two examples, (41) and (42), *-an* occurs in the imperative mood not the indicative mood. Recall that the form *-ani* also occurs in Mayrinax Atayal “Benefactive Focus” imperative sentences. It seems that we can state with confidence that *-ani* (or *-an*) marks Proto-Atayalic “Benefactive Focus” in the imperative mood. Even though it is clear that *-ani* (or *-an*) could have marked “Benefactive Focus (imperative only)” in Proto-Atayalic, it does not directly support Ross’s claim that “The LC pivot also seems to have served as a Benefactive pivot in PAN”.

(40) Seediq (Asai 1953:46; cited in Ross 1995:742)

skata*ani*=ku qəhuni.
cut.for=NOM.IS tree

‘Please cut the tree for me.’

(41) Seediq (Asai 1953:46)

hakawa*ani*=ku.
make.a.bridge.for=NOM.IS

‘Make a bridge for me.’

(42) Seediq (data from J. H. Chen 1996:5; cited in Y. L. Chang 2000b:109)

buyuh*ani* tunux ka Pawan.
cut.for head KA Pawan

‘Cut hair for Pawan.’

Recall the difference between “Locative Focus” and “Benefactive Focus” in Mayrinax Atayal. In Mayrinax Atayal, “Locative Focus” verbs are marked by *-an* in the indicative mood, but by *-i* in the imperative mood; “Benefactive Focus” (as well as “Instrumental Focus”) verbs are marked by *si-* in the indicative mood, but by *-ani* in the imperative mood. If the *-an* (appearing in the *-ani* complex) in the “Benefactive Focus” imperative mood has developed from the same source as the “Locative Focus” *-an*, we would have to state that reflexes of **-an* have undergone some kind of functional shift. Thus, in the indicative mood, *-an* can only mark “Locative Focus,” whereas in the imperative mood, it can only mark “Benefactive Focus”.

Even if **-an* can be securely reconstructed as “Benefactive Focus (imperative)” for Proto-Atayalic, and the *-an* in the “Benefactive Focus (imperative)” and the *-an* in the “Locative Focus (indicative)” have the same historical source, it still does not support Ross’s claim that it served as a Benefactive pivot in PAN. It seems to me that the data, at most, can support the claim that “*-an* may have served as a Benefactive pivot in the IMPERATIVE mood in PAN”.

3.2.2.3.2 Reflexes of PAN **-an* in Philippine languages

Reflexes of PAN **-an* are found in nearly all Philippine languages. Tboli and Blaan, however, have lost the form. In languages that maintain a reflex of **-an*, the reconstructed form remains unchanged as *-an*.

In Philippine languages, *-an* verbs are often associated with the following functions. First, in most, if not all, Philippine languages, *-an* verbs imply that the Nominative NP is a PARTLY OR LESS DIRECTLY AFFECTED PATIENT/THEME (an entity that is partly or less directly affected, or only the surface is affected), or a LOCATION (including the end point of the action, the place to which or from which some other entity is directed, etc.). Second, in some Philippine languages (mainly languages in the central and southern part of the Philippines), the function associated with *-an* verbs has been expanded. In these languages (including Tagalog, Cebuano, Mamanwa, Dibabawon Manobo, Maranao, Yakan, etc.), *-an* verbs may be used to imply that the Nominative NP is a BENEFICIARY.

3.2.2.4 Reflexes of PAN **Si-* and PMP **hi-*

The third subtype of pattern 3 clauses makes use of verbs containing reflexes of PAN **Si-*. In this section, the form and function associated with reflexes of **Si-* in Formosan and Philippine languages will be discussed. The discussion here is divided into two subsections. Section 3.2.2.4.1 deals with the form and function associated with **Si-* verbs in Formosan languages. Section 3.2.2.4.2 deals with the form and function associated with **Si-* verbs in Philippine languages.

3.2.2.4.1 Reflexes of PAN *Si- in Formosan languages

Reflexes of PAN *Si- are not as widespread as reflexes of PAN *-um-, *-en, and *-an in Formosan languages. *Si- is reflected as *si-* in C?uli? Atayal (Mayrinax), Paiwan, and Saisiyat.⁴⁹ Bunun shows what some claim to be a metathesized form of *Si- (*?is-* in Isbukun Bunun and *is-* in Takbanuað Bunun). Squiliq Atayal (Wulai) and Paran Seediq have lost the vowel and have a form *s-*. Kavalan (and ?Basay) has a form *ti-* or *te-* (the regular reflex of *Si- in Kavalan would be ***si-*).⁵⁰ No reflexes of *Si- are found in Amis, Puyuma, Siraya, Thao, (?Pazih/Pazeh,) and the Tsouic languages (Tsou, Kanakanabu, and Saaroa).

In Formosan languages, *Si- verbs typically imply that the Nominative NP is interpreted as an INSTRUMENT (including an entity that is moved in space, directed towards, or brought into association with some other entity).

Moreover, *Si- verbs are often associated with a second function. That is, *Si- verbs often also imply that the Nominative NP is interpreted as a BENEFICIARY of the verb. Whether a Nominative NP of a *Si- clause is interpreted as an instrument or as a beneficiary depends on the meaning that one intends to convey.

⁴⁹ Li and Tsuchida (2001:29–31) reports that “...Pazih seems to have *sa-* ~ *saa-* ~ *si-* to indicate Instrumental-focus. The allomorphs *sa-* and *saa-* are phonologically conditioned..., but conditioning of *si-* is not clear.... We found only one example for a verb with the prefix *si-* indicating Instrumental-focus:”

(2) Pazih (Li and Tsuchida 2001:31):

s?ite?eng wazu ni rakihan ki batu.
 throw.with dog GEN child NOM stone
 ‘The child throw at a dog with the stone.’

⁵⁰ Li (1999:652) reports the occurrence of a single *ti-* verb in Basay and comments that “In all our data, there is only one Instrumental-focused verb indicated by the prefix *ti-*, which is most likely a loan from Kavalan...”.

In some Formosan languages (such as Pazih/Pazeh, Amis (Central and Nataoran), and Saaroa) that do not have a reflex of **Si-*, there is a form *sa-* that serves similar functions as reflexes of **Si-* in other Formosan languages.

3.2.2.4.2 Reflexes of PAN **Si-* (PMP **hi-*) in Philippine languages

Unlike Formosan languages, reflexes of **Si-* are widespread in Philippine languages. Except for some languages in the southern part of the Philippines (such as Mansaka, Sindangan Subanen, and Sama Bajaw languages, etc.), reflexes of **Si-* can be found in nearly all major subgroups of Philippine languages. The majority of Philippine languages reflect PAN **Si-* (or PMP **hi-*) as *ʔi-* (in Karao, Guinaang Bontok, etc.), or *i-*. However, Tausug has a form *hi-*. Moreover, other Bisayan languages such as Samar-Leyte, Waray, and Northern Samareño also have *h* in their instrumental potential form *mahi-* (Zorc 1977:134). This suggests that the PMP form should be reconstructed as **hi-* rather than **i-*. Since *h* was lost in all the Cordilleran languages, the *i-* appearing in these languages is a true reflex of **hi-*, whereas other languages such as Tagalog with *i-* show an irregular loss of **h*.

Like Formosan languages, **Si-* verbs in Philippine languages often imply that the Nominative NP is an INSTRUMENT (including an entity that is moved in space, directed towards, or brought into association with some other entity). In the Sama Bajaw languages (such as Mapun, Sama Bangingi', Yakan, etc.), reflexes of **Si-* have been lost and *paN-* takes over the function of marking INSTRUMENT-AFFECT verbs (i.e., verbs whose Nominative NP is interpreted as an INSTRUMENT). In Isnag, however,

INSTRUMENT-AFFECT verbs are marked by either *i-*, *pag-*, *pang-*, or *paN-*, depending on the semantics one intends to convey.⁵¹

In some Philippine languages, **Si-* verbs may also imply that the Nominative NP is a BENEFICIARY. However, the BENEFICIARY-AFFECT function of **Si-* verbs is not as widespread as the INSTRUMENT-AFFECT function of **Si-* verbs in the Philippines. The BENEFICIARY-AFFECT function of **Si-* verbs can be found in the Bashiic languages (such as Ivatan, Yami, Ibayat, etc.), some (but not all) of the Northern Cordilleran languages (Isnag and Casiguran Dumagat), Sambalic languages, Kapampangan, and some Meso-Philippine languages (e.g., Bikol, Tagalog, Cebuano, Tausug, Aklanon, Kalamian Tagbanwa, etc.). However, not all these languages use **Si-* verbs as the only means to convey BENEFICIARY-AFFECT. As discussed in section 3.2.2.3.2, the BENEFICIARY-AFFECT function can also be achieved by *-an* in Tagalog, Cebuano, and some other languages spoken in central or southern Philippines. In addition to **Si-* verbs and **-an* verbs, there are other forms that may also serve as BENEFICIARY-AFFECT verbs in Philippine languages. I will discuss the formal marking of BENEFICIARY-AFFECT verbs in Philippine languages in section 3.2.2.5.2.

3.2.2.5 “Benefactive Focus” verbs in Formosan and Philippine languages

From section 3.2.2.1 to section 3.2.2.4, the forms and the functions associated with reflexes of PAN **-um-* (and PMP **maR-* and **maN-*), **-en*, **-an*, and **Si-* in Formosan

⁵¹ Barlaan (1999:44) observes that ‘Like the Agent focus affixes, the affixes that signal Instrument focus also indicate the plurality of the Goal and the duration of the activity.’ In general, *pag-* conveys the plurality of the Goal and/or extended or durative action; *pang-* is not specific as to the number of the Goal, and *paN-* and *i-* convey the singularity of the Goal.

and Philippine languages have been discussed. It appears that reflexes of each of these affixes are associated with at least one function: (i) **-um-* (or **maR-* or **maN-*) verbs: “Actor Focus,” (ii) **-en* verbs: “Patient/Goal Focus,” (iii) **-an* verbs: typically “Locative Focus,” less typically “Patient Focus/Goal Focus” (due to the merger of **-en* and **-an*), or “Benefactive Focus,” and (iv) **Si-* verbs: typically “Instrumental Focus,” less typically “Benefactive Focus”. There appears to be NO uniform way that “Benefactive Focus” verbs are marked. Sections 3.2.2.5.1 and 3.2.2.5.2 examine the form of “Benefactive Focus” verbs in Formosan and Philippine languages respectively.

3.2.2.5.1 “Benefactive Focus” verbs in Formosan languages

As discussed in sections 3.2.2.3.1 and 3.2.2.4.1, in Formosan languages that maintain a reflex of **Si-*, these reflexes are used to mark BENEFICIARY-AFFECT verbs as well as INSTRUMENT-AFFECT verbs in the indicative mood. In some languages such as Mayrinax Atayal and Seediq, reflexes of **-an* can also serve the same function (marking BENEFICIARY-AFFECT verbs and INSTRUMENT-AFFECT verbs) but only in the imperative mood.⁵² In languages (such as Pazih/Pazeh, Amis, and Saaroa) that do not have a reflex of **Si-* but have a reflex of **Sa-*, reflexes of **Sa-* serve the same function. In Kavalan, the form *ti-* or *te-* marks BENEFICIARY-AFFECT verbs as well as INSTRUMENT-AFFECT

⁵² As already discussed in the previous section, it is not clear whether the form *-an* that appears in the indicative mood (marking LOCATION-AFFECT verbs) and the one that appears in the imperative mood (marking BENEFICIARY-AFFECTED and INSTRUMENT-AFFECT verbs) have come from the same historical source. To simplify the discussion here, I assume that the form *-an* that appears in the two different situations have the same source.

verbs. It appears that the formal marking of BENEFICIARY-AFFECT verbs and that of INSTRUMENT-AFFECT verbs in Formosan languages is the same.

3.2.2.5.2 “Benefactive Focus” verbs in Philippine languages

Unlike Formosan languages, the formal marking of BENEFICIARY-AFFECT verbs and that of INSTRUMENT-AFFECT verbs is NOT always the same in Philippine languages. In fact, there is a great variety in the way that beneficiary-affect verbs can be marked in Philippine languages. Let us consider the diversity of the BENEFICIARY-AFFECT forms now.

First, some Philippine languages use (?)*i-* verbs and no other for this purpose. Languages that belong to this group include Casiguran Dumagat, Bashiic languages (such as Ivatan, Yami, Itbayat, etc.), Kapampangan, Sambalic languages, Bikol, etc.

Second, some Philippine languages use *-an* verbs and no other for this purpose. Languages that belong to this group include Aborlan Tagbanwa, Kaagan Kalagan, Mansaka (in the imperative mood only), Manobo languages (e.g., Cotabato Manobo, Kagayanen, etc.), Maranao, and Sama Bajaw languages (Mapun, Yakan, Manuk Mangkaw Sinama, etc.).

Third, some Philippine languages use (?)*i-* *-an* verbs and no other for this purpose. Languages that belong to this group include Northern and Southern Alta, Southern Cordilleran languages (Pangasinan, Karao, Inibaloi/Ibaloy), North Central Cordilleran languages (Kalinga, Bontok, Balangao/Balangaw, Ifugao, Kankanay), Cagayan Valley languages (Ibanag and Ga’dang), etc.

Fourth, some Philippine languages use either *(ʔ)i-* verbs or *-an* verbs for this purpose.

In this type of language, some verbs only express BENEFICIARY-AFFECT by *(ʔ)i-*, some only express BENEFICIARY-AFFECT by *-an*, while others express the same function by either *(ʔ)i-* or *-an*. Languages that belong to this group include Cebuano, Tagalog, Tausug (*hi-* or *-an*), Mamanwa, Hiligaynon/Ilongo, Aklanon, Masbatenyo, Kalamian Tagbanwa, and Dibabawon Manobo.

Fifth, Ilokano (Meso-Cordilleran) uses either *i-* *-an* verbs or *-an* verbs for this purpose.

Sixth, Isneg (Cagayan Valley, Northern Cordilleran) uses either *i-*, *pag-*, *pang-*, or *paN-* verbs for this purpose.

Seventh, Yogad (Cagayan Valley, Northern Cordilleran) uses either *i-* *-an* verbs or *i(pang)-* verbs for this purpose.

Let me sum up the discussion in this section now.

The formal marking of BENEFICIARY-AFFECT verbs exhibits a very interesting distribution. Except Bikol, languages that use *ʔi-* to mark BENEFICIARY-AFFECT verbs are all languages of northern Luzon. Languages that use *-an* are all spoken in central or southern Philippines. Languages that use either *ʔi-* or *-an* are nearly all Central Philippine languages. It would be interesting to explore whether the use of *-an* to mark BENEFICIARY-AFFECT verbs is an innovation that developed after Austronesian speakers moved out from northern Luzon, or whether it developed independently among languages in the central or southern Philippines, or whether it is a result of contact, or a combination of the above.

Languages that use *?i- -an* are restricted to the Cordilleran group. Nearly all major subgroups of Cordilleran languages (except the North-Eastern Luzon group) have *(?)i-... -an*.⁵³ It seems that *(?)i- -an* might be an innovation of ?Proto-Cordilleran (or at least of Proto-Meso-Cordilleran).

3.3 THREE PERIODS OF LINGUISTIC DESCRIPTION OF PHILIPPINE-TYPE LANGUAGES

Having discussed the basic verbal clause patterns in Philippine-type languages, I will turn to the diverse analyses of these languages in this section. Various previous analyses will be presented according to the chronological order that they appeared in the literature.

The linguistic description of Philippine-type languages can be classified into three periods: (i) the “traditional” period, (ii) the “classical” period, and (iii) the “modern” period (Reid 2002a). The “traditional” period starts from the descriptions done by Spanish grammarians through the early decades of the twentieth century. Description in this period were heavily influenced by Latin grammars, with active and passive being applied to different construction types. A discussion of the “multiple passive” analyses of this period will be presented in section 3.3.1.

The “classical” period starts from the beginning of the influence of structuralism through the work of the Summer Institute of Linguistics (SIL) and the tagmemicists, with the introduction of the idea of the UNIQUENESS of Philippine languages and their “focus

⁵³ Within the North-Eastern Luzon group, only data from Casiguran Dumagat is available to me. If more data were available from this group, we might be able to find the occurrence of *(?)i-... -an* in this group too.

system” and multiple voice constructions. A discussion of the “focus” analyses of the “classical period” will be presented in 3.3.2.

The “modern” period starts from the mid-seventies, beginning with the introduction of generative linguistics and particularly the work of Starosta, his students and colleagues, with the attempt to show Philippine languages as morphologically ergative, and the “focus system” as derivational affixation, forming word families, not paradigms, similar in many respects to what has been referred to in other families as applicative affixation. A discussion of a representative analysis of the “modern period,” that is, the ergative analysis, will be presented in section 3.3.3. In addition to the ergative analysis, a number of other analyses have been proposed in the modern period. These analyses include the “active” analysis, the “fluid voice” analysis, the “hybrid” analysis, and the “symmetrical voice” analysis; they will be discussed in sections 3.3.4–3.3.7 respectively.

3.3.1 The “Traditional” Period: The Passive Analyses

In this section, I discuss the “passive” analyses of the “traditional” period. As mentioned above, the linguistic description in this period was heavily influenced by Latin grammars, with active and passive being applied to different construction types in Philippine-type languages. The representative works of this period include F. Blake (1906a, 1906b, 1917, 1925, etc.), Bloomfield (1917, 1942), Egerod (1965, 1966, 1978), Wolff (1973, 1979), Bell (1976), and so on.

In a passive analysis, Philippine-type languages are analyzed as having four voices: one active and three passives. **-um-* clauses, whether monadic or dyadic, are considered

to be actives, whereas **-en* clauses, **-an* clauses, and **Si-* clauses are considered to be passives. **-en* clauses have been referred to as direct passives (Bloomfield 1917; Wolff 1973; Rau 1992), indefinite passives (Egerod 1965), or second passives (Egerod 1966). **-an* clauses have been referred to as local passives (Bloomfield 1917; Wolff 1973; Rau 1992), definite passives (Egerod 1965), or first passives (Egerod 1966). **Si-* clauses have been referred to as instrumental passives (Bloomfield 1917; Wolff 1973; Rau 1992), relational passives (Egerod 1965), or third passives (Egerod 1966).

According to Bloomfield (1917:154), the choice of one of the constructions over the others is made in accordance with the “logical situation”. An “active” voice is employed when the subject is viewed as an actor. A “direct passive” voice is employed when the subject is viewed as an entity fully affected or produced. A “local passive” voice is employed when the subject is viewed as an entity partly or less fully affected, as a place or sphere. An “instrumental passive” voice is employed when the subject is viewed as a means, an instrument, something given forth or parted from. The passive analysis of the “traditional” period can be demonstrated with the Tagalog examples from Bloomfield (1917:154) and F. Blake (1906a:188).

When the action is oriented to the agent, the *-um-* “active” clause is utilized, as in (43)a–b. When the action is oriented to an entity that is fully affected or produced, then the *-in* “direct passive” clause is utilized, as in (43)c–d.⁵⁴ When the action is oriented to the location of an event or action or the person to whom an action is done, the *-an* “local

⁵⁴ As in other Philippine-type languages, the perfective aspect form of *-in* “direct passive” is *-in-* rather than ***-in- -in*. It is commonly assumed that the form *-in-*, when occurring in the “direct passive” perfective aspect, functions as a portmanteau morpheme, expressing the perfective aspect and “direct passive” voice at the same time.

passive” clause is utilized, as in (43)e–f. When the action is oriented to the instrument of the action, or to the beneficiary of the action, or to the direct recipient of an action that is in a direction away from the agent, the *i*- “instrumental passive” clause is utilized, as in (43)g–i.

(43) Tagalog (data from Bloomfield 1917:154; F. Blake 1906a:188)⁵⁵

- a. monadic “active”: the subject is viewed as an agent

umalis=siyà.

go.away=he(NOM.3S)

-UM-V=SUBJECT

‘*He* (SUBJECT) went away.’

- b. dyadic “active”: the subject is viewed as an agent

sumùsùlat=siya ng líham.

write=he(NOM.3S) GEN letter

-UM-V=SUBJECT OBJECT

‘*He* (SUBJECT) is writing a letter/letters.’

- c. “direct passive”: the subject is viewed as an entity fully affected or produced

sinùlat=niya ang líham.

was.written=by.him(GEN.3S) ANG letter

V-IN SUBJECT

‘*The letter* (SUBJECT) was written by him.’ or ‘He wrote *the letter* (SUBJECT).’

- d. “direct passive”: the subject is viewed as an entity fully affected or produced

pinùtol=niya ang káhoy.

was.cut=by.him(GEN.3S) ANG wood

V-IN SUBJECT

‘He cut *the wood* (SUBJECT).’

⁵⁵ To conform to modern Tagalog orthography, I have made the following changes in Bloomfield’s data. For example, *nya* is changed to *niya*; *an* is changed to *ang*; *nan* is changed to *ng*. However, I retain his representation of primary and secondary stress because stress is phonemic in Tagalog.

- e. “local passive”: the subject is viewed as an entity partly or less fully affected, as a place or sphere

sinulátan=niya=akò.
 was.written.to=by.him(GEN.3S)=I(NOM.1S)
 V-AN=ACTOR=SUBJECT
 ‘He wrote *(to) me* (SUBJECT).’

- f. “local passive”: the subject is viewed as an entity partly or less fully affected, as a place or sphere

pinutúlan=niya ang káhoy.
 was.cut.from=by.him(GEN.3S) ANG wood
 V-AN SUBJECT
 ‘He cut a piece *off the wood* (SUBJECT).’

- g. “instrumental passive”: the subject is viewed as an instrument

ipinútol=niya ang gúlok.
 was.cut.with=by.him(GEN.3S) ANG bolo⁵⁶
 I-V SUBJECT
 ‘He used *the bolo* (SUBJECT) for cutting.’ or ‘He cut *with the bolo* (SUBJECT).’

- h. “instrumental passive”: the subject is viewed as something given forth or parted from

ibinigay=niya sa ákin ang aklàt.
 was.given=by.him(GEN.3S) to.me(LCV.1S) ANG book
 I-V SUBJECT
 ‘He gave *the book* (SUBJECT) to me.’

- i. “instrumental passive”: the subject is viewed as the beneficiary of the action

ibilí=mo=ako nitó=ng baríl.
 was.bought.for=by.you(GEN.2S)=me(NOM.1S) this(GEN)=LIG gun
 I-V=ACTOR=SUBJECT
 ‘(You) buy this gun *for me* (SUBJECT).’ or ‘Let *me* (SUBJECT) be bought for by you (sg.) of this gun.’

⁵⁶ The term “bolo” refers to a kind of bush knife.

Under the passive analysis, dyadic “active” clauses are considered to be transitive, whereas monadic *-um-* clauses and “passive” clauses to be intransitive. Philippine-type languages are considered to have accusative actancy structures in that the subject of intransitive clauses and the subject of transitive clauses (i.e., dyadic **-um-* clauses) have the same case marking, but the object of transitive clauses has a unique case marking.

Comparing the syntactic behavior of “active” and “passive” constructions in Philippine-type languages with that in accusative languages (such as English, German, etc.), we find that Philippine-type “active” and “passive” constructions are typologically unusual in the following respects.

First, the distribution of the “active” construction in Philippine-type languages is far more limited than the “passive” constructions. As demonstrated by the following quotes from F. Blake (1906a, 1906b, 1917, 1925) and Bloomfield (1917), in Tagalog and other Philippine languages, “passives” are far more frequent than would be expected if they were really passives. “Actives” are used only if the non-actor participant(s) of a clause is/are absent, non-specific or indefinite. In all other situations, one of the three “passive” constructions is preferred.

The development of the numerous passive forms in Tagalog has resulted in restricting within comparatively narrow limits the use of the active, which in Indo-European and Semitic grammar is the most important form of the verb. The passive construction has become the rule, its prevalence forming one of the most characteristic features of the language. (F. Blake 1906a:187)

Perhaps the most salient feature of these languages is the prevailing use of the passive construction, active verbs not being used except when the agent is the most emphatic element of the sentence; for example in Tagalog in the sentence ‘he is reading a book,’ ‘he’ is more emphatic than the indefinite ‘book,’ hence the active is used, viz., *siya’y bungmabasa nang libro*, while in the sentence ‘he is reading this book’ the definite object is ordinarily more emphatic than the agent, hence the passive is employed,.... (F. Blake 1906b:326)

The use of the active and passive is not optional as in English. In any given sentence the voice of the verb depends upon the relative importance of the various elements, the most important or most

emphatic idea being made the subject of the sentence. If this is the agent of the action expressed by the verb, the active voice is used; if it is an other element of the sentence, then one of the three passives is employed. In general the *in* passive is used when the object of an action towards the agent (e.g., to take) is made the subject; the *i* passive when the subject is the object of an action away from the agent (e.g., to give), or the instrument or cause of the action; the *an* passive, when a place or anything regarded as place stands as subject. A definite object is usually more emphatic than the agent of the action, hence the passive is regularly employed when the object is definite. Passive constructions are far more frequent than active, in fact they may be said to be the rule, and active constructions the exception. (F. Blake 1917:411)

The passive voice is used when the object of the verbal action, or some accessory circumstance is the most emphatic element, and hence the subject, of the sentence. A definite object is usually more emphatic than the agent of the action, hence the passive is regularly employed when the object is definite. Passive constructions are far more frequent than active, in fact they may be said to be the rule, and active constructions the exception; they are usually to be translated by the English active.... (F. Blake 1925:141–142)

However, the active construction is avoided whenever any object other than the actor is available as subject. Especially are active constructions with an anaphoric subject (*siyà, silà, itò*) avoided wherever a passive construction is at hand....

The active construction is thus confined to instances in which the object-ideas other than the actor are entirely vague and undermined or lacking: *Umalis syà*. He went away....*Sumùsulat sya nañ liham*. He is writing a letter/ letters....*Kumáin sya nañ kánin*. He ate some boiled rice; but: *Kináin nya añ kánin*. Was-eaten (direct passive) by him the boiled rice (subject), i.e. He ate the boiled rice.

If, in spite of the presence of other definite objects, the actor is very decidedly emphasized, a different construction (§§104.197.) is used. (Bloomfield 1917:154–155)

Reid (2002a) observes the unusually high frequency of the so-called “passives” in Guinaang Bontok texts. He reports that so-called “passives” in Bontok account for 70–80% of the verbal constructions in “procedural” texts, and 40–50% of the verbal constructions in “activity” texts (and many “narrative” texts).

Second, although the “active” may be used in the imperative construction, “passives” are more often employed in the imperative construction than the “active”. The frequent use of “passives” in the imperative is often explained in terms of “politeness”. For example, Manaster-Ramer (1992: 273–74) attributes the frequent use of the “passives” in imperatives in Malagasy to “THE POLITENESS CONVENTIONS OF MALAGASY SOCIETY (where DIRECT IMPERATIVES ARE CONSIDERED RUDE)” [small caps are mine].

However, the “politeness” explanation for the high frequency of “passive imperatives” runs into the following problems. (i) Contrary to what Manaster-Ramer claimed in his 1992 paper, the so-called “passive imperatives,” in fact, do NOT express politeness in Malagasy. As noted in Manaster-Ramer (1995), “I have learned from an anonymous referee that (3) [an example of the “passive” imperative] is actually by NO MEANS CONSIDERED POLITE by Malagasy speakers, and may IN FACT be read as “QUITE RUDE.” This serves to further confute my earlier proposal.” (ii) In Tagalog and other Central Philippine languages, the so-called “passives” are the normal way of expressing command or request, as in (44)a. When these constructions are used in the imperative mood, no sense of “politeness” is implied at all. In order to express politeness, the *paki-* construction has to be used, as in (44)b.

(44) Tagalog (Ramos 1985:135, 138)

- a. normal command: the *-in* form is used

burahin=mo ang pisara.
 erase=GEN.2S ANG blackboard
 ‘Erase the blackboard.’

- b. polite request: the *paki-* form is used

pakibura=mo ang pisara.
 erase=GEN.2S ANG blackboard
 ‘Please erase the blackboard.’

Third, in Philippine-type languages, agents are TYPICALLY OBLIGATORY in the “passive” constructions, even when the referent is known. This property is typologically very unusual in that, cross-linguistically speaking, passives TYPICALLY LACK an overt agent (Siewierska 1984:30). As reported in Siewierska (1984:30), an overt agent is NOT

allowed in passive clauses in many languages, e.g., Latvian, Urdu, Kupia, Fijian, Atjnjamathanha, Cupeño, Cora, Huichol, Cahuilla, Shoshoni and Pepecano. Moreover, in some languages, the agent can, but need not be specified. Statistical data (on English, Czech, German, etc.) reveal that agentless passives are far more common than those with an agent.

Fourth, in most, if not all, Philippine-type languages, there are so-called ‘passive’ structures that have no related ‘active’ counterparts, and vice versa. In cases where pairs of “active”-“passive” sentences do exist, there is a clear semantic mis-match between them. Comparing the (a) sentences with the (b) sentences in the following pairs of Tagalog (45) and Guinaang Bontok (46) examples, we can see that the patient/theme “object” of the “active” sentence is OBLIGATORILY INDEFINITE, while the patient/theme “subject” of the “passive” sentence is OBLIGATORILY DEFINITE.

(45) Tagalog (data from Bloomfield 1917:155)

- a. dyadic “active”: the patient/theme “object” is indefinite

kumáin=siya ng *kánin*.
eat=he(NOM.3S) GEN boiled.rice

‘He ate some boiled rice.’

- b. “direct passive”: the patient/theme “subject” is definite

kináin=niya. **ang kánin**.
was.eaten=by.him(GEN.3S) ANG boiled.rice

‘*The boiled rice* (subject) was-eaten (direct passive) by him.’ or ‘He ate *the boiled rice*.’

(46) Guinaang Bontok (Laurie Reid pers. comm.)

- a. dyadic “active”: the patient/theme “object” is indefinite

ʔas maŋan=kami=s tuŋŋa=s masdəm.
 FUT eat=NOM.1PE=LCV corn=LCV night

‘We’ll eat *corn* tonight.’

- b. “direct passive”: the patient/theme “subject” is definite

ʔas kanən=mi nan tuŋŋa=s masdəm.
 FUT eat=GEN.1PE NAN corn=LCV night

‘*The corn* will be eaten tonight.’ or ‘We’ll eat *the corn* tonight.’

Having discussed the “passive” analyses of the “traditional” period, let us turn to the “focus” analyses of the “classical” period in the next section.

3.3.2 The “Classical” Period: The “Focus” Analyses

In this section, I discuss the “focus” analyses of the “classical” period. As mentioned in section 3.3, the linguistic description in this period stresses the UNIQUENESS of Philippine-type languages, with a special sense of the terms “focus” and “topic” being introduced to describe the grammatical structures of these languages. The “focus” analysis, introduced by SIL (Summer Institute of Linguistics) linguists in the 1950’s, thus far, is the most popular analysis of Philippine-type languages.

In a focus analysis, Philippine-type languages are analyzed as having a unique grammatical system, known as the “focus system” in the linguistic literature. The “focus system” is commonly described as exhibiting the following grammatical features:

- a. Verbs carry a series of “focus” affixes, which are considered by some linguists as “case marking” or “agreement marking,” that indicate the case or thematic role of the “topic” or “focus” NP.⁵⁷
- b. NPs bearing a variety of thematic roles can serve as the “focus” NP. Not only agent and experiencer, but also location, instrument, beneficiary, concomitant, etc.---that is, virtually any thematic role---can be selected as the “focus” NP.

In the focus analysis, Philippine-type languages are described as exhibiting a four-way (or five-way) “focus” or “voice” contrast; however, in some languages (e.g., Thao, Kavalan, Lun Dayeh, etc.), only three foci are found.⁵⁸ In general, the following four or five foci are distinguished: Actor Focus (or Agent Focus, or Subject(ive) Focus), Goal Focus (or Patient Focus, or Object(ive) Focus),⁵⁹ Locative Focus, and Instrument(al) Focus (or Associative Focus), and Benefactive Focus (or Beneficiary Focus). Actor Focus (or Agent Focus) constructions are typically represented by **-um-* clauses (including **maN-* and **maR-* clauses). Goal Focus (or Patient Focus) constructions are

⁵⁷ Verbal affixes in Philippine-type languages are referred to in the literature as “focus” affixes, “voice-marking” affixes, “trigger-marking” affixes (Schachter 1990:949–954), or “pivot” morphemes (Ross 1995), “applicative” affixes (Mithun 1994; Payne 1997; Starosta 2002b; etc.). See French (1987–1988) and Blust (2002) for a historical view on the focus system in Philippine (type) languages.

⁵⁸ As discussed in Blust (2002:70), the “three term languages” differ in the ways that the three foci are manifested. In Thao, Actor Focus (marked by *-um-*), Patient Focus (marked by *-in* in the non-perfective aspect; *-in-* or *-in- -in* in the perfective aspect), Locative Focus (marked by *-an*) are distinguished. In Kavalan, Actor Focus, Patient Focus (marked by *-an*), and Instrumental/Beneficiary Focus are distinguished. In Lun Dayeh (northern Sarawak), Actor Focus (marked by *N-*: homorganic nasal substitution), Patient Focus (marked by *-en*), and Instrumental Focus (marked by *piN-*) are found.

⁵⁹ The definition of the term “goal” in Philippine linguistics is different from that in general linguistic literature. In general linguistic literature, the thematic role “goal” refers to “the end point for a movement”. However, in Philippine linguistics, “goal” refers to “the entity undergoing the effect of an action” (i.e., “patient” in general linguistic literature), whereas “the end point for a movement” is considered to be a type of “location”.

represented by **-en* clauses. Locative Focus constructions are represented by **-an* clauses. Instrument(al) Focus constructions and/or Beneficiary Focus (Benefactive Focus) constructions are represented by **Si-* clauses.

Actor Focus constructions can be monadic or dyadic, whereas Goal Focus, Locative Focus, Instrumental Focus and Benefactive Focus are dyadic (or triadic). Goal Focus, Locative Focus, Instrumental Focus and Benefactive Focus are often collectively called “Non-Actor Focus” (abbreviated as NAF) as opposed to the “Actor Focus (AF)” constructions (Tsuchida 1976:43). The classification of verbal clause patterns into AF and NAF constructions in Philippine-type languages is motivated by the following case marking facts. All NAF constructions expect both a genitive-marked agent and a nominative-marked non-agentive NP, whereas dyadic AF constructions expect a nominative-marked agent and a locative-/genitive-/oblique-marked non-agentive NP.

I now demonstrate how a focus system works with the help of the Tagalog examples.

In a focus system, the choice of one of the foci or voices over the others depends on which NP is IN FOCUS.⁶⁰ When the actant who performs, effects, instigates, or controls the action is in focus, the Actor Focus construction is used, as in (47)a–b. When the person or thing directly affected by the action is in focus, the Goal Focus/Patient Focus construction is used, as in (47)c–d. When the location, or the person or thing indirectly affected by the action is in focus, the Locative Focus construction is used, as in (47)e–f.

⁶⁰ In the focus analysis, the syntactically most prominent NP (i.e., the *ang*-marked NP in Tagalog or its equivalent in other Philippine languages) is often referred to as the “(primary) topic” or the “focused” NP in the literature. In addition to “topic” and the “focused NP,” terms such as “focus complement” (Pike 1963), “subject,” “trigger” (Wouk 1986:136; Schachter 1990), “pivot” (Himmelmann 1991; Ross 1995) are used by some linguists to describe this NP.

When an instrument or a moving object is in focus, the Instrumental Focus construction is used, as in (47)g–h. When the beneficiary of the action is in focus, the Benefactive Focus construction is used, as in (47)i.

(47) Tagalog (data from Bloomfield 1917:154 and F. Blake 1906a:188; my analysis)

- a. monadic “Actor Focus” construction: the “topic” is an actor

umalis=siyà.

AF.go.away=NOM.3S

-UM-V=TOPIC/ACTOR

‘He (TOPIC) went away.’

- b. dyadic “Actor Focus” construction: the “topic” is an actor

sumùsulat=siya ng liham.

AF.write=NOM.3S GEN letter

-UM-V=TOPIC/ACTOR

‘He (TOPIC) is writing a letter/letters.’

- c. “Goal Focus” construction: the “topic” is a fully affected goal

sinùlat=niya ang liham.

GF.write=GEN.3S ANG letter

V-IN TOPIC/GOAL or PATIENT

‘He wrote *the letter* (TOPIC).’

- d. “Goal Focus” construction: the “topic” is a fully affected goal

pinùtol=niya ang káho.

GF.cut=GEN.3S ANG wood

V-IN TOPIC/GOAL or PATIENT

‘He cut *the wood* (TOPIC).’

- e. “Locative Focus” construction: the “topic” is the end point (i.e., a kind of location) of an event

sinulátan=niya=akò.

write.LF=GEN.3S=NOM.1S

V-AN=ACTOR=TOPIC/LOCATION

‘He wrote (*to*) *me* (TOPIC).’

- f. “Locative Focus” construction: the “topic” is an entity partly or less fully affected by the action

pinutúlan=niya ang káhoy.

cut.LF=GEN.3S ANG wood

V-AN TOPIC/LOCATION

‘He cut a piece *off the wood* (TOPIC).’

- g. “Instrumental Focus” construction: the “topic” is an instrument

ipinútol=niya ang gúlok.

IF.cut=GEN.3S ANG bolo

I-V TOPIC/INSTRUMENT

‘He cut *with the bolo* (TOPIC).’

- h. “Instrumental Focus” construction: the “topic” is something given forth or parted from

ibinigay=niya sa ákin ang aklàt.

IF.give=GEN.3S LCV.1S ANG book

I-V TOPIC/INSTRUMENT

‘He gave *the book* (TOPIC) to me.’

- i. “Benefactive/Beneficiary Focus”: the “topic” is the beneficiary of the action

ibilí=mo=ako nitó=ng baríl.

BF.buy=GEN.2S=NOM.1S this(GEN)=LIG gun

I-V=ACTOR=TOPIC/BENEFICIARY

‘(You) buy this gun *for me* (TOPIC).’

Having discussed the basics of the focus analysis, I turn to the evaluation of this analysis now. Considering the focus analysis from a broader typological perspective, the following problems are observed.

First, the terms “focus” and “topic” are typically associated with pragmatically salient constructions (such as cleft sentences, topicalized sentences) or a pragmatically salient element (such as the fronted leftmost element in a topicalized construction) in general linguistic literature. However, the use of “focus” and “topic” in the description of

Philippine-type languages is NOT related to pragmatic salience or emphasis at all. In fact, the so-called “focus” constructions are the common verbal constructions and the so-called “topic” or “focus” NPs are the SYNTACTICALLY most prominent rather than the pragmatically most prominent elements in these languages. Moreover, true pragmatically focused constructions such as cleft constructions and topicalized constructions are observed in these languages.⁶¹ The unique use of the terms “focus” and “topic” to refer to constructions and/or elements that are not pragmatically salient creates unnecessary terminological confusion in typological literature (e.g., Shibatani 1988).

Second, three different interpretations of the “focus” affixes on the verb are commonly found in the literature: (a) “focus” affixes as “case-marking,” (b) “focus” affixes as “agreement” affixes, and (c) “focus” affixes as “voice-marking” affixes (see French 1987–1988; Reid 2002a for detailed discussion of the various interpretations of “focus affixes” in Philippine languages).

Under interpretation (a), the “focus affixes” are considered to be “case-marking,” indicating the case of the Topic or focused noun phrase. Such an interpretation is problematic in that languages in other parts of the world NEVER mark the case of nouns on the verb. Case is typically marked by inflection on the head noun of the phrase, by word order, or by some other device in the noun phrase itself.

Under interpretation (b), the “focus affixes” are considered to be “agreement” affixes on the verb, that is, the verb agrees with the THETA ROLE of the Topic or focused NP.

⁶¹ In Philippine linguistics, the “focus” constructions are sometimes considered to be “primary topicalization” or “subjectivalization,” whereas the true topicalized constructions are considered to be “secondary topicalization” (see McKaughan 1970, 1973 for detailed discussion).

Such an interpretation is problematic in that verbs typically do NOT carry theta-role agreement. Cross-linguistically, verbal agreement carries one or more of the following types of information: person, number, humanness, gender, animacy, noun classes, definiteness (Whaley 1997:166). Supposed “theta role (or thematic role, or semantic)” agreement is found only in Philippine-type languages. Moreover, sometimes two “focus affixes” appear on one verb form simultaneously. When this kind of situation happens, which NP should the verb agree with?

Under interpretation (c), the “focus affixes” are “voice-marking” affixes, marking the voice of the construction. Such an interpretation is refuted by some linguists (for example, Starosta 2002b; Reid 2002a), but is accepted by linguists (for example, Himmelmann 2002; Mithun 1994).

Acknowledging that “focus” alternations are NOT the same as the active-passive alternations in English, some other linguists (such as Himmelmann 2002 and Mithun 1994) still consider “focus affixes” to be “voice-marking” affixes in Philippine-type languages. As shown in the following quotes from Himmelmann (2002), Philippine-type “focus” alternations are similar to English active-passive alternations in that both involve the change in the mapping between thematic roles and grammatical relations.

The claim that Philippine-type ‘focus’ is essentially a voice phenomenon should not be confused with the claim that Philippine-type ‘focus’ alternations are essentially the same thing as the active/passive alternation in English.... (Himmelmann 2002:11)

Still, acknowledging that the Philippine-type ‘focus’ alternations are not the same thing as the active/passive alternation in English does not necessarily imply that these two kinds of alternation do not share any similarities. The essential point of similarity between the Philippine-type ‘focus’ and the English active/passive alternations is that in both kinds of alternations a different argument is put into pivot (or subject) function and that this change in the alignment between semantic role and syntactic function is marked morphologically on the verb. (Himmelmann 2002:11)

...it seems important to me to make it clear that there is one essential point of similarity between Philippine-type 'focus' alternations and the voice alternations as defined by Dixon and Aikhenvald: all of these alternations involve a realignment between syntactic pivots and semantic roles. (Himmelman 2002:12)

Starosta (2002b) and Reid (2002a) reject the idea that "focus affixes" are "voice-marking" affixes because "voice" implies inflection, whereas "focus affixes" are DERIVATIONAL rather than inflectional in Philippine-type languages. Moreover, contrary to Himmelman's conception that focus alternations involve a realignment between syntactic pivots and "semantic roles," Starosta and Reid consider that different "focus" types do NOT involve changes in the "case relations" of the Nominative NPs. Assuming that case relations are PERCEPTUAL, rather than situational, they consider the Nominative NPs in all "focus" types to be all PATIENT. Thus, the "focus" alternations only involve an added semantic feature to the verb, that is why they are marked on the verb.

It is still controversial if the "focus" affixes are "voice" affixes. However, one thing to be born in mind is that Philippine-type "focus" alternations are NOT the same as the active-passive alternations in English, regardless of whether or not they are "voice" affixes.

Third, under the "focus" analysis, monadic AF clauses are considered to be intransitive, but the transitivity of dyadic AF clauses and dyadic NAF clauses is often not

clear or is considered to be unimportant by some linguists, as shown in the following quote from Zeitoun (2001).⁶²

Starosta (1988ff) assumes that most, if not all, the Formosan languages are syntactically ergative and has shown repeatedly that ergativity accounts for contrasts in grammatical transitivity. In this paper, I will not try to challenge Starosta's ergative analysis. However, I would like to mention against his "transitivity hypothesis" that if the above assumptions are correct, then one far-reaching implication is that the notions of "stativity" and "dynamicity" represent a far more important factor in the Formosan languages than that of transitivity... (Zeitoun 2001:15)

As shown in the above quote, Zeitoun (2001) correctly recognizes the importance of "stativity" and "dynamicity" in Formosan languages. However, unfortunately, she considers that the recognition of the importance of notions like "stativity" and "dynamicity" somehow undermines the significance of "transitivity" in these languages. It is clear to me that both "stativity"/ "dynamicity" and "transitivity" are important properties associated with verbs and clause structures in Formosan and other Philippine-type languages. The recognition of one property does NOT NECESSARILY undermine the significance of the other property; in fact, sometimes the existence of one property may provide good evidence for the existence of the other property.

The focus analysis adopted by Zeitoun and many other linguists is typologically undesirable in that neglecting the significance of transitivity leads to the impossibility of determining actancy structures of Philippine-type languages. This in turn has broader typological implications. That is, unless transitivity is considered, one cannot include

⁶² Not all linguists adopting the focus analysis consider the notion of transitivity trivial or unimportant. Some linguists, in fact, combine the "focus" analysis with the "ergative" analysis (e.g., Payne 1982, 1988; Rubino 2000) or some other types of analyses. The critiques presented in this section are targeted at the focus analyses that do not consider transitivity as an important notion in the description of Philippine-type languages.

Philippine-type languages in the discussion of the clause structures of the world's languages because their typological status would not be clear.

3.3.3 The “Modern” Period (1): The Ergative Analyses

Having discussed the analyses that appeared in the traditional period and the classical period, let us now turn to the analyses of the modern period. Five different types of analysis have been proposed in the “modern” period: the ergative analysis, the active analysis, the fluid voice analysis, the hybrid analysis, and the symmetrical voice analysis. The appearance of these diverse analyses is related to the fact that the clause structure in Philippine-type languages is inordinately complex. Whether these languages should be considered to form a typologically unique group in terms of their clause structure has been a controversial issue in the literature.

In what follows, the five types of analyses that have appeared in the modern period are presented in the following order. First, the ergative analysis, the representative analysis of the “modern” period, is discussed in section 3.3.3. Then, the other four types of analyses are introduced in sections 3.3.4–3.3.7. Section 3.3.4 discusses the active analysis, section 3.3.5 the “fluid” voice analysis, section 3.3.6 the hybrid analysis, and section 3.3.7 the symmetrical voice analysis.

From the mid-seventies, a number of linguists in North America started exploring the possibility that Philippine-type languages might be ergative in terms of their clause structure. Linguists advocating the ergative analysis of Philippine languages are from diverse theoretical backgrounds, for example, Relational Grammar (Rowse 1983;

Gerds 1988; De Guzman 1988; B. Blake 1988, 1993; etc.), Localist framework (Brainard 1994a, 1996, 1997, and some other SIL linguists), Lexicase Dependency Grammar (Gibson and Starosta 1990; Starosta 1986, 1988, 1995, 1997, 1998, 1999, 2002b; Reid 2000b, 2002a), Categorical Grammar (O'Grady n.d., 1987), Role and Reference Grammar (Walton 1986), Government and Binding (Byma 1986),⁶³ Minimalist framework (Aldridge 2002), discourse and general typological approaches (Cooreman et al. 1984, 1988; Payne 1982, 1997; Mithun 1994; Rubino 2000; etc.), and so on. So far, the ergative analysis is the only analysis that has been accepted by linguists from nearly all major theoretical frameworks.

In the ergative analysis, the notions of “valency” and “transitivity” are clearly distinguished. Therefore, the number of arguments that a verb takes (i.e., valency) CAN NOT be used as the key factor in determining the transitivity of a verb and/or a clause. Instead, the morphosyntactic and sometimes also semantic properties that a clause exhibits are used to determine the transitivity of a verb and/or a clause. A verb is transitive if it takes two or more arguments and exhibits the relevant morphosyntactic and semantic signs of transitivity. A verb is intransitive if it takes one (or more) arguments and exhibits the relevant morphosyntactic and semantic signs of low transitivity or intransitivity.

In the ergative analysis, **-um-* clauses, whether monadic or dyadic, are considered to be intransitive, whereas **-en* clauses, **-an* clauses, and **Si-* clauses are considered to be transitive. More precisely, dyadic **-um-* clauses are considered to be “extended

⁶³ Byma (1986) considers Tagalog to be morphologically ergative, but syntactically split-ergative.

intransitive,” “pseudo-transitive” or “antipassive”. *-*en* clauses are considered to be the unmarked transitive pattern, *-*an* clauses are considered to be “locative applicative,” and **Si-* clauses are considered to be “instrumental applicative” and/or “beneficiary or benefactive applicative”.⁶⁴ Let me illustrate how the ergative analysis works with the help of the Tagalog examples.

In Tagalog, the monadic *-um-* clause in (48)a is considered to be INTRANSITIVE because it takes a nominative-/absolutive-marked S.⁶⁵ The dyadic *-um-* clause in (48)b is considered to be INTRANSITIVE because it takes a nominative-/absolutive-marked S and a genitive-/oblique-marked E (rather than A and O). The dyadic *-in* clauses, *-an* clauses, and *i-* clauses in (48)c-i are considered to be TRANSITIVE because they take a genitive-/ergative-marked A and a nominative-/absolutive-marked O.

⁶⁴ Applicative constructions in Philippine-type languages have been introduced under a number of names, such as “recentralization” (Starosta 1986, 2002b), “3 to 2 advancement” (Gerds 1988), “advancement to direct object” (B. Blake 1988; Brainard 1994a, 1996, 1997), and “applicative” (Mithun 1994; Payne 1997).

⁶⁵ Linguists adopting the ergative analysis of Philippine-type languages differ in the way that they have labeled case forms and grammatical relations in these languages. For example, some linguists (Gerds, Brainard, etc.) prefer to use the label “absolutive” for the equivalent of *ang*-marked noun phrase in Tagalog, but other linguists (Starosta, Reid, etc.) prefer to use the label “nominative” for the same phrase. As for the *ng*-marked agent in dyadic *-*en* clauses, *-*an* clauses, and **Si-* clauses, some linguists (Gerds, Brainard, et al.) prefer to use the label “ergative” for it, others (Starosta, Reid, etc.) prefer to use the label “genitive” for it. “S” is also referred to as “Subject” (Gerds) or “Patient (PAT)” (Starosta); “A” is also referred to as “Subject” (Brainard, Gerds, etc.) or “Agent (AGT)” (Starosta); “O” is also referred to as “Object” (Brainard, Gerds, etc.) or “Patient (PAT)” (Starosta). One thing to be noticed is that the case relations “Agent” and “Patient” in Starosta’s lexicase descriptions differ from the thematic roles “agent” and “patient” commonly used in the literature. Case relations are “perceptual” roles, whereas thematic roles are “situational”. More precisely, case relations are combinations of “thematic roles” and “grammatical relations”. The difference between Starosta’s “perceptual” case relations and non-lexicase analyses is clearly manifested in the treatment of the single actant of monadic (intransitive) clauses. In Starosta’s lexicase analysis, the sole actant in monadic clauses is always PATIENT whether it is volitional or not (because it is assumed to be the PERCEPTUAL CENTER of an event). However, in non-lexicase analyses, the sole actant in monadic clauses can take either the agent role (if volitional) or the patient role (if non-volitional). Although this actant might take different thematic roles, it always carries the same grammatical relation (i.e., depending on one’s theoretical orientation, it is always “Subject,” “Absolutive,” “S,” etc.).

The fact that the *-um-* clause in (48)b takes two arguments, like dyadic transitive clauses, has led linguists to refer to it as an “extended intransitive,” “pseudo-transitive,” or “antipassive” construction. The dyadic *-in* clauses in (48)c–d are generally considered to be unmarked transitive constructions. The dyadic *-an* clauses in (48)e–f are referred to as “locative applicative” constructions in that the NP bearing the LOCATION role assumes the O relation. The dyadic *i-* clauses in (48)g–h are referred to as “instrumental applicative” constructions in that the NP bearing the INSTRUMENT role assumes the O relation. The dyadic *i-* clause in (48)i is referred to as a “beneficiary/benefactive applicative” construction in that the NP bearing the BENEFICIARY or BENEFACTIVE role assumes the O relation.

(48) Tagalog (data from Bloomfield 1917:154 and F. Blake 1906a:188; my analysis)

a. monadic intransitive:

umalis=siyà.
 go.away=NOM/ABS.3S
 V.INTR=S
 ‘He went away.’

b. dyadic intransitive with an INDEFINITE patient:

sumùsulat=siya ng liham.
 write=NOM/ABS.3S GEN/OBL letter
 V.INTR=S E
 ‘He is writing a letter/letters.’

c. dyadic transitive with a DEFINITE patient:

sinulat=niya ang liham.
 write=GEN/ERG.3S ANG letter
 V.TR=A O
 ‘He wrote the letter.’

One thing that is worth-noticing is that, in Tagalog and many other Philippine-type languages, the patient NPs of dyadic *-um-* clauses and those of dyadic *-in* clauses (or their equivalent in other Philippine-type languages) differ in terms of the semantic, morphological, and syntactic properties associated with them.

Semantically, the patient NPs of dyadic *-um-* clauses and those of dyadic *-in* clauses differ in terms of SPECIFICITY or DEFINITENESS. In general, the genitive-/oblique-marked patient NPs in dyadic *-um-* clauses tend to be INDEFINITE or NON-SPECIFIC (as in (48)b), whereas the nominative-/absolutive-marked patient NPs in dyadic *-in* clauses (or their equivalent in other Philippine-type languages) tend to be DEFINITE or SPECIFIC (as in (48)c–d) (see Bell 1978 for detailed discussion about this constraint).

Morphologically, the patient NPs of dyadic *-um-* clauses tends to be marked by some kind of oblique marker (e.g., genitive case in Tagalog, locative case in most of the Cordilleran languages (such as Bontok, Balangao, etc.), oblique case in Ivatan, etc.),⁶⁶ whereas the patient NPs of dyadic *-in* clauses are nearly always marked by the core nominative or absolutive.⁶⁷

Syntactically, the patient NPs in dyadic *-um-* clauses differ from those in dyadic *-in* clauses in their ability to undergo syntactic operations. For example, the patient NPs in

⁶⁶ The discussion here is about the marking for full noun phrases rather than for pronominals. Generally speaking, Philippine-type languages have three (or more) sets of pronouns: genitive/ergative, nominative/absolutive, and locative.

⁶⁷ One exception to this statement is found in the recent perfective aspect. In dyadic recent perfective clauses, the case marking for the patient NPs is neutralized. For example, in Tagalog, the recent perfective aspect of dyadic *-in* clauses will take two genitive-marked NPs, i.e., a genitive-marked agent and a genitive-marked patient. However, unlike the genitive-marked patient in dyadic *-um-* clauses, (which cannot undergo major syntactic operations,) the genitive-marked patient in the recent perfective aspect, like the nominative-/absolutive-marked patient in other aspects (neutral, contemplated, incompleting, completed), can undergo some major syntactic operations, such as relativization. It is still not yet clear why case marking is neutralized in the recent perfective aspect but not in other aspects.

dyadic *-in* clauses can undergo syntactic processes (such as relativization and *wh*-clefting), but patient NPs in dyadic *-um-* clauses cannot.

Comparing the morpho-syntactic and semantic properties that verbal clauses in Philippine-type languages exhibit with those found in well-known ergative languages, linguists working with a variety of theoretical backgrounds have reached the same conclusion. That is, Philippine-type languages are ERGATIVE; dyadic *-in* clauses in these languages are TRANSITIVE, but dyadic *-um-* clauses are EXTENDED INTRANSITIVE, PSEUDO-TRANSITIVE, or ANTIPASSIVE (i.e., a type of INTRANSITIVE).

The ergative analysis of Philippine-type languages has a number of advantages.

First, the ergative analysis naturally accounts for the semantic difference between the patient NPs in dyadic *-in* clauses and dyadic *-um-* clauses. Cross-linguistically, the patient NP in an antipassive construction, if present, tends to receive an INDEFINITE or NON-SPECIFIC interpretation. By contrast, the patient NP in a canonical transitive construction tends to receive a DEFINITE or SPECIFIC interpretation (see Cooreman 1994:52–56; and Manning 1996:12, 15, 84–98 for detailed discussion). The contrast between the patient NP in dyadic *-in* clauses and the patient NP in dyadic *-um-* clauses seems to parallel the common characterization of the contrast between the patient in antipassive constructions and the patient in canonical transitive constructions.

Second, assuming dyadic *-um-* clauses are intransitive and dyadic *-in* clauses are transitive, one can easily account for the morphosyntactic difference between dyadic *-in* clauses and dyadic *-um-* clauses. For example, one can attribute the difference in case marking between the patient NP of dyadic *-um-* clauses (that are always marked by

oblique cases (e.g., genitive, locative, oblique, etc.)) and the patient NP of dyadic *-in* clauses (that are nearly always marked by the core case (nominative or absolutive)) to the transitivity of the clauses.

Third, assuming dyadic *-um-* clauses are intransitive and dyadic *-in* clauses are transitive, one can easily account for the syntactic difference between dyadic *-in* clauses and dyadic *-um-* clauses. In Philippine-type languages, reference-related processes (such as relativization, *wh*-cleft, etc.) are sensitive to the hierarchy effect.⁶⁸ The patient NP of dyadic *-in* clauses can undergo relativization, but the patient NP of dyadic *-um-* clauses cannot. Adopting the ergative analysis, one can state that Philippine-type languages, like the well-known syntactically ergative languages (e.g., Dyirbal and Eskimo), observe the following relativization constraint. That is, only NOMINATIVE/ABSOLUTIVE NPs can undergo relativization.⁶⁹ More precisely, relativization applies to the nominative/absolutive-marked NP (the patient of dyadic *-in* clauses and the agent of dyadic *-um-* clauses), but NOT to the oblique-marked patient of dyadic *-um-* clauses (and the genitive-/ergative-marked agent of dyadic *-in* clauses) in Philippine-type languages.

⁶⁸ Keenan and Comrie (1977) survey some 50 languages and posit the following Accessible Hierarchy for relativization: subject > direct object > indirect object > oblique > genitive > object of comparison [Note: the symbol ">" stands of "more accessible to"]. Johnson (1974) and Fox (1987) observe that relativization facts in some ergative languages do NOT follow the above hierarchy. Instead, they obey the Ergative Hierarchy (subject of intransitive, direct object > subject of transitive > indirect object > oblique >...) or the Absolutive Hypothesis (absolutive > ergative > ...).

⁶⁹ In fact, nominative/absolutive NPs are not the only NPs that can undergo relativization. Ceña (1979) states that possessors, comitative NPs, and objects of comparison can also undergo relativization in Tagalog. Reid and Liao (2004a) re-examine the data presented by Ceña (1979) and state that only the possessors (of nominative/absolutive NPs) and the nominative NPs can be relativized in Philippine languages. In some languages (such as Tagalog and Cebuano), it seems that only possessors of inalienably possessed nouns can be relativized. However, in other languages (such as Guinaang Bontok and Ibaloy), possessors of both alienably possessed and inalienably possessed noun can be relativized.

Although the ergative analysis has some obvious advantages over the other analyses, it often faces the following criticisms.

First, one often-cited problem with the ergative analysis of Philippine-type languages is that the presumably “antipassive” verbs and monadic intransitive verbs are morphologically identical (see Foley 1998). This point, in my opinion, does NOT constitute a valid argument against the ergative analysis.

It is generally true that there is some explicit formal marking of an antipassive construction in most well-known ergative languages. For example, in ergative Australian languages Dyirbal and Kalkatungu, a unique “antipassive” morpheme can be found in an antipassive construction. However, the fact that the same morphological marking is found in both canonical intransitive verbs and the presumably antipassive verbs in Philippine-type languages should NOT be considered as a piece of evidence against the ergative analysis.

It is well-known that antipassivization is a type of DETRANSITIVIZATION process. That is, after applying the antipassivization operation, the resulting sentence will be INTRANSITIVE. The use of one formative for forming both canonical intransitive verbs (i.e., monadic intransitive verbs) and antipassive verbs can easily be explained in terms of economy. Because both canonical intransitive verbs and antipassive verbs are INTRANSITIVE verbs, it seems natural for a language to use one formative, rather than two, for marking the ultimate INTRANSITIVE verbs, whether derived or not.

Moreover, Payne (1982) reports that a well-known ergative language Yup'ik Eskimo, like Philippine-type languages, uses one formative for forming both canonical intransitive

verbs and antipassive verbs. Furthermore, in English, the passive participle is almost always identical in form to the perfective or past participle (both are expressed by *-(e)d/-en*). So far, probably all linguists still believe that English has a passive construction even though the formative *-(e)d/-en* is also used in the past tense or the perfective aspect. If one can claim that *-(e)d/-en* forms are passive verbs in English, why may not *-um-* mark antipassive verbs in Tagalog (and other Philippine-type languages)?

Second, the other often-cited problem with the ergative analysis is that the patient of the “antipassive” construction functions as a TERM or an ARGUMENT rather than as a non-term or an oblique in Philippine-type languages (see Kroeger 1993 and Foley 1998). This point, in my opinion, does NOT constitute a valid argument against the ergative analysis either.

As Nichols (1982), Tsunoda (1988), and B. Blake (1993) point out, antipassivization is a detransitivization operation, but is NOT NECESSARILY a VALENCY-DECREASING operation. It is true that in some well-know ergative languages (such as Dyirbal) antipassivization is a detransitivization operation as well as a valency-decreasing operation. However, Nichols (1982) observes that antipassivization in Ingush (Caucasus) does NOT reduce valency. Tsunoda (1988) also reports that antipassivization is NOT a valency-decreasing process in Warrungu (an Australian language). It seems to me that it is very possible that antipassivization in Philippine-type languages, like Ingush and Warrungu, is a detransitivization but NOT a VALENCY-DECREASING operation.

...antipassivization is not necessary for deleting the underlying O. (In this respect, Warrungu differs from Yidiny (Dixon 1977:279) and resembles Ingush of Caucasus (Nichols 1982:456).) For Vtr's and ANTI's, every logically possible type of ellipsis has been attested in the texts.... (Tsunoda 1988:624)

...It should be mentioned here that there is no positive evidence to show that Warrungu antipassivization decreases valence. Thus, frequency of ellipsis does not provide any proof, since, as we saw in Tables 7, 8 and 9, all of the A, O, d-S and OBL are highly elliptical, and furthermore the OBL is not always more elliptical than the O. (Nichols (1982:456) concludes, for a similar reason, that Ingush antipassivization does not lower valence.).... (Tsunoda 1988:624)

Valence is decreased by one in passive and spontaneous constructions and – if verbal marking is employed – also in reflexive and reciprocal constructions (Shibatani 1985:837, 838, 842)....On the other hand, antipassivization in Warrungu and Ingush (and probably in many other languages) does not reduce valence. (Tsunoda 1988:639–40)

Having discussed the representative analysis of the Modern Period, I will now turn to the discussion of other analyses found in the modern period.

3.3.4 The “Modern” Period (2): The “Active” Analysis

In the modern period, besides the ergative analysis, a number of analyses have been proposed to describe the clause structure in Philippine-type languages. The first type of analysis to be introduced is the “active” analysis.

Drossard (1984, 1994:9) observes that a two-way VOICE distinction, that is, active versus stative, can be made in Tagalog. Active-stative voices can be distinguished according to the following criteria: (a) the degree of control; (b) purposeful vs. accidental actions; (c) the idea of “factual” vs. “ability”. The active voice is used in controlled actions, purposeful actions, and/or factual events, whereas the stative voice is used in uncontrolled actions or feelings, accidental actions, and/or abilitative actions.

Morphologically, stative voice verbs are marked differently from active voice verbs.

Verbs in the stative voice are marked by the formative *ma-*, but verbs in the active voice are not. As shown in table 3.2, verbs in the ACTIVE VOICE are marked by *-um-*, *mag-*, *-in-*, *i-/ipag-*, *-an*, or *ipang*, whereas verbs in the STATIVE VOICE are marked by *maka-*, *ma-*,

mai-/maipag-, ma- -an, or maipang. Based on the split in verbal morphology, Drossard (1984, 1994) claims that Tagalog has an ACTIVE VOICE SYSTEM.

TABLE 3.2. ACTIVE VS. STATIVE AFFIXES IN TAGALOG (DROSSARD 1994:10)

	ACTIVE	STATIVE
AGENT	<i>-um-, mag-</i>	<i>maka-</i>
OBJECT	<i>-in-</i>	<i>ma-</i>
BENEFACTIVE	<i>i-</i>	<i>ma-i-, ma-ipag-</i>
LOCATIVE	<i>-an</i>	<i>ma-...-an</i>
INSTRUMENTAL	<i>ipang-</i>	<i>ma-ipang-</i>

A similar type of analysis has been proposed for Cebuano (and other Philippine languages) by Shibatani (1988:102–103). According to Shibatani (1988:103), a small number of Cebuano verbs require their topic (i.e., the focus NP) to invoke the goal-topic marking (i.e., the goal-focus marking) on them. As shown in (49)a–b, when the (monadic) predicate in question is “active,” the “actor-focus” verb form (i.e., *ni-* form) is used (compared with the dyadic predicate in (49)c); when the predicate is “stative,” the goal-focus verb form (i.e., *gi-* form) is used (compared with the dyadic predicate in (49)d).

(49) Cebuano (data from Shibatani 1988:103)

- a. monadic: actor-topic/ACTOR-focus (“active”)

nidagan=siya.

run=TOP.3S

‘He ran.’

- b. monadic: actor-topic/GOAL-focus (“stative”)

gikapoy=siya.

tired=TOP.3S

‘He is/got tired.’

- c. dyadic: actor-topic/actor-focus

nibasa=**siya** ug libro.
read=TOP.3S GOAL book

‘He read a book.’

- d. dyadic: goal-topic/goal-focus

gibasa=**niya ang** libro.
read=ACTOR.3S TOP book

‘He read the book.’

Moreover, the verbal morphology of monadic intransitive verbs differs according to the nature of the actor in question. When the actor is AGENTIVE, the monadic intransitive verb is marked by the ACTOR-TOPIC or ACTOR-FOCUS forms *ni-* (perfective) or *mu-* (imperfective, contemplated), as in (50)a–b. When the actor is NON-AGENTIVE, the monadic intransitive verb is marked by the GOAL-TOPIC or GOAL FOCUS forms *na-* (perfective) or *ma-* (contemplated), as in (50)c–d.

(50) Cebuano (data from Shibatani 1988:103–104)

- a. monadic: agentive ACTOR-topic/ACTOR-focus (“active” intransitive)

nidagan **ang** bata.
run TOP child

‘The child ran.’

- b. monadic: agentive ACTOR-topic/ACTOR-focus (“active” intransitive)

mudagan **ang** bata.
run TOP child

‘The child will run.’

- c. monadic: non-agentive GOAL-focus (“inactive” intransitive)

natulog **ang** bata.
sleep TOP child

‘The child is asleep.’

- d. monadic: non-agentive GOAL-focus (“inactive” intransitive)

matulog ang bata.
 sleep TOP child

‘The child will (go to) sleep.’

Having discussed the basics of the “active” analysis, let me turn to an evaluation of this analysis. Three major problems are found in the “active” analysis.

First, one obvious problem with Drossard’s and Shibatani’s proposals is that true “active” languages (such as Laz) exhibit split marking in their nominal case-marking systems (including their pronominal marking system) rather than in verbal morphology (see Chapter 2, section 2.5.2 for details). The fact that monadic verbs can be marked differently should NOT be considered to be a piece of evidence for the “active” system.

Second, Drossard’s use of the term “active voice” is rather confusing. The “active voice” (as the counterpart of “stative”) in Drossard’s analysis is NOT the same as the “active voice” (as the counterpart of “passive”) that is commonly used in the general linguistic literature. In fact, Drossard’s “active” is better replaced by the less confusing term “dynamic” (see Huang 2000a; Zeitoun and Huang 2000 for discussion of “dynamic” and “stative” verbs in Formosan languages).

Third, Drossard distinguishes active voice from stative voice. However, no discussion of notions such as “Agent Focus,” “Object Focus,” “Benefactive Focus,” “Locative Focus,” and “Instrumental Focus” is made. It is not clear what kind of syntactic roles these “focus constructions” play in Drossard’s system. Moreover, without knowing the syntactic status of the focus constructions, one cannot decide the typological status of Philippine-type languages.

3.3.5 The “Modern” Period (3): The “Fluid Voice” Analysis

The second type of non-ergative analysis to be introduced is the “fluid voice” analysis. The “fluid voice” analysis is primarily advocated by Shibatani (1988, 1999, 2001) and a few other Japanese linguists (see Ferreirinho (1993) for Limos Kalinga; Katagiri (2002) for Proto-Austronesian, Cebuano, etc.).

In the “fluid voice” analysis outlined by Shibatani (1988, 1999, 2001), Philippine-type languages are assumed to exhibit the following properties.⁷⁰ First, there is NO noun-verb distinction in the root form. NO form-function correlations can be observed in Philippine-type languages. Hence, NO basic diathesis can be observed.⁷¹ The diathesis is assumed to emerge only when the “focus”-marking is determined. Second, ALL (“FOCUS”) CONSTRUCTIONS are considered to be DERIVED. The BASIC structure (or the neutral voice orientation) is assumed to be reflected in NOMINALIZED forms or RECENT PERFECTIVE forms.

An important assumption underlying the “fluid voice” analysis is that Philippine-type languages are UNIQUE among the world’s language because they do NOT distinguish noun roots from verb roots. The examples that Shibatani used to support this claim are presented in table 3.3. As shown in table 3.3, the presumably “NOUN ROOTS” *bus* ‘bus’, *anak* ‘child’, and *Ingles* ‘English’ appear on the VERBS *mag-bus* ‘ride a bus’, *mang-anak* ‘give birth to’, and *mag-Ingles* ‘speak English’. Moreover, the presumably “VERB

⁷⁰ The claims that Shibatani made are specifically for Tagalog and Philippine languages. However, due to structural similarities between Philippine languages and other Philippine-type languages spoken outside of the Philippines, one can easily extend these claims to Philippine-type languages in general.

⁷¹ ‘Diathesis’ refers to ‘the correspondence between thematic roles (such as agent, theme, goal, etc.) and grammatical relations (such as subject, direct object (primary or secondary), oblique, etc.)’

ROOTS” *tago* ‘hide’, *awit* ‘sing’, and *luto* ‘cook’ appear on the NOUNS *tago-an* ‘hiding place’,⁷² *awit-in* ‘song’, and *pag-luto* ‘something caused to be cooked’.

TABLE 3.3. NO NOUN/VERB DISTINCTION IN TAGALOG ROOT FORMS (SHIBATANI 2001)

“noun” roots		verbs	
<i>bus</i>	‘bus’	<i>mag-bus</i>	‘ride a bus’
<i>anak</i>	‘child’	<i>mang-anak</i>	‘give birth to’
<i>Ingles</i>	‘English’	<i>mag-Ingles</i>	‘speak English’
“verb” roots		nouns	
<i>tago</i>	‘hide’	<i>tago-an</i>	‘hiding place’
<i>awit</i>	‘sing’	<i>awit-in</i>	‘song’
<i>luto</i>	‘cook’	<i>pag-luto</i>	‘something caused to be cooked’

The fact that the presumably “noun roots” can appear on verbs and the presumably “verb roots” can appear on nouns leads Shibatani to consider that Tagalog and other Philippine-type languages are UNIQUE in that they do NOT distinguish noun roots from verb roots. However, a careful examination of Tagalog data and a comparison of cross-linguistic data suggests that Tagalog and other Philippine-type languages are NOT unique at all.

First, there are some problems with Shibatani’s interpretation of Tagalog data. Shibatani describes *awit* and *lutò* as VERB ROOTS appearing on NOUNS. As a matter of fact, they are NOUNS meaning ‘song’ (as in *Ang awit (kantá) na inyóng nápakinggán ngayón lamang ay inawit ni Bb. Reyes*. ‘The song which you just heard was sung by Miss Reyes.’) and ‘cuisine, style of cooking, something cooked’ respectively, rather than verb roots that appear on nouns (please refer to English’s (1987) *Tagalog-English dictionary* for details). Moreover, the form *awitin* has a verbal meaning ‘sing something specific’

⁷² In the standard orthography of Tagalog, *tagoan* is written as *taguan*.

(as in *Awitin ninyó ang unang imno*. ‘Sing the first hymn.’) rather than the nominal meaning ‘song’. Furthermore, the form *pag-luto* ‘something caused to be cooked’, in fact, according to the dictionaries and informants I consulted, does NOT exist in Tagalog. Shibatani does not state how he obtained his Tagalog data.

Second, cross-linguistically, it is NOT unusual to have the presumably “noun roots” appearing on verbs and the presumably “verb roots” appearing on nouns. The process of deriving verbs from “noun (roots)” is found in English (51) and the process of deriving nouns from “verb (roots)” is found in English and Samoan (as in (52)–(53)). Comparing the Tagalog data that Shibatani presented with the English and Samoan data, we can see that Tagalog and other Philippine-type languages are NOT unique in having “noun roots” appearing on verbs and “verb roots” appearing on nouns. The only thing that seems to make Philippine-type language unique is that they can use one word (such as *mag-bus*, *mang-anak*, *mag-Ingles*, etc.) to express notions (such as ‘ride a bus’, ‘give birth to’, ‘speak English’, etc.) that typically require phrasal expressions in English and other languages.

(51) English

<u>noun (roots)</u>	<u>verbs</u>	<u>examples</u>
<i>hand</i>	<i>unhand</i>	<i>Unhand</i> the girl.
<i>fang</i>	<i>defang</i>	They <i>defanged</i> the snake.
<i>bone</i>	<i>debone</i>	They <i>deboned</i> the chicken.

(52) English

<u>verb (roots)</u>	<u>nouns</u>	<u>examples</u>
<i>grow</i>	<i>growth</i>	Economic <i>growth</i> is down.
<i>walk</i>	<i>walking</i>	<i>Walking</i> is good for you.
<i>open</i>	<i>opener</i>	Terry just bought a can <i>opener</i> .
<i>write</i>	<i>writer</i>	Robin is a well-known <i>writer</i> .

(53) Samoan (data from Mosel and Hovdhaugen 1992:84; cited in Payne 1997:225, 229)

<u>verb (roots)</u>	<u>nouns</u>
<i>galue</i> ‘to work’	<i>galuega</i> ‘some work’
<i>fai</i> ‘to do’	<i>faiga</i> ‘action’
<i>moe</i> ‘to sleep’	<i>moega</i> ‘bed’
<i>a’o</i> ‘to learn’	<i>a’oga</i> ‘school’

Third, most, if not all, forms that have been claimed to be “VERB ROOTS” in Tagalog are in fact “NOUNS”. For example, the form *bili* was commonly analyzed as a “verb root” because it appears on verb forms *bumili* (or *bilhín*, *bilhán*, etc.) ‘buy something (from...)’. However, if we look up any Tagalog dictionary, we will find that the so-called verb root *bili* itself is a NOUN meaning ‘purchasing or buying price’ (as in *Magkano ang bili mo diyán (dito)?* ‘How much was your buying price of that (this)?), rather than a verb. A similar kind of situation can be observed for the form *bigáy*. The form *bigáy* is often analyzed as a “VERB ROOT” because it appears on verb forms (*ibigáy*, *bigyán*, etc.) ‘give something to...’. However, the form *bigáy* itself, in fact, is a NOUN meaning

‘something that is given, gift’ (as in *Iyán ang bigáy niyá sa akin*. ‘That’s his gift to me.’).

A similar kind of situation can also be observed in many other forms that have been previously analyzed as “verb roots”. In the case of *bili* and *bigáy*, should we classify them as noun roots (because the bare root forms can function as nouns by themselves), or verb roots (because they appear on the verb forms), both, or neither?

Forms such as *bili*, *bigáy*, and others that have been previously analyzed as “verb roots” but could function as NOUNS (rather than verbs) in their bare root forms, raise a fundamental question, that is, “could root forms be categorized as noun roots, verb roots, adjective roots, etc.?” If the answer is “yes,” a related question is “how can one determine the categorical status of root forms?”; that is, “what kind of criteria can be used to determine the categorical status of root forms?”

Terms such as “verb roots,” “noun roots,” “adjective roots” are commonly found in the literature, but hardly any explicit criteria for determining the categorical status of root forms can be found. One often-cited criterion is Croft’s (1991) functional-semantic approach to categories.

According to Croft (1991:52–53), the three major syntactic categories—nouns, verbs, and adjectives—are associated with three externally defined pragmatic functions—references, predication, and modification—respectively. REFERENCE refers to ‘get the hearer TO IDENTIFY AN ENTITY as what the speakers is talking about’. PREDICATION refers to ‘what the speaker intends to say about what he is talking about (the referent)’. MODIFICATION is of two types: (i) RESTRICTIVE MODIFICATION helps fix the identity of what one is talking about (reference) by narrowing the description; (ii) NON-RESTRICTIVE

MODIFICATION provides a secondary comment (predication) on the head that they modify, in addition to the main predication.

OBJECT-denoting roots are typically NOUNS (with the pragmatic function REFERENCE); ACTION-denoting roots are typically VERBS (with the pragmatic function PREDICATION); PROPERTY-denoting roots are typically ADJECTIVES (with the pragmatic function MODIFICATION). When the above conditions are met, we expect the occurrence of bare root forms. However, when the above conditions are NOT met, we expect the presence of an additional morpheme. The additional morpheme can be phonologically dependent or independent.

As shown in table 3.4, the object-denoting word *vehicle* appears in its bare root form when it has the reference function. However, it has to take an additional bound morpheme -'s, -ar, or the phonologically independent morpheme *of, in, etc.* when it has the modification function. Moreover, it takes an additional phonologically independent morpheme *be* when it has the predication function. A similar kind of situation holds for the property-denoting form *white* and the action-denoting form *destroy*. When these forms are used in their prototypical pragmatic functions (i.e., modification for *white* and predication for *destroy*), they occur in their bare root form. However, when they are used in their non-prototypical pragmatic functions (i.e., reference and predication for *white*; reference and modification for *destroy*), they take an additional morpheme.

TABLE 3.4. EXAMPLES OF MARKED AND UNMARKED CORRELATIONS (CROFT 1991:53)

	REFERENCE	MODIFICATION	PREDICATION
OBJECTS	vehicle	vehicle's, vehicular, <i>of/in/etc.</i> the vehicle	<i>be a/the</i> vehicle
PROPERTIES	<i>whiteness</i>	white	<i>be</i> white
ACTIONS	<i>destruction,</i> <i>to</i> destroy	<i>destroying,</i> <i>destroyed</i>	destroy

The English examples that Croft provided in table 3.4 are ideal candidates for illustrating the correlations between form and function. However, if we apply Croft's generalization to other examples in English, we can observe two types of counterexamples.

First, according to Croft's generalization, action-denoting roots are expected to be verbs with the predication function. If the condition is met, we expect the occurrence of bare root forms; however, if the condition is not met, we expect the presence of an additional morpheme. It is true that action-denoting roots such as *hit*, *kick*, *comb*, *walk*, *search*, etc. have the predication function (as in *John hit the ball.*). However, the same root forms also have the reference function (as in *That is a timely hit.*). If we apply Croft's generalization faithfully, we expect bare root forms such as *hit*, *kick*, *search*, etc. to be verbs, and root forms with an additional morpheme to be used when they have the reference function. However, as already seen in the example for *hit*, the bare root form *hit* is used for both the predication and reference functions.

Second, according to Croft's generalization, property-denoting roots are expected to be adjectives with the modification function. If the condition is met, we expect the occurrence of bare root forms; however, if the condition is not met, we expect the

presence of an additional morpheme. In English, some property-denoting forms such as *beautiful* have the modification function (as in *Helen is beautiful.*) as well as the reference function (as in *Helen is a beauty.*). Applying Croft's generalization to the data, we expect bare root forms (such as *beauty*) to be ADJECTIVES, and root forms with an additional morpheme (such as *beautiful*) to be NOUNS (used for the reference function). However, examples such as *beautiful-beauty* contradict Croft's generalization in that bare PROPERTY-denoting root forms are used for the REFERENCE function, but root forms with an additional morpheme are used for the MODIFICATION function.

The above facts suggest that the functional-semantic approach to categories is NOT a reliable way for determining the categorical status of roots and their derivationally related forms. Under such circumstances, what kind of criterion could be used for determining categories? One solution to this problem is to look at their morphosyntactic distribution (i.e., the cooccurrence restrictions) of forms. However, such a criterion can only help us to decide the categorical status of WORDS rather than of roots. It is still not clear how one can unambiguously decide the categorical status of root forms, if "roots" really exist at all as a linguistic entity.

In addition to claiming that there is no distinction between noun roots and verb roots, Shibatani provides the following pairs of sentences to support his claim that there is NO correlation between form and function in Philippine-type languages. As shown in (54)–(55), the object-denoting words *lalaki* and *Rosa* can function as both an argument (with the nominal meaning 'man' and 'Rosa' respectively) and a predicate (with the verbal meaning 'be a man' and 'be Rosa' respectively). Moreover, the action-denoting word

nagsalita can function as both a predicate (with the verbal meaning ‘spoke’) and an argument (with the nominal meaning ‘the one who spoke’).

(54) Tagalog (data from Shibatani 2001)

a. *lalaki* ‘man’ (nominal):

maestro **ang** *lalaki*.

teacher TOP(ACTOR) man

‘The man is a teacher.’

b. *lalaki* ‘be a man’ (verbal):

lalaki ang bata.

male TOP(ACTOR) child

‘The child is a boy.’

(55) Tagalog (data from Shibatani 2001)

a. *nagsalita* ‘X spoke’ (verbal):

nagsalita si Rosa.

spoke TOP(ACTOR) Rosa

‘Rosa spoke.’

b. *nagsalita* ‘one who spoke’ (nominal):

si Rosa **ang** *nagsalita*.

TOP Rosa TOP(ACTOR) spoke

‘The one who spoke is Rosa.’

Based on the above type of evidence, Shibatani claims that there is NO distinction between nouns and verbs in the lexicon in Philippine-type languages. Hence, NO basic diathesis can be observed. The diathesis is assumed to emerge only when the “focus”-marking is determined. Such facts make Shibatani consider Philippine-type languages as a unique group of languages that do NOT fit into the general typological classification of languages according to their actancy structures, as shown in the following quote.

What is then our conclusion with regard to the typology of Philippine languages? The answer obviously is that in their overall characteristics, they are neither accusative nor ergative. In this regard, the position taken by Schachter and Otnes (1972) seems eminently sound; namely, that the basic structure of Tagalog consists of a predicate and a topic, being neutral with regard to the accusativity/ergativity parameter.... (Shibatani 1988:113–114)

Another claim that Shibatani made about Philippine-type languages is that ALL (“FOCUS”) CONSTRUCTIONS are considered to be DERIVED; hence, the BASIC structure or the neutral voice orientation is assumed to be reflected in NOMINALIZED forms or RECENT PERFECTIVE forms. Such claims are based on the assumption that all “focus” constructions (“actor focus,” “goal focus,” etc.) consist of a predicate and a TOPIC. As shown in (56), the “actor focus” construction consists of at least a predicate and an *ang*-marked “topic” phrase, and the “goal focus” construction consists of at least a predicate and an *ang*-marked “topic” phrase.

(56) Cebuano (data from Shibatani 1988:98, 99)

a. dyadic: actor-topic/actor-focus

nibasa ang bata ug libro.
read TOP(ACTOR) child GOAL book

‘The child read a book.’

b. dyadic: goal-topic/goal-focus

gibasa sa bata ang libro.
read ACTOR child TOP(GOAL) book

‘The child read the book.’

c. monadic: actor-topic/actor-focus

nidagan ang bata.
run TOPIC(ACTOR) child

‘The child ran.’

Shibatani considers constructions containing an *ang*-marked “topic” in Cebuano (or its equivalent in other Philippine-type languages) to be NON-BASIC because “TOPIC” marking is motivated by DISCOURSE or PRAGMATIC factors, rather than principles of semantic motivation, economy, and distinctiveness, or by any discriminatory function, as shown in the following quotes.

Indeed, it is necessary to distinguish the basic case marking that is governed by the principles of semantic motivation, economy, and distinctiveness, as discussed by Kibrik (1985), or by the discriminatory function (see Comrie 1978 and Dixon 1979), and the marking of nominals motivated by a discourse or pragmatic consideration. In the case of the topic marker *ang* and its equivalents in various Philippine languages, it is best considered to be non-basic case marking. Though they are grammaticized (i.e., have become a requisite element of a clausal structure) to a considerable extent, their occurrences in transitive clauses are largely conditioned by pragmatic factors, especially by the referentiality of the nominal constituent. Thus, if one is to compare two languages in terms of case marking, it is necessary to compare the same kinds of case marking systems rather than mixing systems governed by different principles. In other words, we must discuss and compare the basic case marking system (i.e., marking not masked by the topic marker) of Philippine languages and the similar system in an ergative language. The difficulty in the Philippine situation is that topicalization (i.e., marking by *ang*) is grammaticized to the extent that a normal sentence, whether transitive or intransitive, must contain one topic nominal, which has the effect of masking the basic case marking system. A situation with the Japanese topic marker *wa* is highly similar in that the *wa*-marked nominal loses its basic nominative (*ga*) or accusative (*o*) marking. However, in both these languages, the basic marking reveals itself when the nominal in question is not topicalized, indicating the overlaying or secondary nature of topic marking... (Shibatani 1988:97–98)

In Philippine languages, nominals reveal their basic case forms when they are not marked [by] *ang*... (Shibatani 1988:98)

We have [a] little difficulty in finding the basic case marking of the nominal in intransitive clauses, for it is normally topicalized, as in the embedded clauses in Japanese. Fortunately, despite strong grammaticization of the topic nominal, Philippine languages still retain clause-types in which *ang*-marking does not take place and in which nominals expose their basic case forms. One of them is the nominalized clause marked by the prefix *pag-* or *pagka-* attached to the verb stem. This nominalized clause is often used as a subordinate clause with the meaning of ‘when...’ or ‘as...’,... (Shibatani 1988:98–99)

Notice that the *pagka*-clause does not contain a topic form....Thus, under nominalization, the sentence in (9)..., in which both actor and goal expose their basic case forms..... (Shibatani 1988:99)

...Since in Cebuano, Tagalog, and some other languages, the definite or referential common nouns in the goal function are also marked by *sa*, the nature of basic case marking is not quite clear when both actor and goal are referential, for both will be marked [by] *sa* under nominalization. Mergers of case forms like this are quite common among the various Philippine languages; however, different languages show different manners of merger, and by choosing appropriate, i.e., non-merged, forms wisely, one can discern the basic pattern of case forms... (Shibatani 1988:99–100)

...These conclusively show that the basic case marking in Philippine languages is accusative; that is, the actor (subject) of an intransitive clause and the actor (subject) of a transitive clause take the same form to the exclusion of the goal (object) of a transitive clause. This basic case systems of Tagalog, Bikol, and Cebuano...in which the accusative nature of the case system is observed, though some nominal categories only show neutral patterns.... (Shibatani 1988:99–100)

Assuming constructions containing an *ang*-marked “topic” in Cebuano and Tagalog, or its equivalent in other Philippine-type languages to be NON-BASIC, Shibatani suggests that basic case marking of nominals can be found in clauses where *ang*-marking does NOT appear at all. Two types of constructions are assumed to not contain any *ang*-marked phrases (or its equivalent): (i) nominalized construction, and (ii) recent perfective construction. As shown in (57)–(60), none of the phrases in the nominalized construction and the recent perfective construction is marked by the so-called “topic” marker *ang*.

(57) Cebuano (data from Shibatani 1988:99)

- a. nominalization of a dyadic clause:

pagbasa sa bata ug libro
 NOMI.read ACTOR child GOAL book

‘reading of a book by the/a child’

- b. nominalization of monadic actor-topic/actor-focus:

pagdagan sa bata
 NOMI.run ACTOR child

‘running by the/a child’

(58) Tagalog (data from Shibatani 1988:100)

- a. nominalization of monadic actor-topic/actor-focus:

pagkamatay ni Maria
 NOMI.die ACTOR Maria

‘Maria’s dying’

- b. nominalization of a dyadic clause:

pagpatay ni Maria kay Juan
 NOMI.kill ACTOR Maria GOAL Juan

‘Maria’s killing [of] Juan’

(59) Bikol (data from Shibatani 1988:100)

- a. nominalization of monadic actor-topic/actor-focus:

pagkagadan ni Maria
 NOMI.die ACTOR Maria

‘Maria’s dying’

- b. nominalization of a dyadic clause:

paggadan ni Maria ki Juan
 NOMI.kill ACTOR Maria GOAL Juan

‘Maria’s killing [of] Juan’

(60) Tagalog (data from Shibatani 2001)

- a. recent perfective aspect:

kaaalis=pa lamang ni Juan.
 leave=already only ACTOR Juan

‘Juan has just left.’

- b. recent perfective aspect:

kakikita=pa lamang ni Juan kay Maria.
 see=already only ACTOR Juan GOAL Maria

‘Juan has just seen Maria.’

Remember that Shibatani’s claim is based on the assumption that the case marking of the *ang*-marked “topic” in Cebuano (or its equivalent in other Philippine-type languages) is motivated by DISCOURSE or PRAGMATIC factors; hence, it is considered to be NON-BASIC. However, it is important to recognize the fact that the interpretation of elements in sentences is often discourse-determined. The fact that the marking of the *ang*-marked “topic” is discourse-motivated CANNOT be used as a piece of evidence for claiming that it

is NON-BASIC. Instead, if one wants to claim the case-marking of *ang*-marked phrases is non-basic, one needs to provide evidence showing that *ang*-marked phrases are ALWAYS “foregrounding topics,” that is, topics that are used to CHANGE the thread of discourse.⁷³ Thus, if one can provide evidence showing that *ang*-marked phrases are NOT ALWAYS “foregrounding topics,” we can argue against his claim.

In fact, this kind of evidence is found in Shibatani’s (1988) paper. In the later sections of Shibatani’s paper, he provides the following statements that contradict what he said in the earlier sections of the same paper. In the following quotes, he has decided to follow McKaughan’s (1973) idea of treating the non-preposed *ang*-phrase in Tagalog as “subject” (i.e., “the non-foregrounding topic”) and reserving the term “topic” for the preposed noun phrase (i.e., “the foregrounding topic”).

...The occurrences of these preposed topics are quite frequent in both writing and speech, though Schachter and Otnes (1972:485) say that they are found in formal style, and “more common in writing, lectures, sermons, etc., than it is in ordinary conversation.” This type of sentence, called *ay* inversion by Schachter and Otnes, is characterized as involving ‘special emphasis’ on the preposed topic by McKaughan (1973), who also realizes, for different reasons, that a subset of what we have decided to call subjects (i.e. the *ang*-marked nominals) should be called subjects, and that the preposed topics being discussed here should be called topics. While the special emphasis noticed by McKaughan is largely true when a non-‘topic’ is topicalized, as in (59b), other instances, especially when ‘topics’ (e.g., prototypical subjects) are being topicalized, there seems to be no noticeable emphasis on the initial topic.... (Shibatani 1988:132–133)

...While the role of the preposed topic sentences must be ascertained more carefully, our interest here is in characterizing the preposed topic as a topic in distinction to the non-preposed *ang* nominal, which has been determined to be better considered as a subject.... (Shibatani 1988:132–133)

That the non-preposed *ang*-phrase is NOT a “(foregrounding) topic,” as argued by both McKaughan and accepted by Shibatani, provides us with clear evidence that

⁷³ It is important to recognize the difference between two types of discourse topics: (i) a “FOREGROUNDING TOPIC” that is used for CHANGING the thread of discourse, and (ii) a “NON-FOREGROUNDING TOPIC” that is used for MAINTAINING the thread of discourse (Grimes 1975).

constructions containing a non-preposed *ang*-marked phrase DO, in fact, reflect the basic case marking pattern of Philippine-type languages. It is possible, then, to consider “actor focus” constructions or “goal focus” constructions to be basic.

Having discussed the basics of the “fluid voice” analysis, let us turn to an evaluation of such an analysis.

Three major problems are found in the “fluid voice” analysis.

First, Shibatani assumes that one can decide the categorical status of root forms by looking at the correlations between forms and their pragmatic functions in all languages. Assuming that Philippine-type languages are UNIQUE in that they are the only group of languages in the world that do NOT distinguish noun roots from verb roots; therefore, they do not fit into the typological classification of languages. However, as discussed earlier, there is NO one-to-one correspondence between form and function in English as well as in Philippine-type languages. If the fact that no distinction between noun roots and verb roots can be made in Philippine-type languages can be used as a piece of evidence for arguing against the ergative analysis or other analyses, one can also use the same kind of argument for arguing against the accusative analysis of English and other languages.

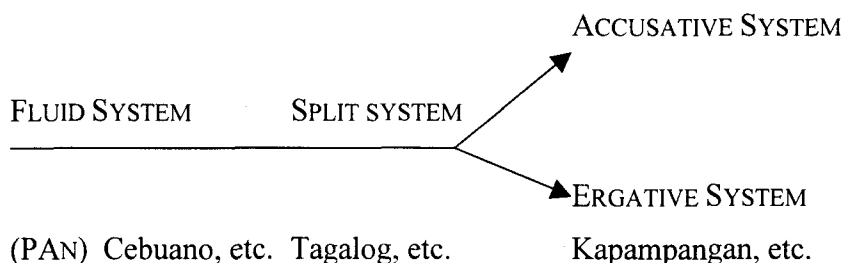
Second, assuming the case marking of the non-preposed *ang*-marked “topic” to be NON-BASIC because it is motivated by DISCOURSE or PRAGMATIC factors, Shibatani suggests that the basic case marking of nominals can be found in clauses where *ang*-marking does NOT appear at all. However, as discussed earlier, it is possible to have the marking of non-preposed *ang*-marked phrases being conditioned by discourse or pragmatic factors, but still occur in “basic” constructions. More specifically, non-

preposed *ang*-marked phrases have the discourse function of MAINTAINING the thread of discourse, rather than of CHANGING the thread of discourse as preposed *ang*-marked phrases do.

Third, Shibatani suggests that we can find the basic case marking of nominals in: (i) nominalized constructions, and (ii) recent perfective constructions. Nominalized constructions themselves are DERIVED, rather than basic, constructions. If we consider that the basic case marking of Philippine-type languages can be found in nominalized constructions, we could also look for the basic case marking of English or other well-established accusative and/or ergative languages in nominalized constructions. We might have to re-examine the case marking systems of all languages of the world.

A further development of Shibatani's idea is found in Katagiri (2002). Katagiri considers that Philippine-type languages form a fluid-split-ergative/accusative continuum: Kapampangan is more ergative than Tagalog; Tagalog is more ergative than Cebuano; PAN has a fluid voice system. As shown in figure 3.1, Kapampangan is analyzed as having an ergative system and Tagalog as having a split system, whereas Proto-Austronesian is analyzed as having a fluid voice system.

FIGURE 3.1. TYPOLOGICAL STATUS OF PHILIPPINE-TYPE LANGUAGES



Katagiri claims that the Philippine-type fluid-split-ergative/accusative continuum is conditioned by the semantic nature of the core NP, specifically, definiteness of the theme NP of a dyadic clause. However, we can easily show that Katagiri's typological classification of Philippine-type languages is not accurate.

First, considering definiteness of theme NPs as the main factor conditioning the fluid-split-ergative/accusative continuum, Katagiri claims that Tagalog has a split ergative system. She considers "actor focus" constructions as having an "accusative" case marking pattern, whereas "goal focus" constructions as having an "ergative" case marking pattern. That is, constructions with INDEFINITE theme NPs exhibit an ACCUSATIVE case marking pattern, whereas constructions with DEFINITE theme NPs exhibit an ERGATIVE case marking pattern. Her analysis of Tagalog is problematic because it goes against the general tendency of split ergativity. According to Dixon (1994:85), if split case marking occurs, it tends to follow the nominal hierarchy. That is, DEFINITE NPs are more likely to exhibit an ACCUSATIVE pattern, whereas INDEFINITE NPs are more likely to exhibit an ERGATIVE pattern. However, Katagiri's claim predicts exactly the opposite result. That is, indefinite NPs go with the accusative, but definite NPs go with the ergative.

Second, it is problematic to claim that PAN was a language with a fluid voice system. The typological status of the daughter languages of PAN is still not clear. How can one reconstruct PAN as a language with a fluid voice system, given the uncertain status of its daughter languages?

Third, the notions of “accusativity” and “ergativity” are related to case marking systems rather than to voice systems. How can languages with an ergative case marking system and languages with a fluid voice system appear on the same continuum? It is a typical case of “comparing apples and oranges.”

3.3.6 The “Modern” Period (4): The “Hybrid” Analysis

The third type of non-ergative analysis to be introduced is the “hybrid” analysis. The “hybrid” analysis is primarily advocated by linguists working within the Principles and Parameters approach (Maclachlan 1996; Campana 2000).⁷⁴

In a hybrid analysis, Philippine-type languages are characterized as NEITHER accusative (languages that choose TRANS Movement for basic sentences) NOR ergative (languages that choose PASS Movement for basic sentences), but rather as languages that are HYBRID (that choose both TRANS and PASS Movements for basic sentences) varieties of these two language types (Maclachlan 1996:1, 21, 80).⁷⁵ One thing to be noted is that the Philippine-type “hybrid” system differs from the Hindi type “split-ergative” system in that the former does not exhibit ergativity in some aspects and accusativity in others (Maclachlan 1996:98). More specifically, the Philippine-type “hybrid” system exhibits a split between the accusative “Actor Topic” construction and the ergative “Patient Topic” construction that is NOT conditioned by any factors (including aspect of clauses).

Maclachlan’s claims are based on the following observations.

⁷⁴ Campana (2000:9) considers Tagalog to have either a “fluid voice” or a “hybrid” system.

⁷⁵ The claims that Maclachlan made are specifically for Tagalog. However, due to structural similarities between Tagalog and other Philippine-type languages, one can easily extend these claims to Philippine-type languages in general.

Recognizing the significance of selecting the MOST BASIC TRANSITIVE sentences in determining the case-marking system of a language, Maclachlan introduces two types of definitions of BASIC sentences in her study of Tagalog ergativity: (i) an operational definition, and (ii) a structural definition.

According to the operational definition (based largely on Dixon's work and Comrie 1978), a BASIC sentence is "an UNMARKED transitive sentence with A (an agent-like participant) and P (a patient-like participant)" (Maclachlan 1996:30). A sentence type is UNMARKED if it has HIGHER TEXT FREQUENCY, if it is ACQUIRED EARLIER, and if it is MORPHOLOGICALLY LESS COMPLEX than other two-participant sentence types. The sentence types which are marked in these respects are non-basic.

Applying the operational definition to Tagalog data, Maclachlan (1996:59) states that "...neither of the two candidate sentence types (AT and PT) in Tagalog is singled out as the MOST BASIC. Rather, both PT and AT sentences are viewed as being basic transitives of the language." Her evidence is as follows.

First, based on McFarland's (1984:236) frequency counting of Tagalog texts, Maclachlan states that the frequency of AT (Agent Topic) and strictly PT (Patient Topic) forms together (84.5%) is higher than the frequency of LT(Location Topic) (*-an*) and BT (Beneficiary Topic) (*i-*) forms together (15.5%).

Second, in terms of the order of acquisition, "NEITHER the PT NOR the AT sentences are acquired as late as non-basic sentences from other languages, rather they are both acquired at a relatively earlier age" (Maclachlan 1996:40).

Third, in terms of morphological complexity of verbal forms, NEITHER the AT form NOR the PT form can be selected as the MOST BASIC verb form. Instead, BOTH AT and PT should be considered EQUALLY BASIC. Considering morphological complexity of verbal forms, Maclachlan (1996:57–58) claims that Tagalog is NEITHER ergative NOR accusative NOR active NOR aspectually split ergative.

Having considered the operational definition, let us now turn to her structural definition of BASIC transitive sentences.

According to the structural definition (the Principles and Parameters approach), a BASIC transitive sentence has to meet the following three conditions: (i) it contains one verb that describes an action involving two participants (A and P), (ii) it contains two overt NPs corresponding to those participants, and (iii) it has NO θ role assignment to a bound morpheme (Maclachlan 1996:31, 78, 89).

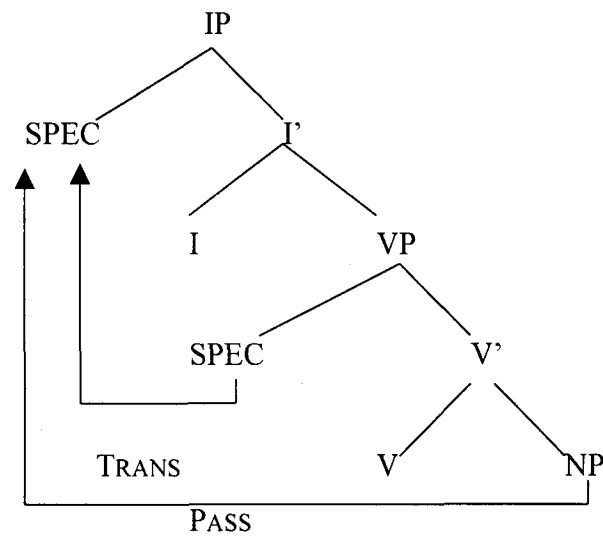
Under Conditions (i) and (ii), the candidacy of ditransitive and causative sentences as basic sentence types is ruled out because they typically involve a third participant. Under Condition (iii), the candidacy of passive and antipassive sentences as basic sentence types is ruled out because the θ role is assumed to be “absorbed” by the passive morpheme in passive sentences.⁷⁶

⁷⁶ Maclachlan (1996:78) states that the structural definition (Condition (iii)) “serves specifically to eliminate passive and antipassive sentences which are very similar structurally to transitive sentences under the assumptions of [the] Principles and Parameters theory”. However, she does not demonstrate how this criterion can eliminate the possibility of having antipassive sentences as basic transitive sentences, although it is assumed that the theory considers the theme theta role of antipassive sentences is “absorbed” by an antipassive morpheme.

Applying the structural definition to Tagalog data, Maclachlan (1996:59) states that two types of basic transitive sentences (i.e., AT and PT) are observed in Tagalog. Like accusative languages, she claims that Tagalog has a basic structure AT that makes use of TRANS Movement, while like ergative languages, the language has a basic structure PT that makes use of PASS Movement. Considering basic transitive sentences in terms of NP movement typology, Tagalog exhibits a “hybrid” system between accusative languages and ergative languages.

Figure 3.2 illustrates the structure for transitive sentences in Tagalog. As shown in the figure, TRANS MOVEMENT is a type of NP movement that involves moving the A argument (base-generated in Spec of VP) to Spec of IP and having the P argument (the NP in COMPL of V) staying *in situ*. PASS MOVEMENT is a type of NP movement that involves moving the P argument (base-generated in COMPL of V) to Spec of IP and having the A argument (the NP in Spec of VP) staying *in situ*.

FIGURE 3.2 STRUCTURE FOR TRANSITIVE SENTENCES (MACLACHLAN 1996:79)



The fact that Tagalog is thought to allow two types of NP movement but accusative and ergative languages allow only one type each is related to the number of non-oblique Cases available in the languages. In accusative languages, such as English, only TRANS MOVEMENT is available because there is no Ergative Case available for case checking. In ergative languages, such as Inuktitut, only PASS MOVEMENT is available because there is no Accusative Case available for case checking or case assignment. In Tagalog (and other Philippine-type languages), both TRANS MOVEMENT and PASS MOVEMENT are available because there are considered to be three different non-Oblique Cases (i.e., Ergative Case, Accusative Case, Nominative-Absolutive Case) available for case checking or case assignment.

A classification of languages according to movement possibilities and Case is presented in table 3.5 (Maclachlan 1996:79–81, 87, 96, 105). As shown in the table, Tagalog is considered to make use of not only Nominative-Absolutive Case checking and Ergative Case checking, but also extensive use of inherent accusative Case assignment. As a result, it is analyzed as having both a [NOM ACC] basic transitive sentence type, like accusative languages, and an [ERG ABS] basic transitive sentence type, like ergative languages.

TABLE 3.5. TYPOLOGY BASED ON MOVEMENT POSSIBILITIES AND CASE

Language Type	Example Language	Movement in Basic sentences	Movement in non-basic sentences	Case Available		
				NABS	ERG	ACC
ACCUSATIVE	English	TRANS only	PASSD=yes TRANSD=some	yes	no	yes
ERGATIVE	Inuktitut; West Greenlandic Inuit	PASS only	TRANSD=yes PASSD=some	yes	yes	no
HYBRID	Tagalog	TRANS or PASS	PASSD=no TRANSD=no	yes	yes	yes

Summarizing the results from applying the operational definition and the structural definition to Tagalog, Maclachlan (1996:59) claims that "...NEITHER of the two candidate sentence types (AT and PT) in Tagalog is singled out as the MOST BASIC. Rather, BOTH PT (PASS) and AT (TRANS) sentences are viewed as being BASIC TRANSITIVES of the language." The "hybrid" nature of Philippine-type languages is claimed to be neatly captured structurally within the Principles and Parameter approach using VP internal subjects.⁷⁷

Having discussed the basics of the "hybrid" analysis, let me turn to an evaluation of this analysis.

A number of problems are found in the "hybrid" analysis. These problems are more or less related to the fact that Maclachlan does NOT apply the operational and structural definitions objectively. Assuming AT and PT to be basic sentences in Tagalog, Maclachlan specifically compares AT and PT sentences with LT, BT and IT sentences when applying the operational and structural definitions of basic transitive sentences. No

⁷⁷ The VP internal subject hypothesis assumes that subject is base-generated in the Specifier (Spec) position of Verb Phrases.

matter what kind of data or evidence that she looks at, she always rejects the idea that PT is more basic (or less marked) than AT and always concludes that PT and AT sentences are equally basic.

First, when looking at the text frequency data, Maclachlan compares the relative frequency of various VERBAL AFFIXES in Tagalog with that of active and passive CONSTRUCTIONS in English. Because the difference of relative frequency between non-AT forms and AT forms in Tagalog is NOT as great as the difference between English active-passive frequencies, she considers that NEITHER AT NOR PT constructions is NON-BASIC. Instead, BOTH AT and PT constructions are considered to be BASIC because the total occurrence of AT and PT affixes together is much higher than the total occurrence of LT and BT affixes together.

Now consider the relative frequencies of the AT and PT forms in Tagalog....

....A more extensive study with a more detailed breakdown of frequency data is provided in McFarland (1984). He did a frequency count on 5000 sentences from quotations in texts from Tagalog short story magazines. He reports the frequency of Tagalog affixes in numbers. From these raw numbers, he extracts the verbal uses of the affixes. For example, while the affix *ma-* is extremely frequent, occurring 1300 times in the 5000 sentences, it is an affix that is used on adjectives as well as on verbs. The use of *ma-* as a verbal affix occurs only 381 times in the corpus. The numbers of occurrences in verbal uses (where adjectival and nominal uses have been excluded) from McFarland (1984:236) are listed in the table in (8). The figures he provides are grouped for the purposes here, like the facts above, in term of AT versus non-AT. (Maclachlan 1996:35–36)

Table (8). AT versus non-AT Frequencies

Tagalog Verbal Affix Frequency in 5000 sentences [based on McFarland 1984:236]		
AT	-um-, Ø	645
	mag-, nag-	452
	maka-, naka-	247
Total AT		1344
PT	-in, Ø	842
	ma-, na-	818
PT, LT	-an	306
PT, BT	i-	246
Total non-AT		2212

As the totals for each group indicate, the AT forms of verbal affixes occur less frequently (1344 times or in 38% of the total) than the non-AT forms (2212 times or in 62% of the total). Once again, however, the discrepancy is not on the same scale as English active-passive frequencies. The significance of these figures is that according to the operational definition, neither AT nor PT sentences should be considered non-basic.

Further, it is interesting to note from table (8) that the frequency of AT and strictly PT forms together (84.5%) as compared with that of the *-an* forms which would include some PT sentences and some LT sentences (together 8.5%) and *i-* forms which would appear in PT and BT sentences (together 7%). There is a distinctly higher frequency for AT and PT affixes taken together than for LT or BT affixes. This suggests that the LT and BT sentence types are indeed non-basic according to the operational definition with respect to text frequency, just as English passives are non-basic in this sense. (Maclachlan 1996:36–37)

Carefully examining the text frequency data that Maclachlan presented, we find that the conclusion that she reached is problematic in that she does NOT consider the genre of texts. As already discussed in section 2.4.1.2, the relative frequency of various construction types differs depending on the genre. When implementing the text frequency test, it is necessary to consider genre as a factor that might affect the result.

Moreover, Maclachlan does NOT consider the possibility that the difference of the relative frequency between active transitive and passive constructions might be different from that of active transitive and antipassive constructions. Tsunoda (1994) observes that the active transitive construction occurs much more frequently than the passive and the antipassive construction; however, the difference of the relative frequency between active transitive and antipassive constructions is NOT as great as the difference between active transitive and passive constructions (see section 2.4.1.2 for details). The fact that the difference of relative frequency of non-AT and AT is NOT as great as that of English active transitive and passive constructions might be attributed to the difference between active transitive and antipassive constructions (rather than that AT and PT are both basic).

Second, when looking at Tagalog acquisition studies, Maclachlan ignores that fact that children DO show earlier acquisition of PT sentences than AT sentences in the studies conducted by Segalowitz and Galang (1978), Galang (1982), and Bautista (1983) (though not in De Guzman 1992).⁷⁸ Instead, she concludes that the acquisition of PT and AT sentence types in Tagalog is NOT as different as the acquisition of English passive versus active, or even of passive versus active in languages where passives are acquired at a much earlier stage than those in English, thus supporting her claim of a hybrid analysis.

Examining the evidence that Maclachlan provided, we find that she makes an UNEQUAL comparison between Tagalog PT and AT versus English and Inuktitut active and passive.⁷⁹ The difference between PT and AT in an ergative analysis is commonly described as the difference between active transitive and antipassive, rather than between passive and active transitive, respectively. The fact that the acquisition of PT and AT sentences is NOT as different as that of active and passive might be attributed to the difference between active transitive and antipassive (rather than that AT and PT are both basic).

⁷⁸ Maclachlan (1996:38–39) states: “DeGuzman (1992) looks specifically at the acquisition by 3-to-8 year-olds of verbs of the *maka-* class, such as verbs like *kita* ‘see’. She observes, contrary to the above findings which concentrated on the *-um-* and *mag-* classes, that the AT forms are produced and comprehended earlier than PT forms. These observations suggest that PT sentences are not the most basic. She notes that her findings may be taken as a challenge to an ergative view but also offers some alternative explanations for the findings.” DeGuzman’s study seems to support the idea that AT is basic. However, the result of her study might be affected by the way that the questions were set up and also the inputs from parents.

⁷⁹ Inuktitut, like most other Eskimo languages, has both passive and antipassive constructions. Passive constructions are commonly found in accusative languages but less commonly found in ergative languages, whereas antipassive constructions have been claimed to have been found in “syntactically ergative” languages only (Palmer 1994:197; Manning 1996:73). It seems to be me that Maclachlan should have compared the acquisition of Tagalog PT and AT with that of active and antipassive constructions in Inuktitut.

....Turning to Tagalog, under TagA [Tagalog as an accusative language], AT sentences would be expected to be acquired earlier than PT sentences. Under TagE [Tagalog as an ergative language] assumptions, the opposite would be expected to be true. In fact, the acquisition of the two sentence types in Tagalog is not as different as the acquisition of English passive versus active, or even of passive versus active in languages where passives are acquired at a much earlier stage than those in English. This again points to a hybrid view as viable. (Maclachlan 1996:37–38)

Available studies on Tagalog point to the fact that the acquisition of PT sentences seems to precede that of AT sentences. According to the study conducted by Segalowitz and Galang (1976) [1978], children aged 3, 5, and 7 exhibit better comprehension of PT than of AT sentences. Similarly, the children are reported to have better mastery of PT sentences in a production task. Galang (1982) studying children aged 3 to 8 years, reports that comprehension of PT forms was better than that of AT forms until the later age groups. However, children did show some comprehension of AT sentences even at the earliest stage studied. Once again, in this study, the comprehension results were mirrored in production. The children in the youngest age group were producing AT forms, but they were producing more PT forms. Galang (1982:13) notes that in spontaneous speech, children sometimes produced PT verbs when AT was appropriate. It is also noted that the verbal morphology is just emerging at this stage in development. Galang (1982:12) points out that some of the 3-year-old children “consistently used uninflected forms in all cases where verbs were required.” These two sets of findings suggest that the PT sentences are more basic. The Segalowitz and Galang (1976) [1978] observations mentioned by Cena (1977) who is in turn cited in Payne (1982) as supporting the ergative analysis of Tagalog. (Maclachlan 1996:38)

...Thus the core facts from a range of sentence types do not clearly support one or other view. In addition, the relative nature of the comparison is worth taking into consideration again. The acquisition figures, like those of frequency in adult speech discussed in the last section, are not in line with figures reported for other languages....Allen (1994) does provide data of another kind that can be compared more readily with the Tagalog data that is reported. Namely, according to Allen (1994:66) the frequency of passive per verbal clause in her study is between 2.1 and 3 percent in naturalistic speech. In Tagalog on the other hand, the frequencies of the AT sentences and the PT sentences in child speech are not in this range. Bautista (1983) finds that in a production task in which children were asked to describe the action in pictures presented to them. Tagalog children produced a high percentage of both AT and PT sentences. The figures provided by Bautista (1983:40–41) are as follows: in 1105 utterances produced by 107 children, 23% were AT and 55% were PT sentences. Note that the percentages reported in Tagalog are based on all utterances not just verbal utterances whereas those reported for Inuktitut were only verbal. This had the effect of biasing the figures to favor even lower percentages for Tagalog, therefore the Tagalog figures are strikingly high in comparison with the Inuktitut figures. In other words, the Tagalog AT and PT frequencies in child speech are much greater than those of passives in Inuktitut. To restate the argument, even though passives are relatively frequent in Inuktitut as compared to English, they were produced at a much lower rate than AT and PT sentences in Tagalog. This suggests that neither the PT nor the AT sentences are acquired as late as non-basic sentences from other languages, rather they are both acquired at a relatively early age. (Maclachlan 1996:39–40)

It is interesting to note that, although there is very little data available, the non-AT, non-PT sentences do seem to be acquired later in Tagalog. Thus Galang (1982:8) reports that the comprehension of LT sentences, in which a location is NABS [Nominative-Absolutive], is worse than either the AT or the PT sentences in her study. DeGuzman (1992) provides some further support for this from her study of psychological verbs. She found children’s comprehension and production of sentences where NPs other than the A or P are NABS (such as an instrument used for seeing with the verb *kita* ‘see’) to be worse than sentences where either A or P are NABS (for the verb *kita* ‘see’ the seer is the A and the seen thing is the P, for example). (Maclachlan 1996:40)

Third, as already discussed in section 2.4.1.1, morphological complexity is not a reliable test for determining “basic” or “unmarked” structure in a given language. The fact that AT is morphologically unmarked in the Incomplete aspect (but marked in all other aspects) and PT is morphologically unmarked in the Started aspect (but marked in all other aspects) cannot be considered as evidence for claiming that both AT and PT constructions are more basic than LT, BT, and IT constructions.

...Whether or not morphological complexity should be taken to be significant, the issue is examined here because some authors have ascribed significance to the unmarked forms in the aspectual paradigms, and therefore these unmarked forms constitute a reason for the continuing controversy over the status of Tagalog as ergative or accusative. The unmarked verbal forms can be taken to argue for either an accusative or an ergative analysis, depending on which aspectual paradigm is considered. As will be demonstrated, if only the Incomplete aspectual paradigm is examined, the language appears to be accusative. If only the Started aspectual paradigm is examined, the language displays ergative characteristics.... (Maclachlan 1996:43)

...First, note that the verbs are all morphologically complex in both their AT and PT forms when there is no aspectual morphology on the verb...

Since there are no morphologically unmarked forms when the verbs are aspectless, neither AT nor PT is picked out as basic according to the morphological complexity criterion of definition (2); there is no least complex form among the forms in the paradigm given in (10).

Next, consider whether the topic marker appears in forms that do bear aspectual morphology. In the Incomplete aspect, indicated with CV reduplication, the *-um-* verbs are unmarked in AT, but marked in PT.... (Maclachlan 1996:44)

...In the Started aspect, indicated with *n-*, the PT is less morphologically complex than AT....That PT is less morphologically complex, as it is in this paradigm, suggests that PT is basic. This in turn would point to an ergative analysis of Tagalog.... (Maclachlan 1996:45)

Considering that some of the unmarked forms are PT (*binasa, dinala*) while other unmarked forms are AT (*babasa*), it is not the case that AT is less morphologically complex than PT or vice versa. Thus we can conclude that neither AT nor PT is more or less morphologically complex than the other, and therefore that neither is the ideal candidate for being chosen as the most basic sentence type on morphological grounds. It is not the case that the unmarked forms occur in just one of the aspectual paradigms, or only in AT, or only in PT, or only in one verb class. In fact, what is striking about the paradigms is that there are very few unmarked forms at all....Additionally, there are no aspectless verbs that are unmarked. One remarkable thing about Tagalog is that its verbal morphology is rich; there is no verb class or paradigm that stands out as morphologically simple throughout when several paradigms are considered. Using the criterion of morphological complexity of the verb as a determiner of markedness, then, neither AT nor PT can be selected as the most basic verb form. (Maclachlan 1996:46–47)

If indeed morphological complexity is to be taken as evidence, it can be noted further that there are not other candidates that present themselves as less morphologically marked than these AT and PT forms. Interestingly, other topic forms of verbs which are used in non-basic sentences, such as LT, BT and IT, are marked throughout their paradigms.... (Maclachlan 1996:47)

Fourth, the structural definition adopted by Maclachlan is also problematic. Recall the three conditions for basic sentences in a structural sense: (i) it contains one verb which describes an action involving two participants (A and P), (ii) it contains two overt NPs corresponding to those participants, and (iii) it has NO θ role assignment to a bound morpheme. Strictly speaking, the structural definition adopted by Maclachlan is not structural at all. The first two conditions are based on semantics. The number of participants that appear in a clause is based on the semantic requirements of the verb, but the participants that appear may or may not be structural arguments of the clause. The third condition is a theory-internal criterion. It works for distinguishing active transitive from passive constructions in English, but it does not work for distinguishing active transitive from antipassive constructions in ergative Polynesian languages.

In ergative Polynesian languages, the verb form of an active transitive construction is morphologically more complex than the verb form of an antipassive construction. Applying Maclachlan's structural definition to these languages, one would have to consider the active transitive construction to be "marked" or "non-basic" and the antipassive construction to be "unmarked" or "basic" in that it is the active transitive (rather than the antipassive) construction that contains a bound morpheme that could "absorb" a θ role.

Fifth, AT and PT are NOT structurally equal, whereas PT, LT, BT and IT are all structurally the same. AT takes a nominative/absolutive-marked agent phrase and a genitive-marked patient phrase, whereas PT, LT, BT and IT all take a genitive/ergative-marked agent, and a nominative/absolutive-marked non-agentive phrase. Separating PT

from LT, BT, and IT and putting it together with the structurally quite different AT pattern is problematic, in that it produces a set of meaningless statistics.

Sixth, Maclachlan's characterization of the Philippine-type "hybrid" system creates a typologically unique class of languages that exhibit a split case marking system that is NOT motivated by any factors at all. However, if we examine the structures carefully, we find that the difference between AT and PT case-marking does NOT reflect a case-marking split between TWO TRANSITIVE patterns. Instead, it reflects the fact that AT is semantically less transitive and syntactically intransitive, whereas PT is semantically more transitive and syntactically transitive.

3.3.7 The "Modern" Period (5): The "Symmetrical Voice" Analysis

The fourth type of non-ergative analysis to be introduced is the "symmetrical voice" analysis. The "symmetrical voice" analysis is primarily advocated by linguists in Australia (Foley 1998; Donohue 1996).

Rejecting the passive analysis, the ergative analysis, and the active analysis, Foley (1998) claims that Philippine-type languages are typologically unique in that they exhibit a so-called "symmetrical voice" system. A "symmetrical voice" system is claimed to be found in Philippine-type languages and some of the Amerindian languages of the Northwest Coast of North America (e.g., Kwakwala), but NOT in accusative languages

(such as English) or ergative languages (such as Dyirbal).⁸⁰ Accusative and ergative languages are assumed to exhibit an “asymmetrical voice” system.

A “SYMMETRICAL VOICE” system is assumed to be radically different from an “ASYMMETRICAL VOICE” system in that the latter has one single NP type (in terms of macro roles (i.e., actor and undergoer) or thematic roles) that is selectively preferred for PIVOT choice over all others,⁸¹ but the former does NOT. In a “symmetrical voice” system, no matter which NP type (actor or undergoer) is chosen to be the pivot, the verb is always assumed to carry some overt “voice morpheme” (e.g., Tagalog *-um-*, *-in-*, *-an-*, *i-*, etc.). By contrast, in an “asymmetrical voice” system, when the preferred NP type (i.e., actor in accusative languages or undergoer in ergative languages) is selected as the pivot,⁸² the clause type would be in its BASIC form (with the verb being MORPHOLOGICALLY UNMARKED for voice). However, if the non-preferred NP type (i.e., undergoer in accusative languages or actor in ergative languages) is selected as the pivot,

⁸⁰ Foley (1998) and Donohue (1996) seem to differ in their classification of languages into “symmetrical” (languages with a “symmetrical voice” system) and “asymmetrical” (languages with an “asymmetrical voice” system) groups. Bantu languages, known for their productivity of applicative constructions, are considered to be “symmetrical” in Donohue’s classification. However, they seem to belong to the “asymmetrical” group in Foley’s analysis because they do not seem to exhibit precategoryality of noun/verb roots, one of the defining features of “symmetrical” languages.

⁸¹ The term “pivot,” first used by Dixon (1979), refers to “the NP which is GRAMMATICALLY MOST CENTRAL in a syntactic structure, typically exhibiting such properties as the ability to coordinate, to control anaphora or deletion and to be realized as a null element in control structures. In the majority of languages, the pivot is simply the grammatical subject, but in some languages, particularly those exhibiting syntactic ergativity, the pivot is typically the patient NP in a transitive clause, and some analysts prefer the non-committal descriptive term ‘pivot’ to avoid controversy about the proper use of the term ‘subject’ in such languages.”

⁸² Foley and Van Valin (1984:29) state that “[actor is] the argument of a predicate which expresses the participant which performs, effects, instigates, or controls the situation denoted by the predicate, and the undergoer [is] the argument which expresses the participant which does not perform, initiate, or control any situation but rather is affected by it in some way....the actor is not equivalent to syntactic subject, nor is undergoer equivalent to syntactic direct object. These non-equivalences are reinforced when we look at single-argument predicates, some of which have actors and some of which have undergoers as their single argument, an argument which is always syntactically the subject.”

the clause type would be in its MARKED form (with the verb being MORPHOLOGICALLY MARKED for the passive voice or the antipassive voice).

The difference between a “symmetrical voice” system and an “asymmetrical voice” system is assumed to be related to the property PRECATEGORIALITY, that is, lack of clear distinction between noun and verb roots. Foley (1998) assumes that roots are basically PRECATEGORICAL (i.e., neither noun or verb) in Philippine-type languages and other languages that exhibit a “symmetrical voice” system, but are CATEGORICAL in accusative and ergative languages that exhibit an “asymmetrical voice” system. Because “roots” (such as *bigay* ‘give’, *halo* ‘stir’, *bili* ‘buy’, etc.) are assumed to be PRECATEGORICAL in Philippine-type languages, they are assumed to NOT entail argument structure at all. Argument structure is assumed to be introduced when roots are derived with “voice markers”. More specifically, the emergence of argument structure and the choice of a pivot are assumed to occur simultaneously. This is assumed to be the reason why verbs in Philippine-type languages are NEVER unmarked for voice and also the reason why “semantically very marginal NPs” (such as location, instrument, etc.) can function as pivot.

Furthermore, a “symmetrical voice” system is also assumed to exhibit one more feature that is NOT found in an “asymmetrical voice” system. That is, actor and undergoer participants can appear as core NPs when they are NOT chosen as the pivot of a sentence. More specifically, all non-monadic clause types (dyadic *-um-* clauses, *-in* clauses, *-an* clauses, and *i-* clauses) in Tagalog and other Philippine-type languages are assumed to be TRANSITIVE in Foley’s analysis. This is assumed to be very different from

the “asymmetrical voice” system found in English and Dyirbal. In English, when the actor participant does NOT function as a pivot (as in a passive construction), it does NOT appear as a CORE NP. In Dyirbal, when the undergoer does NOT function as a pivot (as in an antipassive construction), it does NOT appear as a CORE NP.

Having discussed the basics of the “symmetrical voice” analysis, let us turn to an evaluation of such an analysis.

Three major problems are found in the “symmetrical voice” analysis.

First, like Shibatani, Foley also assumes that the categorical status of root forms can be determined by looking at the correlations between forms and their pragmatic functions in all languages. By assuming that Philippine-type languages (as well as the Amerindian languages of the Northwest Coast of North America) are UNIQUE in that they do NOT distinguish noun roots from verb roots, they do not, therefore, fit into the general typological classification of languages. However, as already discussed in section 3.3.5, there is NO one-to-one correspondence between form and function in English as well as in Philippine-type languages. If the fact that no distinction between noun roots and verb roots can be made in Philippine-type languages can be used as a piece of evidence for arguing for the “symmetrical voice” analysis, one can also use the same kind of argument for arguing for the existence of a “symmetrical voice” system in English and other languages.

Second, Foley assumes that the basic clause type (or the basic voice) in all languages always contains a verb that is morphologically unmarked (for voice). The fact that verbs in all construction types are morphologically marked in Philippine-type languages is

considered to be a piece of evidence for arguing for the “symmetrical voice” analysis. However, as already discussed in Chapter 2, section 2.4.1.1, the morphological complexity of verb forms is NOT a reliable test for determining the basic clause type in languages. For example, in ergative Polynesian languages (such as Samoan), the canonical transitive clause type (or the basic voice type) is morphologically marked, whereas the antipassive clause (or the non-basic voice) is morphologically unmarked. If morphological complexity can be used as a piece of evidence for arguing for the “symmetrical voice” analysis of Philippine-type languages, one might want to reconsider the typological status of ergative Polynesian languages.

Third, Foley notices that when actor or undergoer participants are NOT chosen as the pivot of a sentence, they behave more like a CORE ARGUMENT rather than an adjunct. This in turn has led him to analyze all non-monadic clause types (dyadic *-um-* clauses, *-in* clauses, *-an* clauses, and *i-* clauses) to be TRANSITIVE (that is, there is no passive or antipassive) in Philippine-type languages. He uses this as a piece of evidence for arguing against the passive analysis and the ergative analysis.

However, as already discussed in 3.3.3, although both passivization and antipassivization are detransitivization processes, passivization is generally agreed to be a valency-decreasing process, but antipassivization is not. As Nichols (1982), Tsunoda (1988), and B. Blake (1993) point out, antipassivization is a detransitivization operation, but is NOT NECESSARILY a VALENCY-DECREASING operation. For example, Nichols (1982) observes that antipassivization in Ingush (Caucasus) does NOT reduce valency. Tsunoda (1988) reports that antipassivization is NOT a valency-decreasing process in

Warrungu (an Australian language). The fact that non-pivot actor or undergoer participants are not adjuncts does not tell us that there is no antipassive construction in Philippine-type languages. Instead, it might simply tell us that antipassivization in Philippine-type languages, like Ingush and Warrungu, is a detransitivization but NOT a VALENCY-DECREASING operation.

3.4 SUMMARY

In this chapter, I have discussed seven types of analyses of Philippine-type languages: passive, focus, ergative, active voice, fluid voice, hybrid, and symmetrical voice. As already shown in section 3.3, these analyses are of diverse nature. What underlies these diverse analyses of Philippine-type languages is the complexity of their verbal morphology and clause structures. The complex nature of their verbal morphology and clause structures leads some linguists to consider these languages to be typologically unique. However, a careful comparison of clause structures in Philippine-type languages with those of other languages of the world suggests that Philippine-type languages are NOT unusual at all and they fit into the general discussion of actancy structures of world's languages.

CHAPTER 4

TRANSITIVITY AND ERGATIVITY IN KAVALAN*

4.1 INTRODUCTION

Kavalan is an Austronesian language spoken by fewer than one hundred speakers in Hsinshe (Hualien Prefecture) and Changyuan (Taitung Prefecture), Taiwan. It has been classified as a member of the Paiwanic group (Ferrell 1969; Li 1985), the Southern Formosan group (Li 1990), and most recently of the Northern Branch of the East Formosan primary subgroup of the Austronesian language family (Blust 1999a).

Like many Austronesian languages, Kavalan has commonly been analyzed as having two distinct types of transitive constructions and an unconditional split-ergative system, something that is typologically unusual. This chapter reviews previous analyses of Kavalan clause structure from a broad typological perspective and determines the canonical transitive construction and actancy structure of Kavalan based on morphosyntactic and semantic criteria. Three major questions will be answered here. First, is the Kavalan form *tu* an accusative marker? Second, what constitutes the canonical transitive construction in Kavalan? Third, what kind of actancy structure does Kavalan have (accusative, ergative, or split ergative)? In order to answer these questions, some basic linguistic facts about Kavalan will be provided.

This chapter is organized as follows. Section 4.2 discusses word order in Kavalan. Section 4.3 deals with the case marking system and the agreement system in Kavalan.

* A part of this chapter has previously appeared in H. C. Liao (2002).

Section 4.4 discusses transitivity in Kavalan clause structures. Section 4.5 argues that Kavalan is best analyzed as having a pure ergative actancy structure. Section 4.6 discusses syntactic processes that support an ergative analysis of the Kavalan actancy system. Section 4.7 concludes the discussion in this chapter.

4.2 WORD ORDER

In this section, I discuss word order in Kavalan. The discussion of word order is divided into five parts: (1) the order of full noun phrases, (2) the order of pronouns and agreement forms, (3) the order of elements in possessive constructions, (4) word order in topicalized sentences, and (5) summary.

4.2.1 The Order of Full Noun Phrases

In this section, the relative order between predicates and full noun phrases is discussed. The relative order between predicates and pronouns will be discussed in section 4.2.2.

Kavalan is a right-branching, predicate-initial language. In Kavalan, predicates can be either verbal or nonverbal. In a nonverbal clause, a nonverbal predicate occurs in the clause-initial position. As shown in (1), in a nominal clause, a predicate nominal occurs clause initially and is followed by a nominative-marked full NP.

(1) nominal clause: NP (Predicate) NP (Nominative)

zata ya rawraw ya yau.
 IPI NOM country/island LIG that/those

‘That island is ours (in.).’ (Kav.4-024)¹

In a pragmatically unmarked verbal clause, the (main) verbal predicate precedes ALL other elements (e.g., noun phrases, dependent verbs, adverbs, conjunctions, etc.). Verbal clauses can be monadic (i.e., a verb that expects only one argument) or dyadic (i.e., a verb that expects two arguments).² Dyadic clauses can be further divided into two subtypes: dyadic *-um-/(-)m-* clauses and dyadic *-an* clauses. Dyadic *-um-/(-)m-* clauses are clauses whose verbal predicates have the morphological shape *-um-/(-)m-*. Dyadic *-an* clauses are clauses whose verbal predicates have the morphological shape *-an*.

In a monadic intransitive clause, a verb occurs clause initially and is followed by a nominative-marked NP, which in turn can be followed by an optional locative-marked NP and/or adverb, as in (2)–(4). When noun phrases are case-marked, the locative-marked NP can occur either before the nominative-marked NP, as in (5), or after it, as in (4). However, when noun phrases are NOT case-marked, the locative-marked NP can only occur AFTER the nominative-marked NP.

¹ The Kavalan dialect under study is the PatuRunan dialect (spoken in Hsinshe, Hualien Prefecture). Unless otherwise indicated, all Kavalan data used in this study are taken from the twelve texts in Li (1996a) and were originally glossed and translated in Chinese. All the English glosses and translations are mine. The example reference numbers following the free translation are organized according to the order that they appeared in Li’s monograph. For example, Kav.6-022 means that the example is the 22nd sentence of Kavalan Text 6. I would like to thank Laurie Reid for going through all twelve Kavalan texts with me and helping me determine the syntactic functions and/or discourse functions of the forms in the Kavalan texts.

² Strictly speaking, verbal clauses can also be triadic (i.e., a verb that expects three arguments). To simplify the discussion, I use the terms “dyadic *-um-/(-)m-* clauses” for both dyadic and triadic *-um-/(-)m-* clauses and “dyadic *-an* clauses” for both dyadic and triadic *-an* clauses.

- (2) monadic intransitive clause: **V NP (Nom)**

*m*ati=ti a kabaran.
go=PRF NOM Kavalan

‘The Kavalan people went.’ (Kav.8-002)

- (3) monadic intransitive existential clause: **V NP(Nom) Adv**

yau a atuR na hetay tayan.
EXIST NOM military.camp GEN soldier there

‘There was a military camp of the soldiers there.’ (Kav.4-077)

- (4) monadic intransitive clause: **V NP (Nom) NP (Lcv)**

*m*awtu=ti a paqapaRan ta taiwan.
come=PRF NOM catcher LCV Taiwan

‘The catcher came to Taiwan.’ (Kav.5-007)

- (5) monadic intransitive clause: **V NP (Lcv) NP (Nom)**

*t*manan=ti ta lamuan ya tabarung.
return=PRF LCV village NOM Tabarung

‘The (surviving) Tabarung people returned to the [their] village.’ (Kav.10-014)

In a dyadic *-um-/(-)m-* clause, a verb occurs clause initially and is followed first by a nominative-marked agent NP and then by a *tu*-marked theme NP, and optionally followed by a locative-marked NP, as in (6).

- (6) dyadic *-m-* clause: **V NP (Nom) tu N NP (Lcv)**

*t*mayta ya taRirebeng kubarán tu bawbi ta naungan.
see NOM below/plains Kavalan TU garden LCV mountain

‘A Kavalan person who lived in the plains saw a garden on the mountain.’
(Kav.3-038)

In a dyadic *-an* clause, usually a verb occurs clause initially and is followed first by a genitive-marked agent NP and then by a nominative-marked theme NP, as in (7). Such a word order is preferred for a dyadic *-an* clause because it can avoid ambiguous

interpretations. If the genitive-marked NP occurs AFTER the nominative-marked NP in dyadic *-an* clauses, the sentence can be ambiguous in terms of its interpretation. For example, if the genitive-marked NP occurs AFTER the nominative-marked NP in (7), then the sentence can be interpreted as either ‘The soldiers closed the city (gate).’ or ‘The soldiers’ city closed.’

(7) dyadic *-an* clause: V NP (Gen) NP (Nom)

inebana=ti na hetay a rawang.
close.23S/P=PRF GEN soldier NOM city
(*inebana* < *ineb* + *-an* + *-na*)

‘The soldiers closed the city (gate).’ (Kav.7-033)

However, Li (1996a:80) reports the existence of sentences like (8), in which the nominative-marked theme NP precedes the genitive-marked agent NP. The word order in (8) is permissible because there is NO ambiguity involved in the sentence. In this example, the nominative-marked noun is immediately followed by its possessor *ku* ‘GEN.1S’, so the genitive-marked phrase *na tama=su* ‘GEN.2S’ CANNOT be interpreted as the possessor of *sunis* ‘child’.

(8) dyadic *-an* clause: V NP (Nom) NP (Gen)

pukunana ya sunis=ku na tama=su.
beat.23S/P NOM child=GEN.1S GEN father=GEN.2S
(*pukunana* < *pukun* + *-an* + *-na*)

‘Your (sg.) father beat my child.’ (data from Li 1996a:80)

4.2.2 The Order of Pronouns and Agreement Forms

Having discussed the relative order between predicates and full NPs in section 4.2.1, I turn to the discussion of the relative order between predicates, clitic pronouns, and agreement markers in this section.

In Kavalan, pronouns can be divided into two types: free form pronouns and clitic pronouns. Free form pronouns do NOT behave differently from full noun phrases in terms of word order; therefore, they are not included in the discussion here.

Two types of pronominal-related phonologically bound elements are found in Kavalan: (i) clitic pronouns, and (ii) agreement forms. Clitic pronouns differ from agreement forms in their distribution. First, although clitic pronouns and agreement forms are both phonologically bound to the element preceding them, agreement forms are selective in their choice of host, but clitic pronouns are not. The host that a clitic pronoun attaches to can be a predicate of various sorts (e.g., auxiliary or nonauxiliary; verbal or nonverbal; etc.). For example, the host that a clitic pronoun attaches to can be a negative auxiliary predicate (9), or it can be a nominal predicate (as in (10)–(11)). However, the host that an agreement form attaches to can only be a dyadic *-an* verb (13); it cannot be an auxiliary verb, or a nominal predicate, etc.

- (9) verbal clause: a clitic pronoun cliticizes to a negative auxiliary predicate

mai=*isu* sazmaken si, qawtu=*pa=imi* tazian.
 NEG=NOM.2S agree if come=IRR=NOM.1PE. here

‘If you (sg.) did not agree (to go with us), we (ex.) shall come here.’ (Kav.6-017)

- (10) nominal clause: a clitic pronoun cliticizes to a predicate nominal

tabarung=*imi*.

Tabarung=NOM.1PE

‘We (ex.) are Tabarung.’ (Kav.10-007)

- (11) nominal clause: a clitic pronoun cliticizes to a predicate nominal

niana=*imu*?

what(ever)=NOM.2P

‘Who are you (pl.)?’ (Kav.4-008)

Second, clitic pronouns occur AFTER aspectual adverbial clitics (=pa ‘irrealis’ or =ti ‘perfective’), whereas agreement forms occur BEFORE adverbial clitics. As illustrated in (12) and (13), the clitic pronoun =iku ‘NOM.1S’ follows the irrealis adverbial clitic =pa, while the agreement form -na (which agrees with the third person agent of a dyadic -an clause) precedes the perfective adverbial clitic =ti. Notice that when the agreement form -na is attached to the -an verbs *tupaqan* ‘skin (v)’ and *panukuban* ‘CAUS.cover’, the resulting forms are *tupaqana* and *panukubana*, respectively.

- (12) clitic pronouns occur AFTER aspectual clitics:

sanu=*pa=iku* tu zana masang baqi na kubarán.

tell=IRR=NOM.1S TU POSS.3S/P ancient ancestor GEN Kavalan

‘I shall talk about them, the ancient ancestors of the Kavalan people.’ (Kav.3-001)

- (13) agreement markers occur BEFORE aspectual clitics:

tupaqana=*ti* a rubung na tnguRal, panukubana

skin.?3S/P=PRF NOM skin GEN forehead CAUS.cover.?3S/P

ta mata=*na*.

LCV eye=GEN.3S/P

[*tupaqana* < *tupaq* + *-an* + *-na*]

‘They skinned the skin of the forehead to make it (the skin of the forehead) cover their eyes.’ (Kav.7-044)

4.2.3 The Order of Elements in Possessive Constructions

In this section, I focus my discussion on the order between possessors and possessed nouns in possessive constructions.

In Kavalan, possessive constructions resemble unmarked main clause structures in having the head noun occur before its attribute. In a single possessive construction, the head noun (i.e., the possessed noun) precedes the dependent noun (i.e., the possessor), as in (14) and (15). In a multiple possessive construction, the possessed noun phrase precedes the dependent noun phrases, and each dependent noun phrase can be further divided into a possessed noun followed by a possessor, as in (16).

- (14) single possessive construction: **Det N [na(Gen)-Possessor]**

ya **subali** [**na bayblan**]
 NOM bracelet GEN old.woman

‘the old woman’s bracelet’ (Kav.8-020)

- (15) single possessive construction: **Det N [na(Gen) N Lig Dem]**

nian=ti ya **razat** [**na bawa na yau**]?
 where=PRF NOM person GEN boat LIG that/those

‘Where were the people of that boat?’ (Kav.4-046)

- (16) multiple possessive construction: **Det N [na (Gen) N [na (Gen) N]]**

ya **taqan** [**na repaw** [**na bayblan**]]
 NOM pillar GEN house GEN old.woman

‘the pillar(s) of the old woman’s house’ (Kav.8-021)

4.2.4 Word Order in Topicalized Sentences

Having discussed the word order of elements in unmarked sentence structures and in possessive constructions, I now turn to the discussion of marked sentence structures.

While the basic word order in clauses is predicate-initial, Kavalan has an alternate sentence pattern in which another element, usually a noun phrase, a locational or temporal phrase, precedes the predicate. This element is called a TOPIC. A topic is indicated by its prepredicate position and intervening pause. It can be separated from the rest of a sentence by an optional topic linker *nani* (cf. (17) and (18)). A sentence can contain more than one topic, as in (18).

(17) topicalization with no topic linker:

aimi, *zamana=imi* *na* *bangel*.
 TOP.IPE chase.?3S/P=NOM.IPE GEN typhoon

‘As for us (ex.), we (ex.) were caught by a typhoon.’ (Lit., ‘As for us (ex.), a typhoon caught/chased us (ex.).’) (Kav.4-016)

(18) (multiple) topicalization with the topic linker *nani*:

TuRbuan masang nani *mRibaut tu sauR*.
 TuRbuan ancient TP.LK catch.fish TU flying.fish

‘As for the TuRbuan people, once upon a time, they caught flying fish.’ (Kav.6-001)

4.2.5 Summary

Let me summarize the discussion of Kavalan word order in the previous sections.

First, Kavalan is basically a right-branching, predicate-initial language that observes the following exception. That is, in a noun phrase, a determiner precedes the head noun.³

Second, main predicates (verbal or nonverbal; auxiliary or nonauxiliary) exhibit the

³ Reid (2002b) reconsiders the categorical status of elements that have been commonly referred to as “determiners” in Philippine languages. Based on syntactic distribution, he claims that some, if not all, of these elements are better analyzed as semantically empty “auxiliary nouns” that head the NPs that they are a part of. If the “auxiliary noun” analysis is correct, the branching problem observed in the NP structure disappears. However, at the present time, no comparable data of the sort that Reid uses is available in Kavalan.

following features: (a) they occur clause initially; (b) they attract clitics (aspectual clitics and/or pronominal clitics). Third, Kavalan clitic pronouns and verb agreement markers differ in their distribution: clitic pronouns occur AFTER adverbial clitics (=ti ‘perfective’ and =pa ‘irrealis’), whereas agreement markers occur BEFORE adverbial clitics.⁴

4.3 CONSTRUCTION MARKERS, CASE-MARKING SYSTEM AND AGREEMENT SYSTEM

In this section, I discuss construction markers, the case marking system, and the agreement system in Kavalan. Sections 4.3.1.1 and 4.3.1.2 discuss the forms and functions of two of the three types of construction markers in Kavalan. Section 4.3.1.3 deals with the Kavalan case marking system for full nouns. Section 4.3.2 deals with the Kavalan pronominal and agreement systems.

4.3.1 Construction Markers

Like many western Austronesian languages, three types of construction markers can be identified in Kavalan: (i) topic linker, (ii) ligatures, and (iii) determiners. The first two types of construction markers will be discussed in sections 4.3.1.1 and 4.3.1.2. As for determiners, they will be discussed in section 4.3.1.3.

⁴ An alternative explanation for the relative order between clitic pronouns and aspectual adverbial clitics is phonological rather than syntactic. One can claim that the word order facts observed in Kavalan are motivated by phonological factors in that the clitic pronouns are all more than one syllable in length, while the adverbial clitics are monosyllabic. That is, like Tagalog, monosyllabic adverbial clitics precede disyllabic clitic pronouns in Kavalan (see Schachter 1973 for a detail discussion of word order constraints for Tagalog clitics).

4.3.1.1 Topic linker

The first type of construction marker to be introduced is a topic marker.

A topic linker is an element that links a topicalized NP and the rest of a sentence. In Kavalan, a topic or topics can be linked to the rest of a sentence by the topic linker *nani*, as in (19). However, the presence of the topic linker *nani* is optional rather than obligatory. As already shown in example (17) of section 4.2.4 [repeated below in (20)], a topic can occur without the topic linker *nani*.

(19) topic linker *nani* links the topic to the rest of a sentence:

aiku *nani* yaw=iku ta patuRanganan.
 TOP.1S TP.LK live=NOM.1S LCV Hsinshe.

‘As for me, I live in Hsinshe [patuRanganan].’ (Kav.1-003)

(20) topicalization without any topic linker:

aimi, zamana=imi na bangel.
 TOP.1PE chase.?3S/P=NOM.1PE GEN typhoon

‘As for us (ex.), we (ex.) were caught by a typhoon.’ (Lit., ‘As for us (ex.), a typhoon chased/caught us (ex.).’) (Kav.4-016)

4.3.1.2 Ligatures

The second type of construction marker to be introduced is ligatures.

Like many other western Austronesian languages, Kavalan makes use of a special type of construction marker to link a head (usually a noun or a verb) with its following attribute (e.g., a demonstrative, noun, possessor, or relative clause). This type of construction marker is commonly referred to as a “ligature” or “linker” in the literature on western Austronesian languages. The “ligature” is probably a kind of preposition in

that it typically takes a NP as its exocentric dependent. Moreover, like prepositional phrases, the phrase which it is a part of is usually used to modify a noun or a verb.⁵

In previous analyses of Kavalan syntax, most linguists recognize only one ligature *ya* (and its phonologically determined variants *a* and *wa*) (see Li 1978, 1996a, and 1996b; Y. L. Chang 1997 and 2000a). According to Li (1978: 583), the form *a* occurs after consonants, *wa* occurs after the vowel *u*, and *ya* occurs elsewhere. In general, this seems to be true. However, a thorough study of twelve Kavalan texts reveals that there are two other forms (i.e., *na* and *a ya*) that also function as ligatures. From my study of Kavalan texts, it seems to me that these ligatures (at least *ya* and *na*) can occur in exactly the same phonological and syntactic environment (cf., (21) and (23)). It is not clear what may condition the occurrence of the three ligatures *ya*, *na*, and *a ya*.

(21) ligature *ya* links a head noun with a demonstrative:

zata ya **rawraw** ya **yau**.
 1PI NOM country/island LIG that/those

‘That island is ours (in.).’ (Kav.4-024)

(22) ligature *a* links a head noun with a demonstrative:

nengi=ti ya lelan tmanan=ti ya **paqbawan** a **yau**.
 good=PRF NOM weather left=PRF NOM sailor LIG that/those

‘(When) the weather became/was good, those soldiers returned/left (for home).’
 (Kav.4-014)

⁵ The categorical status of “ligatures” is not uncontroversial. Syntactically, they seem to behave like prepositions. However, the “preposition” analysis of “ligatures” is not without problems. If they were prepositions, they would function as the head of the prepositional phrase in which they appeared and should be obligatorily present in all syntactic environments. However, the fact that they can be optional in some languages and construction types poses a problem to the “preposition” analysis.

(23) ligature *na* links a head noun with a demonstrative:

pasanuannyaq niana ya nangan na rawraw na zau.
 CAUS.tell.?1PE what NOM name GEN island LIG this/these

‘We (ex.) asked what the name of this island was.’ (Kav.4-020)

(24) ligature *a ya* links a head noun with a relative clause:

...qawman *paqnanem=a ya msukaw...*
 also/yet one=LIG LIG bad

‘...Only one (person) who is bad.’ (Kav.7-024)

The presence of ligatures *na* and *a ya* in Kavalan may be of historical-comparative interest because these two forms are also found in Philippine languages. For example, the form *na* is found in Tagalog and the form *a ya* is found in Ivatan.⁶ The present study focuses on the synchronic grammar of Kavalan; therefore, I will not go into detail discussing the forms and distribution of ligatures in other Austronesian languages.

4.3.1.3 Case-marking system for full nouns

The third type of construction marker to be introduced is prenominal elements that are often referred to as “determiners” in the literature.

The so-called “determiners” are typically monosyllabic forms that occur before noun phrases. They are often assumed to mark the grammatical relations or case relations of noun phrases in some languages. In Kavalan, full noun phrases themselves do NOT exhibit formal differences to reflect their grammatical functions; their grammatical

⁶ Reid (1983b, referred to also in Reid 2000a) reconstructs PAN **(n)a* as the ligature....with **a* occurring after consonants (as in Kavalan) and **na* after vowels.

functions are usually manifested by a class of prenominal monosyllabic forms (or sometimes by contrastive word order).⁷

In previous analyses of the Kavalan case-marking system for full nouns, Kavalan is commonly described as having a system similar to the one in table 4.1 (based on Li 1978, 1996a, 1996b; Y. L. Chang 1997, 2000a; A. Lee 1997).

TABLE 4.1. PREVIOUS ANALYSES OF KAVALAN CASE-MARKING SYSTEM

	GENITIVE	NOMINATIVE	ACCUSATIVE/ LOCATIVE/ OBLIQUE	LOCATIVE/ACCUSATIVE/ OBLIQUE/COMITATIVE	LOCATIVE [+DIR]
COMMON	<i>na</i>	<i>ya/a/wa</i>	<i>tu</i>	<i>ta(-...-an)</i>	<i>sa</i>
PERSONAL	<i>ni</i>				

As shown in table 4.1, linguists generally agree with each other in their treatment of these monosyllabic forms except the forms *tu* and *ta(-...-an)*. In sections 4.3.1.3.1–4.3.1.3.5, I will discuss the functions of all case-markers and provide an explanation for the diverse analyses of the forms *tu* and *ta(-...-an)*.

4.3.1.3.1 *na* and *ni*: Genitive determiners or auxiliary nouns??

In Kavalan, genitive case markers have two forms: *na* and *ni*. The occurrence of these two forms is syntactically conditioned: *na* occurs before a common or nonpersonal noun, whereas *ni* occurs before a personal noun. Like other western Austronesian languages, genitive case markers are associated with two functions. First, they mark

⁷ As already discussed in section 4.2.5, it might be possible to analyze some of these forms as semantically empty “auxiliary nouns”. However, evidence for supporting the “auxiliary noun” analysis is currently not available for Kavalan. Therefore, I will refer to these forms as “case markers” until such evidence becomes available.

possessors in possessive constructions, as in (25) and (26). Second, they mark the agent or actor argument of a dyadic *-an* clause, as in (27) and (28).

(25) *na* marks a common possessor:

arana ya subali na bayblan.
take.?3S/P NOM bracelet GEN old.woman

‘They took the old woman’s bracelet.’ (Kav.8-020)

(26) *ni* marks a personal possessor:

mati nani ktuktunana=ti a tneqteq ni abas.
go and.then chop.down.?3S/P=PRF NOM marker GEN Abas

‘He went, and then he chopped down Abas’s marker.’ (Kav.3-020)

(27) *na* marks an (inanimate) agent of a dyadic *-an* clause:

qatziwmay zamana=ti na puthaw.
later.on chase.?3S/P=PRF GEN storm

‘Later on, they were caught by a storm.’ (Lit., ‘Later on, a storm caught/chased them.’) (Kav.6-002)

(28) *na* marks an (animate) agent of a dyadic *-an* clause:

sukayarana=ti na hetay a patayay.
remove.ear.?3S/P=PRF GEN soldier NOM dead.NR

‘The soldiers removed the ears of the dead one(s).’ (Kav.7-018)

Although genitive case markers *na* and *ni* commonly occur before the agent argument of a dyadic *-an* clause, their presence is optional rather than obligatory. When the agent argument immediately follows the verb agreement form *-na* (which is attached to a verb to form a derivationally related verb that agrees with the third person singular/plural actor), the genitive case marker *na* can be left out. As exemplified in (29) and (30), the agent arguments (*bangel* ‘typhoon’ and *zitpun* ‘Japanese’) in these two sentences are

preceded by *-an* verbs that carry the verb agreement form *-na*, and these two arguments are NOT case-marked by *na*.

(29) *-an* clause with an unmarked (inanimate) agent:

qatziwmay zamana **bangel** a bawa na tiungkuk.
later.on chase.3S/P typhoon NOM boat GEN China

‘Later on, a boat of China was caught by a typhoon.’ (Lit., ‘Later on, a typhoon chased/caught a boat of China.’) (Kav.4-005)

(30) *-an* clause with an unmarked (animate) agent:

Sikasuan mrabut=ti a mai pakrikenengana zitpun.
Sikasuan.Amis irritated=PRF COMP NEG CAUS.rest.?3S/P Japanese

‘As for the Sikasuan Amis, they were irritated that the Japanese did not allow them to rest.’ (Kav.11-001)

4.3.1.3.2 *ya*, *a*, and *wa*: Nominative determiners or auxiliary nouns??

Nominative case markers have three forms: *ya*, *a*, and *wa*. The occurrence of these forms is phonologically conditioned. Generally speaking, the form *a* occurs after a consonant, the form *wa* occurs after the back vowel /u/, and the form *ya* occurs elsewhere. However, the forms *a* and *wa* are often replaced by the form *ya*.

Nominative case markers occur in three different clause environments. First, they mark the nonpredicate nominal of a nonverbal clause, as in (31). Second, they mark the sole argument of a monadic intransitive clause, as in (32) and (33). Third, they mark a nonagent argument of a dyadic *-an* clause, as in (34) and (35).

(31) *ya* marks the nonpredicate nominal in a nonverbal clause:

nian=ti ya razat na bawa na yau.
where=PRF NOM person GEN boat LIG that/those

‘Where were the people of that boat?’ (Kav.4-046)

- (32) *ya* marks the sole argument (common noun) of a monadic clause:

Raya *ya* biwan yau.
big NOM temple that

‘That temple was big.’ (Kav.6-011)

- (33) *ya* marks the sole argument (personal noun) of a monadic clause:

tu *mati=ti ya ti abas.*
and.then go=PRF NOM [+PRSN] Abas

‘And then Abas went.’ (Kav.3-024)

- (34) *ya* marks a nonagentive argument (a theme) of a dyadic *-an* clause:

tmuzus ta Huesiutu nani lamulamu bariwana ya
reach LCV Green.Island subsequently CVCV.village sell.2S/P NOM
zemian a yau.
salt LIG that

‘They arrived at Green Island, subsequently, from village to village, they sold that salt.’ (Kav.5-017)

- (35) *ya* marks a nonagentive argument (a location) of a dyadic *-an* clause (imperative mood):

pasayaka si qatiwika ya Taiwan!
prepare.IMP and go.to.IMP NOM Taiwan

‘You shall prepare and go to Taiwan!’ (Kav.4-025)

One thing that is worth noticing is that nominative case markers can mark not only full nouns (both common nouns and personal nouns), but also personal pronouns (at least the free nominative third person plural pronoun), as in (36). This observation seems to be in conflict with Y. L. Chang’s statement that free nominative pronouns cannot occur with the nominative case marker (Y. L. Chang 2000a:88). However, a careful study of Kavalan texts suggests that Y. L. Chang’s statement is true in general. Except for the third person plural nominative pronoun, none of the free nominative pronouns can occur with the nominative case marker, as in (37). The difference between the third person

plural nominative pronoun and other free nominative pronouns may be related to the forms of the pronouns. Except for the third person plural pronoun, all other free nominative pronouns are morphologically complex: they all contain a formative *a-* and another formative (which is usually related to its corresponding bound nominative pronominal form). The formative *a-* may be historically derived from the nominative case marker *a*. Moreover, the third person plural NOMINATIVE pronoun is homophonous with the third person plural OBLIQUE pronoun (see section 4.3.2.1). If *qanyau* is not marked by any case marker, it would be ambiguous as to whether it is a nominative or an oblique pronoun.

(36) *a* marks a free nominative pronoun:

simsanu=ti a qanyau.
 REC.discuss=PRF NOM NOM.3P

‘They discussed with each other.’ (Kav.6-019)

(37) a free nominative pronoun that is NOT marked by a nominative case marker:

snayau si quni aita?
 likeness if how...do NOM.1PI

‘If it is like this, how could we (in.) do (it)?’ (‘If this is the way it is, how could we (in.) do (it)?’) (Kav.6-024)

Like genitive case markers, the presence of nominative case markers is also optional. As exemplified in (38), the nonagent argument *kubu=na* ‘his hat’ of the first clause is not marked by a nominative case marker.

(38) unmarked nonagent argument of a dyadic *-an* clause:

ʔarana *kubu=na* ʔtungana=ti a Raya na hetay.
 take.ʔ3S/P hat=GEN.3S/P kill.ʔ3S/P=PRF NOM big GEN soldier

‘They (the Kavalan) took his (the higher officer’s) hat, (and) they killed the higher officer of the soldiers.’ (Kav.7-008)

4.3.1.3.3 *tu*: Oblique determiner or auxiliary noun??

The syntactic status of the form *tu* is controversial. It has been analyzed as an accusative case marker (Li 1978; A. Lee 1997; Hsin 1996; Y. L. Chang 1997, 2000a; Chang and Lee 2002; and Chang et al. 1998); it has also been analyzed as an oblique case marker (Li 1996a, 1996b). Most Formosanists seem to agree that *tu* is an accusative case marker in Kavalan. However, a careful analysis of Kavalan textual data suggests that *tu* is best analyzed as an oblique case marker, rather than an accusative marker in Kavalan. The misanalysis of *tu* may result from overlooking some important data.

According to A. Lee (1997:19), Hsin (1996:329), Y. L. Chang (1997:29; 2000a:71), and Chang et al. (1998), the form *tu* marks the “Patient” or “direct object” of an AF clause (or a dyadic *m*-clause in my analysis). Because *tu* often marks the “Patient” of a dyadic clause, it is commonly called an accusative case marker. However, there is danger in simply equating the “accusative” NP with the “Patient” or “direct object” of a dyadic clause without considering the transitivity of a clause, in that not all dyadic clauses are transitive. As Gibson and Starosta (1990), Dixon (1994:122–124), and Dixon and Aikhenvald (2000:3) point out, some dyadic clauses in some languages are in fact intransitive (“pseudo-transitive” in Starosta’s terminology, and “extended intransitive” in Dixon’s and Dixon and Aikhenvald’s terminology).

We can illustrate this point with the following pairs of English sentences. As shown in (39) and (40), even though the verb *kicked* in (39) and its homophonous form in (40) are both dyadic and take one agent NP and one theme NP, only the verb in (39) is transitive. Moreover, the theme NP can function as an accusative “direct object” as in (39), or as an oblique as in (40).

(39) dyadic transitive with a “direct object” theme (O)

Harry kicked the ball.
 AGENT THEME
 A Tr. O

(40) dyadic intransitive with an oblique theme (E)

Harry kicked at the ball.
 AGENT THEME
 S Intr. E

In addition, Y. L. Chang (1997, 2000a) observes an interesting fact that may pose a problem for the analyses that treat the *tu*-marked NP as accusative. Y. L. Chang (1997:29; 2000a:73) notice that the *tu*-marked “Patient” or “direct object” is usually indefinite while the *ya*-marked “Patient” or “subject” is usually definite.⁸ The contrast between the *tu*-marked “Patient” or “direct object” and the *ya*-marked “Patient” or “subject” in Kavalan seems to parallel the common characterization of the contrast between the theme in an antipassive construction and the theme in a canonical transitive construction (see Cooreman 1994:52-6; and Manning 1996:12, 15, 84-98 for detailed discussion), as shown in (41)-(42). Compare (41)a with (41)b. We can see that the *tu*-

⁸ Y. L. Chang (1997, 2000a) use the term “subject” for the *ya*-marked nominative NP in a Non-Actor Focus (NAF) clause (canonical transitive clause in my analysis).

marked theme in a dyadic *-um-* or *(-)m-* clause has an indefinite interpretation, whereas the *ya-*marked theme in a dyadic *-an* clause has a definite interpretation. A similar kind of contrast can be found in the Central Arctic Eskimo examples in (42). In (42)a and (42)b, the theme NP in an antipassive clause has an indefinite interpretation, whereas the theme NP in a canonical transitive clause has a definite interpretation. This makes us suspect that the *tu-*marked theme in Kavalan may be the E of an extended intransitive construction rather than the O of a canonical transitive construction.

(41) Kavalan (data from Y. L. Chang 2000a:68-9)

- a. dyadic *m-* clause with an indefinite theme

qemal **tu** rasuŋ ya sunis.
dig TU well NOM child

‘The child is digging a well.’

- b. dyadic *-an* clause with a definite theme

qalan na sunis **ya** rasuŋ.
dig GEN child NOM well

‘The/a child dug the well.’

(42) Central Arctic Eskimo (data from Manning 1996:15)

- a. antipassive clause with an indefinite theme

Jaani **tuktumik** takuvuq.
Jaani.NOM caribou.MOD see.IND.INTR.?3S

‘Jaani sees a caribou.’

- b. canonical transitive with a definite theme

Jaaniup **tuktu** takuvaa.
Jaani.ERG caribou.NOM see.IND.TR.?3S.?3S

‘Jaani sees the caribou.’

A careful study of Kavalan texts suggests that *tu* should be analyzed as an oblique marker and that the *tu*-marked NP in a dyadic clause should be analyzed as an E of an extended intransitive construction rather than an O of a canonical transitive construction. The misanalysis of *tu* lies in overlooking some important data and in incorrectly associating the “accusative” case with the “Patient” of a dyadic clause without considering the transitivity of the clause. According to the present study of Kavalan texts, the form *tu* can mark not only the indefinite theme of a dyadic clause, but also noun phrases with a variety of grammatical functions. The distribution of *tu* can be summarized as follows.

First, *tu* can mark an indefinite or a nonindividuated theme of a dyadic (or triadic) (-)*m*- or -*um*- clause. As shown in the translation of examples (43)–(44), the *tu*-marked theme phrases all have indefinite or nonindividuated interpretations.⁹

(43) *tu* marks an indefinite theme of a dyadic *m*- or -*um*- clause:

- a. *mnanguy=ti tmarawma tu iRuR.*
swim=PRF cross TU stream

‘They swam to cross a stream.’ (Kav.8-024)

- b. *tumungaw tu zemian.*
bring TU salt

‘They brought some salt.’ (Kav.5-016)

- c. *Ringu smangi tu namat a kubarán.*
unknown/unable make TU weapon NOM Kavalan

‘The Kavalan were not able to/did not know how to make weapons.’ (Kav.7-051)

⁹ In this chapter, the determination of definiteness of Kavalan noun phrase is based on discourse cues.

- d. *tmanan=ti tu mai smanu tu lak.*
 return=PRF but NEG tell TU companion
 ‘They returned/went home, but they did not tell (their) companions.’ (Kav.6-026)

- e. *tu mawtutu=ti a baquay muʔtung tu*
 and.then come.frequently=PRF NOM Baquay.Atayal kill TU
razat tazian.
 person there
 ‘Then the Baquay Atayal frequently came to kill people there.’ (Kav.9-006)

- (44) *tu* marks an indefinite theme of a triadic *-an* clause:

sinapunika tu beRas!
 give/pass.out.IMP TU rice
 ‘Pass out/Give them some rice!’ (Kav.7-037)

Second, *tu* can mark a location noun (a place name or a common location noun), as in (45)–(46).

- (45) *tu* marks a place name:

quu tmuzus tu Huarien, Raya=ti a zanum.
 as/when reach TU Hualien big=PRF NOM water
 ‘When they arrived at Hualien, there was a flood.’ (Lit., When they arrived at Hualien, the water was big.) (Kav.8-023)

- (46) *tu* marks a common location noun:

- a. *tmuzus=ti a kubaran tu lamuana.*
 reach=PRF NOM Kavalan TU village.GEN.3S/P
 (*lamuana* < *lamu* + *-an* + *-na*)
 ‘The Kavalan people arrived at her (the old woman’s) village.’ (Kav.8-011)
- b. *mzaki tu raziŋ a repaw=ku.*
 near/close TU sea NOM house=GEN.1S
 ‘My house is close to the sea.’ (Kav.2-008)

Third, *tu* can mark an (inanimate) actor of a dyadic *-an* clause, as in (47).

(47) *tu* marks an inanimate actor of a dyadic *-an* clause:

tnuqiq tu bul a punuz.
 PRF.pierce TU bamboo NOM backside

‘A bamboo pierced through (his) backside.’ (Kav.9-009)

Fourth, *tu* can mark a temporal phrase, as in (48).

(48) *tu* marks a temporal phrase:

pasawa tu lalusa ta rukian.
 fight TU half LCV hour

‘They fought for half an hour.’ (Kav.11-025)

Fifth, *tu* can mark an instrumental noun, as in (49).

(49) *tu* marks an indefinite theme (*zemian* ‘salt’) and an instrumental noun (*?iu?* ‘medicine’):

*?ara=pa=ita tu zemian si paRamesa kita*¹⁰
 take=IRR=NOM.IPI TU salt and? CAUS.mix.FUT GEN.1PL.IRR

tu ?iu?
 TU medicine/poison

‘Let’s take some salt and let’s mix it with poison.’ (Kav.5-014)

Sixth, *tu* can mark a (human) comitative noun, as in (50).

(50) *tu* marks a comitative NP:

a. *tu siqnabil=ti a kubaran tu maytumal.*
 consequently become.enemies=PRF NOM Kavalan TU Seediq

‘Consequently, the Kavalan became enemies with the Seediq.’ (Kav.3-045)

¹⁰ The pronoun form *kita* ‘GEN.1PL.IRR’ is probably a borrowing from Amis. In Amis, *kita* is first person inclusive NOMINATIVE pronoun. However, in the Kavalan texts that I examined, *kita* only appeared in an irrealis context, and it functions as the agent of a dyadic *-a* verb (irrealis form of a dyadic *-an* verb). Notice that in Kavalan, *kita* is usually a first person inclusive GENITIVE pronoun, rather than a NOMINATIVE pronoun.

- b. pamang mtaRuz ngil pibul *tu* hetay na rawraw.
 unexpectedly bold want fight TU soldier GEN country

‘Unexpectedly, they were bold to fight with soldiers of the country.’ (Kav.7-052)

Finally, *tu* can mark an (inanimate) possessor, as in (51).

(51) *tu* marks the (inanimate) possessor of a possessive construction:

mayu simangma baquay, yau a tbarung, tmuqiq tu
 NEG just Baquay.Atayal EXIST NOM Tbarung pierce TU

punuz na paRibunan *tu* bawbi?
 backside GEN watcher TU garden

‘There were not only the Baquay Atayal, but also the Tbarung people, (who came to) pierce the backside of the garden watcher.’ (Kav.9-007)

As illustrated in these examples, the form *tu* can mark NPs with a wide range of grammatical functions: it can mark not only the indefinite theme of a dyadic *-um-* or *(-)m-* clause, but also a temporal phrase, a location noun, a comitative noun, an instrumental noun, a possessor, and the actor of a dyadic *-an* clause. After examining the distribution of the form *tu*, we can conclude that it is best analyzed as an oblique marker rather than as an accusative marker.¹¹

4.3.1.3.4 *ta*: Locative determiner or auxiliary noun??

Like the Kavalan form *tu*, the form *ta* has also been analyzed in various ways: as an accusative case marker for human or nonpersonal nouns (Li 1978; A. Lee 1997), an oblique case marker (Li 1996a, 1996b), a locative case marker (J. E. Lin 1996; Y. L.

¹¹ In some accusative languages (such as Korean), the accusative case marker can be used to mark various NPs that are apparently not direct objects (O’Grady 2003:70). For example, the accusative case marker *-ul* can mark a temporal phrase in Korean. However, unlike Kavalan, Korean does NOT observe differences in case-marking patterns depending on the definiteness of theme NPs.

Chang 1997, 2000a), and as a comitative case marker for nonpersonal nouns (A. Lee 1997). The present study of Kavalan texts suggests that *ta* is mainly used to mark location nouns, although it can also mark NPs with other grammatical functions. The distribution of *ta* can be summarized as follows.

First, *ta* can mark a location noun (a place name or a common location noun), as in (52)–(54). Unless occurring with a directional verb (as in (54)), the *ta*-marked location nouns are generally interpreted as NONDIRECTIONAL (as in (52) and (53)).

(52) *ta* marks a place name (with a nondirectional interpretation):

salim=pa=ita **ta** **Rawzawan.**
poison.fish=IRR=NOM.1PI LCV Rawzaw

‘Let’s poison fish in the Rawzaw Stream!’ (Kav.10-002)

(53) *ta* marks a common location noun (with a nondirectional interpretation):

matenes=ti tarumbi **ta** **naungan.**
long=PRF hide LCV mountain

‘They spent a long time to hide in the mountain.’ (Kav.11-027)

(54) *ta* marks a locative noun (with a directional interpretation when occurring with a directional verb):

a. *mbuRaw=ti* pasazi **ta** **tibuR.**
move=PRF go.toward LCV south

‘They moved toward the south.’ (Kav.9-010)

b. *mati=ti* **ta** **biwan.**
go=PRF LCV temple

‘They went to a temple.’ (Kav.6-010)

Second, *ta* can mark a comitative noun, as in (55).

(55) *ta* marks a comitative NP:

- a. tu mawtu=ti qapaRana=ti a tumuk **ta** sunis=na.
 and.then come=PRF catch.?3S/P=PRF NOM chief LCV child=GEN.3S/P
 ‘And then they came, (and) they caught the chief with his children.’ (Kav.7-042)
- b. yau ta subusu? kingchat **ta** napawa=na.
 EXIST LCV office policeman LCV spouse=GEN.3S/P
 ‘There was a policeman with/and his wife in the office.’ (Kav.11-009)
- c. lamulamu yau a hetay na tiungkuk, mrana? pasawa
 CVCV.village EXIST NOM soldier GEN China wait fight
ta zitpun.
 LCV Japanese
 ‘As for every village, there were soldiers of China, waiting to fight with the Japanese.’ (Kav.4-086)

Third, *ta* can mark a beneficiary NP, as in (56).

(56) *ta* marks a beneficiary NP (data from Li 1996a:78):

- qitenel ta naungan a sunis=na **ta** tina=na.
 pick.vegetable LCV mountain NOM child=GEN.3S/P LCV mother=GEN.3S/P
 ‘The child picked some vegetable for her/his mother in the mountain.’

As illustrated in these examples, the form *ta* is mainly used for marking location nouns, although it can also mark comitative NPs and beneficiary NPs. However, comitatives and beneficiaries can easily be interpreted as some kind of location. Therefore, we can conclude that *ta* is better analyzed as a locative case marker rather than an accusative.

4.3.1.3.5 *sa*: Locative determiner or auxiliary noun??

As for the form *sa*, it has been consistently analyzed as a locative case marker in previous analyses. The present study of Kavalan texts also supports such an analysis. As shown in examples (57) and (58), the *sa*-marked location nouns are always interpreted as DIRECTIONAL (whether they occur with directional verbs or not). This is quite different from the *ta*-marked location nouns that usually receive a nondirectional interpretation if they do not occur with directional verbs.

(57) *sa* marks a directional location noun:

siaqazqaz tubesana=ti bawa=na **sa** babaw.
land?? pull. ?3S/P=PRF boat=GEN.3S/P LCV above

‘They landed, (and) pulled their boat up to the land/ground [the top/above].’
(Kav.3-010)

(58) *sa* marks a directional location noun:

murpun nani tmeqteq tu wiya=ti **sa** razing.
finish then mark/erect.a.post and.then leave=PRF LCV sea

‘She finished marking (a garden), and then she left for the sea.’ (Kav.3-014)

4.3.1.3.6 Summary

Summarizing the above discussion, we can conclude that Kavalan has five sets of case markers: Genitive, Nominative, Oblique, Locative 1, and Locative 2, as shown in table 4.2. Although the occurrence of the case markers is not obligatory in Kavalan clauses, speakers prefer to keep them rather than drop them, especially for locative case markers. Among the some 450 sentences that I examined, there is only one instance of an unmarked locative phrase).

TABLE 4.2 KAVALAN CASE-MARKING SYSTEM

	GENITIVE	NOMINATIVE	OBLIQUE	LOCATIVE 1	LOCATIVE 2 [+DIR]
NONPERSONAL	na	ya/a/wa	tu	ta	sa
PERSONAL	ni				

Genitive case markers can mark both the possessor in a possessive construction and the agent argument of a dyadic *-an* clause. Nominative case markers can mark the nonpredicate nominal in a nonverb clause, the sole argument of a monadic intransitive clause, or the theme argument of a dyadic *-an* clause. The locative case markers *ta* and *sa* both can mark location nouns; but they differ in their distribution. The form *sa* has the most restricted distribution: it only marks DIRECTIONAL phrases. The form *ta* can mark not only location nouns, but also nouns with other grammatical functions. The oblique case marker *tu* can mark NPs with a wide range of grammatical functions. The fact that *tu* and *ta* can mark NPs with various grammatical functions has led to the misanalysis of these forms in previous analyses. Such a misanalysis has a great effect on the determination of the Kavalan actancy structure.

4.3.2 Personal Pronoun and Agreement Systems

Having discussed the case-marking system for full NPs, I will turn to the discussion of personal pronoun and agreement systems. Section 4.3.2.1 discusses the Kavalan personal pronoun system. Section 4.3.2.2 discusses the agreement system.

4.3.2.1 Kavalan personal pronouns

Unlike full noun phrases, personal pronouns in Kavalan exhibit formal differences depending on their syntactic functions. The forms and functions of Kavalan personal pronouns are summarized in table 4.3. The pronominal forms appearing in the following table are based on Li (1996a:80) and Y. L. Chang (1997:33; 2000a:84).

TABLE 4.3. PERSONAL PRONOUNS IN KAVALAN

	NOMINATIVE		OBLIQUE	LOCATIVE	GENITIVE	ABSOLUTE POSSESSIVE
	CLITIC	FREE				
1S [+SPKR, -ADDR, -PLRL]	=iku	aiku	timayku	tamaykuan	=ku	zaku
2S [-SPKR, +ADDR, -PLRL]	=isu	aisu	timaysu	tamaysuan	=su	zasu
3S [-SPKR, -ADDR, -PLRL]	---	aizipna	tiyau timayzipna	tiyawan tamayzipana	=na	zana
1PI [+SPKR, +ADDR, +PLRL]	=ita	aita	timayta	tamaytaan	=ta	zata
1PE [+SPKR, -ADDR, +PLRL]	=imi	aimi	timaymi	tamaymian	=nyaq	zanyaq zaimi
2P [-SPKR, +ADDR, +PLRL]	=imu	aimu	timaymu	tamaymuan	=numi	zanumi zaimu
3P [-SPKR, -ADDR, +PLRL]	---	qanyau	qanyau	taqanyawan	=na	zana

As illustrated in table 4.3, Kavalan personal pronouns distinguish three persons (first, second, and third) and two numbers (singular and plural). First person plural pronouns make a further distinction between inclusive and exclusive forms. The use of inclusive or exclusive forms is determined by whether the hearer(s) is/are included. Inclusive forms are employed when hearer(s) is/are included, otherwise exclusive forms are employed.

Kavalan personal pronouns distinguish five cases: Nominative, Genitive, Oblique, Locative, and Absolute possessive. Nominative pronouns can be further divided into free

pronouns and bound pronouns. Bound nominative pronouns and genitive pronouns are identified as pronominal clitics, which are indicated by the equal sign ‘=’.

Nominative pronouns are the pronominal equivalents of *ya*-marked full noun phrases. Like their corresponding *ya*-marked full noun phrases, nominative pronouns can be used as the nonpredicate pronominal in a nonverbal clause (as in (59)), as the sole argument of a monadic intransitive clause (as in (61) and (60)), or as the theme of a dyadic *-an* clause (as in (62)). In addition to these functions, free nominative pronouns can also be used as topics in topicalized sentences, as in (62).

- (59) bound nominative pronoun as the nonpredicate pronominal in a nonverbal clause:

niana=*imu*?
what(ever)=NOM.2P

‘Who are you (pl.)?’ (Kav.4-008)

- (60) bound nominative pronoun as the sole argument of an intransitive clause:

mati=imi ta lamuan yau a siahwan.
go=NOM.1PE LCV village EXIST NOM western.barbarian

‘We (ex.) went to a village, the western barbarians [the Dutch] were there.’
(Kav.4-019)

- (61) free nominative pronoun as the sole argument of a monadic clause:

kirim *aita*!
search NOM.1PI

‘Let’s search!’ (Kav.4-040)

- (62) free nominative pronoun as a topic in a topicalized sentence and bound nominative pronoun as the theme of a dyadic *-an* clause:

aimi, zamana=*imi* na bangel.
TOP.1PE chase.?3S/P=NOM.1PE GEN typhoon

‘As for us (ex.), we (ex.) were caught by a typhoon.’ (Lit., ‘As for us (ex.), a typhoon caught/chased us (ex.)’) (Kav.4-016)

Oblique pronouns are the pronominal equivalents of *tu*-marked full noun phrases.

They can be used as the recipient of an action, as in (63).

(63) oblique pronoun as the recipient of an action:

- a. *you* *a* *nianiau* *lamuay* *a* *sukaw* ***timaymu*** *si*,
 EXIST NOM other village LIG bad OBL.2P if

panmu=imi ***timaymu***.
 help=NOM.1PE OBL.2P

 ‘If there were other villages that were bad to you (pl.), we (ex.) would help (to) you (pl.).’ (Kav.7-006)

- b. *mai=ti=imi* *quni* ***timaymu***.
 NEG=PRF=NOM.1PE how/do.thing OBL.2P

 ‘We (ex.) would not do anything to you (pl.).’ (Kav.7-028)

Locative pronouns are the pronominal equivalents of the *ta*- or *sa*-marked full noun phrases. Like their corresponding *ta*-marked full noun phrases, they can be used as a location phrase, as in (64).

(64) locative pronoun as a location phrase:

qawtuka ***tamaymian***.
 come.IMP LCV.1PE

 ‘Come to our (ex.) place here.’ (Li 1996a: 82)

Genitive pronouns are the pronominal equivalents of the *na*-marked or *ni*-marked full noun phrases. Like their corresponding *na*-marked or *ni*-marked full noun phrases, genitive pronouns can function as the attribute (i.e., the possessor) in a possessive construction, as in (65). However, unlike their corresponding *na*-marked or *ni*-marked full noun phrases, genitive pronouns do NOT function as the agent of a dyadic *-an* clause, see section for 4.3.2.2 details.

(65) genitive pronoun as the possessor in a possessive construction:

tu mawtu=ti qapaRana=ti a tumuk ta sunis=*na*
and.then come=PRF catch.?3S/P=PRF NOM chief LCV child=GEN.3S/P

‘And then they came, (and) they caught the chief with his children.’ (Kav.7-042)

In addition to genitive pronouns, there is another set of pronouns that can also be used to express possession. This set of pronouns is absolute possessive pronouns. Absolute possessive pronouns are pronominal forms that can be translated as ‘mine, yours, theirs’, and so forth in English. Although both genitive and absolute possessive pronouns can express possession, they differ in their distribution. Absolute possessive pronouns themselves can stand alone to express possession, but genitive pronouns must cliticize to their preceding head nouns (i.e., the possessed nouns) (cf. (65) and (66)). Moreover, absolute possessives behave like common nouns in that they can be case-marked by a pronominal monosyllabic form. As shown in (66), the absolute possessive pronoun *zana* ‘POSS.3S/P’ itself can indicate possession, and it can be followed by an appositive noun phrase *masang baqi na kubaran* ‘the ancient ancestors of the Kavalan people’. Besides, it is case-marked by the oblique case marker *tu*.

(66) absolute possessive pronoun:

sanu=pa=iku tu *zana* masang baqi na kubaran.
tell=IRR=NOM.IS TU POSS.3S/P ancient ancestor GEN Kavalan

‘I shall talk about the ancient ancestors of the Kavalan people.’ (Lit., ‘I shall talk about theirs, the ancient ancestors of the Kavalan people.’) (Kav.3-001)

4.3.2.2 The Kavalan agreement system

As discussed in section 4.3.2.1, Genitive pronouns, like their corresponding *na*-marked or *ni*-marked full noun phrases, can function as the attribute (i.e., the possessor)

in a possessive construction. However, unlike their corresponding *na*-marked or *ni*-marked full noun phrases, they do NOT function as the agent of a dyadic *-an* clause. The person and number features of the agent of a dyadic *-an* clause, instead of being expressed by a clitic or free form pronoun, are cross-referenced on the verb. This fact might be related to the historical development of agreement forms from genitive pronouns.¹²

Table 4.4 shows that the Genitive clitic pronouns, indicated by the equals sign "=", are phonologically identical to their related agreement forms, indicated by the dash "-" symbol "-".

TABLE 4.4. GENITIVE PRONOUNS AND THEIR RELATED VERB AGREEMENT FORMS

	AGREEMENT FORMS	GENITIVE PRONOUNS
1S (+SPKR, -ADDR, -PLRL)	-ku	=ku
2S (-SPKR, +ADDR, -PLRL)	-su	=su
3S (-SPKR, -ADDR, -PLRL)	-na	=na
1PI (+SPKR, +ADDR, +PLRL)	-ta	=ta
1PE (+SPKR, -ADDR, +PLRL)	-nyaq	=nyaq
2P (-SPKR, +ADDR, +PLRL)	-numi	=numi
3P (-SPKR, -ADDR, +PLRL)	-na	=na

The pronominal-related agreement forms are classified as agreement markers rather than clitic pronouns because of the following distributional facts (see Y. L. Chang (1997:117–122); Li (1996a:83); and Tsuchida (1993) for a similar treatment of agreement forms in Kavalan).¹³ First, agreement forms are selective in terms of their host (which must be a dyadic *-an* verb), whereas clitic pronouns are not. Second, agreement forms

¹² Reid (2001) discusses the development of agreement markers from genitive pronouns in some Northern Philippine languages. A similar account can be applied to the development of agreement forms in Kavalan.

¹³ See Zwicky and Pullum (1983:503–504) for criteria for distinguishing clitics from affixes.

occur BEFORE aspectual adverbial clitics (=pa ‘irrealis’ or =ti ‘perfective’), whereas clitic pronouns occur AFTER aspectual adverbial clitics, as in (67). Third, agreement forms can occur between the formative *-an* and the formative *-ka*, often associated with the formation of a transitive imperative, as in (69). Fourth, they can cooccur with an overt agent phrase in a dyadic *-an* clause, as in (67).

(67) *-na* agrees with the agent of a dyadic *-an* clause in person and number:

- a. sukayarana=*ti* na hetay a patayay.
 remove.ear.?3S/P=PRF GEN soldier NOM dead.NR
 (sukayarana > sukayar + *-an* + *-na*)

‘The soldiers removed the ears of the dead one(s).’ (Kav.7-018)

- b. tu mawtu=*ti* qapaRana=*ti* a tumuk ta sunis=*na*.
 and.then come=PRF catch.?3S/P=PRF NOM chief LCV child=GEN.3S/P
 (qapaRana < qapaR + *-an* + *-na*)

‘And then they came, (and) they caught the chief with his children.’ (Kav.7-042)

(68) *-nyaq* agrees with the agent of a dyadic *-an* clause in person and number:

pasanuannyaq niana ya nangan na rawraw na zau.
 CAUS.tell.?1PE what NOM name GEN island LIG this/these

‘We (ex.) asked what the name of this island was.’ (Kav.4-020)

(69) *-ta* agrees with the agent of a dyadic *-an* clause in person and number:

qangima ?tungantaka!
 all kill.?1PL.IMP
 (?tungantaka < ?tung + *-an* + *-ta* + *-ka*)

‘Let’s kill them all!’ (Kav.5-013)

In Kavalan, the pronominal-related agreement forms agree only with the agent of a dyadic clause in person and number, but not with any argument in a monadic or dyadic *-um-* or *(-)m-* clause. This fact argues against the claim that Kavalan has an accusative actancy structure in that in an accusative language, if the language exhibits verb

agreement, the verb would at least agree with the S and the A (Croft 1990; Whaley 1997; Dixon 1979, 1994; etc.). However, in Kavalan, the sole argument of a monadic intransitive clause is not cross-referenced by any agreement form on the verb.

4.4 TRANSITIVITY IN KAVALAN VERBAL CLAUSES

In this section, I discuss transitivity in Kavalan verbal clauses. I first discuss Kavalan verbal clause patterns in section 4.4.1. Then I discuss three proposals concerning Kavalan transitivity and actancy structure in section 4.4.2. Section 4.4.3 provides an evaluation of previous analyses. Section 4.4.4 summarizes the discussion in this section.

4.4.1 Kavalan Verbal Clause Patterns

Three verbal clause patterns are commonly found in Kavalan texts: (i) Pattern 1: monadic intransitive clauses, (ii) Pattern 2: dyadic *-um-* or *(-)m-* clauses, and (iii) Pattern 3: dyadic *-an* clauses. These three clause patterns are represented schematically in table 4.5.¹⁴

¹⁴ Table 4.5 is a rough representation of Kavalan verbal clause patterns. Most of the verbs that take only one *ya*-marked NP, and most of verbs that take one *ya*-marked NP and one *tu*-marked NP have the morphological shape *-um-* or *(-)m-*; most of the verbs that take one *na*-marked (or *ni*-marked) NP and one *ya*-marked NP have the morphological shape *-an*. To simplify the discussion, I will refer to verbal clause Pattern 1 as monadic *-um-/(-)m-* clauses, Pattern 2 as dyadic *-um-/(-)m-* clauses, and Pattern 3 as dyadic *-an* clauses.

TABLE 4.5. THREE VERBAL CLAUSE PATTERNS IN KAVALAN

PATTERN 1:	<i>-um-/(-)m-V</i>	<i>a/ya/wa</i>	N			<i>(tu/ta/sa</i>	N)
	Intr.	Nom					
PATTERN 2:	<i>m-V</i>	<i>a/ya/wa</i>	N	<i>tu</i>	N	<i>(tu/ta/sa</i>	N)
	Intr.? Tr.?	Nom		Acc?Obl?			
PATTERN 3:	<i>V-an(-agreement)¹⁵</i>	<i>ni/na</i>	N	<i>a/ya/wa</i>	N	<i>(tu/ta/sa</i>	N)
	Intr.? Tr.?	Gen		Nom			

Pattern 1 typically consists of monadic *-um-* or *(-)m-* verbs that expect only one nominative-marked NP, as in (70). In some cases, the monadic verbs may also allow an optional peripheral argument (or adjunct) that is marked by the locative markers *ta* or *sa* or the marker *tu*, as in (71)-(72). The monadic verbs in pattern 1 do NOT carry any person or number agreement features, as shown in (70)-(72).

(70) pattern 1: monadic intransitive clause

mriway=ti *a* *usiq* *nani* *qawman* *snayau*.
 substitute=PRF NOM one subsequently also likeness

‘One substituted (for another), subsequently, it was also like that.’ (Kav.6-022)

(71) pattern 1: monadic intransitive clause

mati¹⁶ *ta* *kariawan* *Rimuy*.
 go LCV Kariawan police.station

‘They went to the Kariawan police station.’ (Kav.11-008)

¹⁵ One may also include the so-called “Referential Focus” (including “Instrumental Focus” and “Benefactive Focus”) clauses (i.e., clauses with *ti-V* or *te-V*) as Pattern 3 clauses. Although most linguists working on Kavalan syntax report the existence of so-called “Referential Focus” clauses in Kavalan (Li 1996a; J. E. Lin 1996; A. Lee 1997; Y. L. Chang 1997, 2000; etc.), I could not find a single occurrence of a *ti-V* or *te-V* clause in the twelve Kavalan texts that I examined. Therefore, I do not include *ti-V* or *te-V* clauses in the schematic representation of Kavalan verbal clauses.

¹⁶ In Kavalan, the third person singular and plural nominative pronouns (short form) are phonologically null.

(72) pattern 1: monadic intransitive clause

mzaki tu razij a repaw=ku.
 near/close TU sea NOM house=GEN.IS

‘My house is close to the sea.’ (Kav.2-008)

Pattern 2 typically consists of dyadic *-um-* or *(-)m-* verbs that expect both a nominative-marked NP and a *tu*-marked NP, as in (73). In some cases, the dyadic *-um-* or *(-)m-* verbs in pattern 2 may also allow an optional peripheral argument (or adjunct) that is marked by the locative markers *ta* or *sa* or the marker *tu*. Like the monadic *-um-* or *(-)m-* verbs in pattern 1, the dyadic *-um-* or *(-)m-* verbs in pattern 2 do NOT carry any person or number agreement features, as in (73).

As discussed in section 4.3.1.3.3, the syntactic status of the form *tu* in pattern 2 is somewhat controversial. It has been analyzed as an accusative case marker (Li 1978; Hsin 1996; A. Lee 1997; Y. L. Chang 1997, 2000a; and Chang et al. 1998; Chang and Lee 2002); it has also been analyzed as an oblique case marker (Li 1996a, 1996b). If we interpret *tu* as an accusative case marker, then Kavalan will have either an accusative or split ergative case-marking system. If we interpret *tu* as an oblique case marker, then Kavalan will have a pure ergative case-marking system. I will come back to this point in section 4.4.3.

(73) pattern 2: dyadic *-um-/(-)m-* clause

a. *smaŋi tu bawa’.*
 make TU boat

‘They built a boat.’ (Kav.3-007)

- b. *tumuṅaw tu zemian.*
bring TU salt
'They brought some salt.' (Kav.5-016)
- c. *Riṅu smaṅi tu namat a kubaran.*
unknown/unable make TU weapon NOM Kavalan
'The Kavalan were not able to/did not know how to make weapons.' (Kav.7-051)

Pattern 3 typically consists of dyadic *-an* verbs that expect both a genitive-marked NP and a nominative-marked NP, as in (74). Like the verbs in pattern 1 and pattern 2, the dyadic *-an* verbs in pattern 3 may also allow an optional peripheral argument (or adjunct) that is marked by the locative markers *ta* or *sa* or the marker *tu*. However, the dyadic *-an* verbs in pattern 3 differ from the monadic and dyadic *-um-* or *(-)m-* verbs in pattern 1 and pattern 2 in that the dyadic *-an* verbs carry optional person and number features that agree with the genitive-marked argument,¹⁷ whereas the *-um-* or *(-)m-* verbs in pattern 1 and pattern 2 do NOT carry any person or number agreement features.

(74) pattern 3: dyadic *-an* clause

- a. *qatqatiwana=ti a Rimuy, ?tuṅana=ti a kiṅchat*
CVC.go.to.?3S/P=PRF NOM police.station kill.?3S/P=PRF NOM policeman
na ziptun.
LIG Japanese
'They went into the police station, (and) killed the Japanese policeman.' (Kav.11-006)
- b. *taktakana ya taqan na repaw na bayblan.*
cut.down.?3S/P NOM pillar GEN house GEN old.woman
'They cut down the pillar(s) of the old woman's house.' (Kav.8-021)

¹⁷ In examples (74)a-d, the third person singular/plural agreement marker *-na* has fused with the ending (i.e., the formative *-an*) of the *-an* verbs as *-ana*.

- c. *inebana=ti na hetay a rawaŋ.*
 close.?3S/P=PRF GEN soldier NOM city
 ‘The soldiers closed the city (gate).’ (Kav.7-033)
- d. *kurikuzana=ti na hetay.*
 follow.?3S/P=PRF GEN soldier
 ‘The soldiers followed them.’ (Kav.7-016)

4.4.2 Three Proposals Concerning Kavalan Transitivity and Actancy

As shown in section 4.4.1, there are two distinct dyadic clause patterns that are ambiguous regarding transitivity. Varying in their interpretation of these two patterns, three proposals concerning Kavalan transitivity and actancy structure have been (explicitly or implicitly) proposed in previous analyses of Kavalan syntax: a passive analysis, a split-ergative analysis, and an ergative analysis.

The passive analysis, adopted by Li (1978) and Hsin (1996),¹⁸ treats the *tu*-marked theme NP in pattern 2 as an “accusative” object of an active transitive construction but the genitive-marked NP in pattern 3 as a demoted agent of a passive construction. By treating pattern 1 as intransitive, pattern 2 as canonical transitive, and pattern 3 as passive, Kavalan is analyzed as an accusative language. The passive analysis is schematically summarized as in table 4.6.

The split-ergative analysis, adopted by most Formosanists (such as J. E. Lin 1996; A. Lee 1997; Tsai 1997; Y. L. Chang 1997, 2000a; Chang et al. 1998; Chang and Tsai

¹⁸ Hsin (1996) does not explicitly state that Pattern 2 is a transitive construction and Pattern 3 is a passive construction in Kavalan. However, we can infer such an analysis from her use of the term “accusative marker” for the form *tu*, and the term “demoted agent marker” for the form *na*.

2001,¹⁹ Chang and Lee 2002), treats the *tu*-marked theme NP in pattern 2 as an “accusative” object of one type of transitive construction, and the genitive-marked NP in pattern 3 as an agent of the other type of transitive construction. By treating pattern 1 as intransitive and both pattern 2 and pattern 3 as canonical transitive, Kavalan is analyzed as a split-ergative language. The split-ergative analysis is summarized schematically in table 4.7.

The ergative analysis, adopted by Li (1996a, 1996b), treats the *tu*-marked theme NP in pattern 2 as an oblique-marked extended core argument of an extended intransitive construction but the genitive-marked NP in pattern 3 as an agent of a canonical transitive construction. By treating pattern 1 as intransitive, pattern 2 as extended intransitive, and pattern 3 as canonical transitive, Kavalan is analyzed as a pure ergative language. The ergative analysis is summarized schematically in table 4.8.

As illustrated in tables 4.6–4.8, all three proposals agree in treating pattern 1 as an intransitive structure, but disagree as to whether pattern 2 and/or pattern 3 should be treated as transitive structures. Such disagreement exists because both pattern 2 and pattern 3 are dyadic structures that might be considered transitive. Because both pattern 2 and pattern 3 are possible candidates for transitive constructions, it is crucial to determine which one of the two, or whether both, should count as the canonical transitive

¹⁹ Chang and Tsai (2001) propose a somewhat paradoxical analysis of the Kavalan case-marking system. They state that “Actor voice affixes can be treated as antipassive morphemes, which trigger[s] the demotion of the direct objects to oblique arguments in Actor voice constructions” (17). However, they have glossed *tu* as an accusative marker rather than an oblique marker in their paper. It is not clear when and how the supposed demotion of the direct objects to oblique arguments takes place. Also, it is not clear whether the so-called “accusative” case is used to mark a “direct object” or an “oblique” in their analysis. I have classified their analysis as a split-ergative analysis because “accusative” case is incompatible with an ergative analysis.

in Kavalan. In the following section, I examine the morphosyntactic and semantic properties that these clause patterns exhibit in order to decide the matter.

TABLE 4.6 KAVALAN AS AN ACCUSATIVE LANGUAGE

PATTERN 1:	<i>-um-/(-)m-V</i>	<i>a/ya/wa</i>	N			(<i>tu/ta/sa</i> N)
	Intr.	Nom				
PATTERN 2:	<i>-um-/(-)m-V</i>	<i>a/ya/wa</i>	N	<i>tu</i>	N	(<i>tu/ta/sa</i> N)
	Tr.	Nom		Acc		
PATTERN 3:	<i>V-an(-agreement)</i>	<i>ni/na</i>	N	<i>a/ya/wa</i>	N	(<i>tu/ta/sa</i> N)
	Intr. (Passive)	Gen		Nom		

TABLE 4.7 KAVALAN AS A SPLIT-ERGATIVE LANGUAGE

PATTERN 1:	<i>-um-/(-)m-V</i>	<i>a/ya/wa</i>	N			(<i>tu/ta/sa</i> N)
	Intr.	Nom/Abs				
PATTERN 2:	<i>-um-/(-)m-V</i>	<i>a/ya/wa</i>	N	<i>tu</i>	N	(<i>tu/ta/sa</i> N)
	Tr.	Nom		Acc		
PATTERN 3:	<i>V-an(-agreement)</i>	<i>ni/na</i>	N	<i>a/ya/wa</i>	N	(<i>tu/ta/sa</i> N)
	Tr.	Gen/Erg		Nom/Abs		

TABLE 4.8 KAVALAN AS AN ERGATIVE LANGUAGE

PATTERN 1:	<i>-um-/(-)m-V</i>	<i>a/ya/wa</i>	N			(<i>tu/ta/sa</i> N)
	Intr.	Nom/Abs				
PATTERN 2:	<i>-um-/(-)m-V</i>	<i>a/ya/wa</i>	N	<i>tu</i>	N	(<i>tu/ta/sa</i> N)
	Intr.	Nom/Abs		Obl		
PATTERN 3:	<i>V-an(-agreement)</i>	<i>ni/na</i>	N	<i>a/ya/wa</i>	N	(<i>tu/ta/sa</i> N)
	Tr.	Gen/Erg		Nom/Abs		

4.4.3 An Evaluation of Previous Analyses

In previous analyses of Kavalan clauses, both pattern 2 (i.e., dyadic *-um-* or *(-)m-* clauses) and pattern 3 (i.e., dyadic *-an* clauses) have been analyzed as transitive as well

as intransitive. Pattern 2 is more frequently analyzed as transitive than pattern 3. The determination of transitivity in most of the previous analyses seems to be based primarily on translation. If a clause is translatable as transitive in Taiwanese, Mandarin Chinese, English, or other accusative languages, then it has often been automatically treated as transitive. If a clause is translatable as passive in these languages, then it has often been automatically treated as passive. Few linguists working on the Kavalan language (as well as other Formosan languages) have given the morphosyntactic properties of clause structures and their correlations with semantic properties significant weight.

In this study, I depart from most of the previous analyses on Formosan languages (except Huang 1994; Rau 1997; Starosta 1997, 1998, 1999, 2002b; etc.) in considering the morphosyntactic and semantic properties of Kavalan clause structures as key factors in determining the transitivity of Kavalan clause structures. In this section, I evaluate the three proposals discussed in section 4.4.2 in terms of morphosyntactic and semantic criteria. Based on the syntactic distribution of the form *tu* and the morphosyntactic and semantic properties that the three Kavalan verbal clause patterns exhibit, I argue that the ergative analysis is a better analysis of Kavalan transitivity. The following morphosyntactic and semantic evidence can justify this claim.

4.4.3.1 Nominal case-marking

In this section, I evaluate the three proposals in terms of the nominal case-marking system.

If we compare the three proposals in terms of the nominal case-marking system, we find that the ergative analysis is a better analysis of Kavalan transitivity.

If the passive analysis were correct, then the *tu*-marked theme NP in pattern 2 would be an “accusative” NP and the *ni*-marked or *na*-marked NP in pattern 3 would be a peripheral argument or an adjunct. However, as shown in section 4.3.1.3.3, my textual analysis suggests that the *tu*-marked NP in pattern 2 should be treated as an OBLIQUE-marked extended core argument E rather than an accusative-marked core argument O. Besides, the analysis that treats the *ni*-marked or *na*-marked NP in pattern 3 as an adjunct may raise questions such as “If the *ni*-marked or *na*-marked NP in pattern 3 is an adjunct, why is it almost always present in this type of clause?” or “If the *ni*-marked or *na*-marked NP in pattern 3 is an adjunct, why can it undergo some syntactic processes?” (see Y. L. Chang 1997; Chang and Tsai 2001 for detailed discussion), and so forth.

If the split-ergative analysis were correct, the *tu*-marked theme NP in pattern 2 would be an “accusative” NP and the *ni*-marked or *na*-marked NP in pattern 3 would be an “ergative” NP. As just noted, my textual analysis points out that the *tu*-marked NP in pattern 2 should be treated as an OBLIQUE-marked extended core argument E rather than an accusative-marked core argument O. Moreover, if the split-ergative analysis were the correct characterization of Kavalan transitivity, we would run into the following problem in typology.

Typologically speaking, if a language exhibits a split case-marking system, it is commonly conditioned by one or more of the following factors: (1) the semantic nature of the main verb, (2) the semantic nature of the core NPs (e.g., pronominals vs. full noun

phrases), (3) the tense/aspect/mood of the clause, and (4) the grammatical status of a clause (i.e., whether it is a main or subordinate clause) (Dixon 1979, 1994). However, none of these factors seems to condition the supposed split case-marking system described in the split-ergative analysis. From a typological perspective, such an analysis would be undesirable because it would make Kavalan (as well as many other western Austronesian languages) typologically unusual in that it would show an idiosyncratic type of split case-marking system, one that had none of the usual motivations for such a split.

On the other hand, if the ergative analysis is correct, then all the problems that we encountered for the other two proposals are avoided. As already demonstrated in section 4.3.1.3.3, the textual analysis suggests that the *tu*-marked theme NP in pattern 2 should be an OBLIQUE-marked extended core argument E and the *ni*-marked or *na*-marked NP in pattern 3 should be an ergative-marked A (genitive-marked A in my analysis). This is exactly what is to be expected in an ergative analysis.

4.4.3.2 Agreement

If we compare the three proposals in terms of verbal agreement, we find that the ergative analysis is a better analysis of Kavalan transitivity.

Typologically speaking, agreement is a property that is more likely associated with the core arguments S, A, and O than with any other arguments and/or adjuncts (Whaley 1997:153, 164–165; Dixon 1994:45). If a verb agrees with adjuncts or arguments other

than the three core arguments S, A, and O in some features, we would expect that it would also agree with S, A, and O in those features, and not vice versa.

If the passive analysis were the correct characterization of Kavalan transitivity, then the genitive-marked NP (i.e., the *na*-marked or *ni*-marked NP) in pattern 3 would be an adjunct. Typologically speaking, we would expect that the verb would agree with the genitive-marked NP (an adjunct in this type of analysis) if, and only if, it also agrees with the nominative NP (i.e., the *ya/a/wa*-marked NP) and the “accusative” NP (i.e., the *tu*-marked NP in this type of analysis). However, these types of data are not found in Kavalan texts.

If the split-ergative analysis were correct, then Kavalan would have a split agreement system in which only certain types of transitive clauses would exhibit verbal agreement, but other types of transitive clauses would not. Again, like the supposed split case-marking system, the supposed split agreement system is not conditioned by any of the four factors cited in 4.4.3.1. And again, from a typological point of view, such an analysis would be undesirable because Kavalan would become typologically unusual in that it would show an idiosyncratic type of split-agreement system, one without any of the usual motivations.

If the ergative analysis is correct, then Kavalan has a pure ergative agreement system in which the verb of a transitive clause agrees only with the genitive-marked A in person and number features, but not with the nominative-marked S and O or other core

arguments or adjuncts. From a typological point of view, this type of ergative agreement system is typologically plausible, though rare.²⁰

4.4.3.3 Semantic transitivity

In the preceding two sections, I have shown that evidence from the nominal case-marking system and the verbal agreement system suggests that an ergative analysis is a better analysis of Kavalan transitivity than other proposed analyses. In this section, I demonstrate that semantic evidence converges with morphosyntactic evidence in this conclusion.

Since the appearance of Hopper and Thompson's (1980) influential work on "transitivity in grammar and discourse," more and more linguists have recognized that the notion of 'transitivity' can be considered to be a combination of semantic, morphological, and syntactic factors. A number of linguists have looked at the correlations between semantic properties and morphosyntactic transitivity in various language families (e.g., Tsunoda 1999; Gibson and Starosta 1990; Dixon 1994; Huang 1994; Starosta 1997, 1998, 1999, 2002b; Lazard 1997; Rau 1997). They all come to the same conclusion, that if semantic parameters covary with morphosyntactic manifestations of transitivity, clauses exhibiting high semantic transitivity are more likely to be encoded grammatically (morphologically and syntactically) as transitive. However, linguists disagree on whether all of the ten semantic parameters that Hopper and Thompson

²⁰ Dixon (1994:46) states: "What is much less common, across the languages of the world, is for the verb to cross-reference just one core argument." However, Dixon (1994:44) points out that "The Nilotic language Pãri shows a number of ergative features, including A being cross-referenced on the verb in one type of construction, but never S or O....However, I do not know of any accusative language that consistently cross-references O, but not S or A."

proposed should be considered equally relevant to the morphosyntactic manifestations of transitivity. For instance, Tsunoda (1999:4) suggests that Affectedness of the patient is the most important and is (almost) always relevant to the morphosyntactic manifestations of transitivity, but Volitionality and Agency are much less pertinent. In this study, I consider another semantic parameter, Individuation of the theme, as most relevant to the morphosyntactic manifestations of Kavalan transitivity.

Let us compare the interpretation of the theme NPs in pattern 2 (i.e., dyadic *-um-/-m-* clauses) with the ones in pattern 3 (i.e., dyadic *-an* clauses) in examples (75)–(85). Consider the examples of dyadic *-um-/-m-* clauses in (75)–(81). The theme NPs in these examples are translated as either plural nouns, mass nouns, or nouns with indefinite determiners. Such nouns are generally considered as nonindividuated.

(75) pattern 2: dyadic *-um-/-m-* clause with an indefinite theme

smaŋi tu bawa?
make TU boat

‘They built a boat.’ (Kav.3-007)

(76) pattern 2: dyadic *-um-/-m-* clause with an indefinite or nonindividuated theme

naRin mara tu wakuŋ kaysiŋ.
NEG[+PROHIB] take TU big.bowl small.bowl

‘Don’t take big bowls and small bowls.’ (Kav.8-016)

(77) pattern 2: dyadic *-um-/-m-* clause with an indefinite theme

mnaŋuy=ti tmarawma tu iRuR.
swim=PRF cross TU stream

‘They swam to cross a stream.’ (Kav.8-024)

- (78) pattern 2: dyadic *-um-/(-)m-* clause with an indefinite or nonindividuated theme

qawtu^{ka} qan tu tamun Raak.
 come.IMP eat TU cooked.dish wine

‘Come to have some food and wine.’ (Kav.8-013)

- (79) pattern 2: dyadic *-um-/(-)m-* clause with an indefinite or nonindividuated theme

tumuṅaw tu zemian.
 bring TU salt

‘They brought some salt.’ (Kav.5-016)

- (80) pattern 2: dyadic *-um-/(-)m-* clause with an indefinite or nonindividuated theme

tmanan=ti tu mai smanu tu lak.
 return=PRF but NEG tell TU companion

‘They return/went home, but they did not tell (their) companions.’ (Kav.6-026)

- (81) pattern 2: dyadic *-um-/(-)m-* clause with an indefinite or nonindividuated theme

Riṅu smaṅi tu namat a kubarān.
 unknown/unable make TU weapon NOM Kavalan

‘The Kavalan were not able to/did not know how to make weapons.’ (Kav.7-051)

In contrast, consider the theme NPs of dyadic *-an* clauses in (82)–(84). We find that the theme NPs in these examples all have a definite interpretation. They are all translated as noun phrases with a definite determiner.

- (82) pattern 3: dyadic *-an* clause with a definite theme

qatqatiwana=ti a Rimuy, ʔtuṅana=ti a kiṅchat
 CVC.go.to.ʔ3S/P=PRF NOM police.station kill.ʔ3S/P=PRF NOM policeman

na ziptun.
 LIG Japanese

‘They went into the police station, (and) killed the Japanese policeman.’
 (Kav.11-006)

(83) pattern 3: dyadic *-an* clause with a definite theme

taktakana ya taqan na repaw na bayblan.
cut.down.?3S/P NOM pillar GEN house GEN old.woman

‘They cut down the pillar(s) of the old woman’s house.’ (Kav.8-021)

(84) pattern 3: dyadic *-an* clause with a definite theme

inebana=ti na hetay a rawaj.
close.?3S/P=PRF GEN soldier NOM city

‘The soldiers closed the city (gate).’ (Kav.7-033)

(85) pattern 3: dyadic *-an* clause with a definite theme

kurikuzana=ti na hetay.
follow.?3S/P=PRF GEN soldier

‘The soldiers followed them.’ (Kav.7-016)

As shown in examples (75)–(85), the textual analysis points out that the theme NP in a dyadic *m-* clause usually has an indefinite or nonindividuated interpretation, while the theme NP in a dyadic *-an* clause usually has a definite or individuated interpretation. Semantically, clauses with a definite or individuated theme (i.e., dyadic *-an* clauses) are considered more transitive than clauses with an indefinite or nonindividuated theme (i.e., dyadic *-um-/(-)m-* clauses). If we correlate this semantic property with the morphosyntactic properties that we discussed in the preceding two sections, we find that semantically more transitive dyadic *-an* clauses are manifested grammatically as more transitive than semantically less transitive dyadic *-um-/(-)m-* clauses.

4.4.4 Summary

In the preceding sections, I have evaluated three proposals concerning Kavalan transitivity in terms of morphosyntactic and semantic criteria. Based on the

morphosyntactic and semantic properties that Kavalan verbal clauses exhibit, we can conclude that the ergative analysis is the best analysis of Kavalan transitivity.

4.5 ERGATIVITY

Having determined the canonical transitive construction in Kavalan, it is possible to determine what type of actancy structure Kavalan has.

Incorporating the observations in section 4.4, we can characterize Kavalan clause structures as in table 4.9. From the table, we can observe that the S of an intransitive clause and the O of a transitive clause have the same morphological marking (marked by the nominative marker *ya/a/wa*),²¹ while the A of a transitive clause has a distinct morphological marking (marked by the genitive marker *ni* or *na*). This suggests that Kavalan has a pure ergative case-marking system rather than an accusative or a split-ergative system.²²

²¹ As already discussed in section 4.3.1.2, the forms *ya/a/wa* are not only used as nominative markers, but also as ligatures in Kavalan.

²² Although I have focused my discussion on the case-marking of full noun phrases only, the observations hold for personal pronouns as well.

TABLE 4.9 KAVALAN ACTANCY STRUCTURE

PATTERN 1: <i>-um-/(-)m-V</i> Intr.	<i>a/ya/wa</i> N Nom S			<i>(tu/ta/sa</i> N)
PATTERN 2: <i>-um-/(-)m-V</i> Intr.	<i>a/ya/wa</i> N Nom S	<i>tu</i> N Obl E		<i>(tu/ta/sa</i> N)
PATTERN 3: <i>V-an(-agreement)</i> Tr.	<i>ni/na</i> N Gen A	<i>a/ya/wa</i> N Nom O		<i>(tu/ta/sa</i> N)

In addition to an ergative case-marking system, Kavalan also exhibits an ergative agreement system. Based on the discussion in 4.4.3.2, we find that in Kavalan, verbs can optionally agree with the A of a transitive clause in person and number, but not with the S of an intransitive verb nor with the O of a transitive verb. This suggests that Kavalan has an ergative agreement system.

Because Kavalan shows ergativity in both its nominal case-marking system and in its verbal agreement system, we can conclude that Kavalan has a pure ergative actancy system.

4.6 “SYNTACTIC ERGATIVITY”

In previous sections, I have shown that evidence from the nominal case-marking system and the verbal agreement system suggest that an ergative analysis is a better analysis of Kavalan transitivity than other proposed analyses. Beside, I have also demonstrated that semantic evidence converges with morphosyntactic evidence in this

conclusion. Based on the morphosyntactic and semantic evidence, I suggest that Kavalan is best analyzed as having a pure ergative actancy structure. In this section, I discuss syntactic processes that support an ergative analysis of the Kavalan actancy structure. The discussion here focuses on the interpretation of quantificational predicates, although other syntactic processes are also mentioned if relevant.

As discussed in chapter 2, the term “ergativity”, in addition to its original use in a “morphological” sense, has often been expanded to be used in a “syntactic” sense, which refers to the grouping of core NPs in terms of their (in)ability to undergo syntactic processes. It is commonly claimed that languages exhibiting syntactic ergativity also exhibit morphological ergativity, but languages exhibiting morphological ergativity do NOT always exhibit syntactic ergativity (Dixon 1979:125; Dixon 1994:172, 177; Manning 1996:70).²³ If such a claim is true, then syntactic processes can provide us with further evidence for supporting an ergative analysis of Kavalan actancy structure.

Li (1996a:97) observes that only focus NPs (i.e., nominative-marked NPs) can be relativized in Kavalan. More specifically, only the nominative-marked agent (i.e., S in my analysis) can be relativized in a monadic *-um-/(-)m-* clause and a dyadic *-um-/(-)m-* clause, and only the nominative-marked theme/location (i.e., O in my analysis) can be relativized in a dyadic *-an* clause. Based on the fact that S and O can be relativized, but A cannot, we can conclude that Kavalan exhibits “syntactic ergativity”.

²³ Dixon (1994:172) states “No language is known that is ergative at the syntactic but not at the morphological level.”

Y. L. Chang (1997) observes that only “subjects” (i.e., nominative-marked NPs) can undergo syntactic processes such as relativization, *wh*-clefting,²⁴ quantifier floating, etc. The fact that S and O can participate in these syntactic processes but A cannot supports an ergative analysis of Kavalan actancy structure.

In my textual analysis, I observe that the interpretation of quantificational predicates exhibits the grouping of S/O. In Kavalan, quantificational expressions (often referred to as “quantifiers” in the literature) are syntactically either verbs or nouns. The quantificational expression *niz* ‘all’ is syntactically a VERB. Like many lexical verbs, the form *niz* ‘all’ has two derivationally related forms *mniz* and *nizan*. Like other dyadic *-an* verbs, the form *nizan* has a derivationally related form *nizana*, which agrees with the agent (A) of dyadic *-an* clauses in person and number features.

The interpretation of the form *mniz* can only be associated with the S of an intransitive clause, whereas the interpretation of the form *nizana* can only be associated with the O, rather than the A, of a transitive clause, as shown in (86)–(87).

(86) quantificational predicate associating with the S:

qanana *razat* *tayan* *nani* *mniz=ti* *mpatay*.
eat.3S/P person[GEN] there subsequently all=PRF die

‘The people there ate it, consequently/subsequently, they *all* died.’ (Kav.5-018)

(87) quantificational predicate associating with the O, rather than the A:

a. *nizana* *qaqa=na* *kmutun*.
all.3S/P elder.sibling(s)=GEN.3S/P chop.down

‘Her brother finished off them entirely by chopping down.’ [‘Her brother chopped down *all* (markers that Abas made).’] (Kav.3-024)

²⁴ In Kavalan, two strategies are employed in *wh* question formation: (i) *wh*-cleft, and (ii) *wh*-in situ. The formation of *wh* question from nominative-marked NPs (S and O in my analysis) makes use of the *wh*-cleft strategy. However, the formation of *wh* question from other elements makes use of the *wh*-in situ strategy.

- b. *nizana* *muʔtung* a kin*Rasibuʔ*.
 all.ʔ3S/P kill NOM [+PRSN].hundred
 ‘They (the Kavalan) entirely finished off/demolished the one hundred (soldiers) by killing.’ (‘They killed *all* one hundred soldiers.’) (Kav.7-010)
- c. *nizana* *skizaya* *muʔtung*.
 all.ʔ3S/P Skizaya.Amis kill
 ‘The Skizaya Amis entirely finished off/demolished them by killing.’ (‘The Skizaya Amis killed *all* (of the fifty people of that boat).’) (Kav.4-055)

Another quantificational expression *qangima* ‘all’ is syntactically a NOUN. Like nouns as well as verbs, when functioning as a predicate, *qangima* ‘all’ attracts clitics, as in (88). However, unlike verbs (including the verbal quantificational expression *niz* ‘all’), *qangima* ‘all’ does NOT have any derivationally related form containing the formatives *m-* or *-an*. Moreover, it does NOT carry any agreement form. As shown in (89), the agreement form *-ta* occurs with the main lexical verb *ʔtungan* ‘kill’, rather than with *qangima* ‘all’.

Like the other quantificational expression, the interpretation of *qangima* ‘all’ can only be associated with the S of an intransitive clause and with the O, rather than the A, of a transitive clause, as shown in (88)–(89).

(88) quantificational expression associating with the S:

tu *qangima*=ita mati ta Taiwan.
 FUT? all=NOM.1PI go LCV Taiwan
 ‘Let’s *all* go to Taiwan.’ (Kav.5-005)

(89) quantificational expression associating with the O, rather than the A:

- a. *qangima* ʔtunganta ya zitpun.
 all kill.ʔ1PI NOM Japanese
 ‘We (in.) will kill *all* the Japanese.’ (Kav.11-002)

- b. *qangima* ?tungantaka!
 all kill.?1PL.IMP
 ‘Let’s kill them *all!*’ (Kav.5-013)

The fact that quantificational expressions can only be associated with the S of an intransitive clause and the O of a transitive clause provides us with further support for the ergative analysis of Kavalan transitive and actancy structures.

4.7 CONCLUSION

In this chapter, I have re-examined Kavalan clause structures in terms of morphosyntactic and semantic criteria. Three questions have been answered.

First, is the Kavalan form *tu* an accusative case marker?

As shown in 4.3.1.3.3, the form *tu* can mark NPs with a wide range of grammatical functions, and is best analyzed as an OBLIQUE case marker rather than an accusative case marker.

Second, what constitutes the canonical transitive construction in Kavalan?

As shown in 4.4, based on the morphosyntactic and semantic properties that Kavalan clauses exhibit, we can conclude that there is only one canonical transitive construction, that found in two-argument *-an* clauses. The two-argument *-um-/(-)m-* clauses, commonly analyzed as canonical transitives in most previous analyses, are treated as extended intransitives or pseudo-transitives, a type of intransitive clause.

Third, what kind of actancy structure does Kavalan have (accusative, ergative, or split ergative)?

Based on the discussion in sections 4.3.1.3 and 4.4, we can observe that the S of an intransitive clause and the O of a transitive clause have the same morphological marking (for full noun phrases) or morphological shape (for pronouns), whereas the A of a transitive clause has a distinct morphological marking or morphological shape. This suggests that Kavalan has a pure ergative case-marking system. Moreover, in sections 4.3.2.2 and 4.4.3.2, I have demonstrated that in Kavalan, verbs can optionally agree with the A of a transitive clause in person and number, but not with the S of an intransitive verb nor with the O of a transitive verb. This suggests that Kavalan has an ergative agreement system.

Because Kavalan shows ergativity in both its nominal case-marking system and in its verbal agreement system, we can conclude that Kavalan has a pure ergative actancy system.

In addition to having an ergative actancy system, Kavalan also exhibits so-called “syntactic ergativity”. As discussed in section 4.6, a number of syntactic processes, such as the behavior of quantificational predicates, exhibits the grouping of S and O. Based on the cross-linguistic observation that “syntactic ergativity” entails “morphological ergativity,” the existence of syntactic ergativity provides a further piece of evidence for supporting the ergative analysis of Kavalan clause structures.

CHAPTER 5

TRANSITIVITY AND ERGATIVITY IN ATAYAL

5.1 INTRODUCTION

Atayal is an Austronesian language spoken by some 63,000 speakers in the northern mountain area of Taiwan, stretching through eight prefectures: Taipei, Taoyuan, Hsinchu, Miaoli, Taichung, Nantou, Hualien, and Ilan (<http://www.ethnologue.com>). It has been classified as a member of the Atayalic primary subgroup of the Austronesian language family (Blust 1977, 1999a). Two major dialects are found in Atayal Proper: Squliq and Cʔuliʔ. The Squliq variant is more prestigious and innovative, but less divergent than the Cʔuliʔ variant. Because I only have access to Squliq texts, the discussion in this chapter will be based on the Squliq dialect spoken in Wulai, Taipei Prefecture.

Compared with other Formosan languages, Atayal is relatively well-described.¹ However, compared with other Austronesian languages (such as Tagalog), our understanding of Atayal is still rather limited. There are still many basic aspects of Atayal structure (such as the relative order of pronominals, the categorical status of the so-called pronominal “case markers”, etc.) that are not properly characterized in previous studies.

¹ Elizabeth Zeitoun, a researcher at the Institute of Linguistics (Preparatory Office), Academic Sinica, has been developing on-line search databases that will enable one to browse works that have been done on Atayal and other Formosan languages. Please refer to Zeitoun et al. (2003) for a brief description of the Formosan Language Archive.

This chapter re-examines Atayal clause structures from a broad typological perspective and determines the canonical transitive construction and actancy structure of Atayal based on morphosyntactic and semantic criteria. Four major questions will be answered here. First, what are the constraints that condition the relative order of pronouns? Second, are the pronominal monosyllabic forms determiners or nouns in Atayal? Third, what constitutes the transitive construction in Atayal? Fourth, what kind of actancy structure does Atayal have (accusative, ergative, or split ergative)? In order to answer these questions, some basic linguistic facts about Atayal will be provided.

This chapter is organized as follows. Section 5.2 discusses word order in Atayal. Section 5.3 deals with construction markers and the case-marking system in Atayal. Section 5.4 discusses transitivity in Atayal clause structure. Section 5.5 argues that Atayal is best analyzed as having a pure ergative actancy structure. Section 5.6 summarizes the discussion in this chapter.

5.2 WORD ORDER

In this section, I discuss word order in Atayal. The discussion of word order is divided into five parts: (1) the order of full noun phrases, (2) the order of pronouns, (3) the order of elements in possessive constructions, (4) word order in topicalized sentences, and (5) summary.

5.2.1 The Order of Full Noun Phrases

In this section, the relative order of predicates and full noun phrases is discussed. The relative order of predicates and pronouns will be discussed in section 5.2.2.

Squliq Atayal is a right-branching, predicate-initial language. In Squliq Atayal, predicates can be either verbal or nonverbal. In a nonverbal clause, a nonverbal predicate occurs in clause-initial position. As shown in (1), a predicate nominal occurs clause initially and is followed by a nominative full NP.²

- (1) nominal clause: NP (Predicate) NP (Nominative)

qutux	knerin	qani	uzi	ga?
one	woman	this	too	GA?
PREDICATE		NOMINATIVE		

‘This (story) is also about a woman.’ (Ata S1–001)

Verbal clauses can be headed by either an auxiliary verb or a lexical verb. In a pragmatically unmarked verbal clause, the main verbal predicate precedes ALL other elements (e.g., noun phrases, dependent verbs, adverbs, etc.), as in (2) and (3).

- (2) verbal clause headed by an existential verb: **Exist *qu?* NP**

<i>maki</i>	qu?	wagyaq	nqu?	rgyax	ru?	<i>maki</i>	uruw	lloyong.
EXIST	QU?	high	LIG	mountain	and	EXIST	valley	river

‘There are high mountains and there are deep river valley.’ (Ata 6–030)

² The nominative full NP has been assumed to be optionally marked by the “nominative” case marker, particle, or determiner *qu?* (Huang 1993; Huang et al. 1998; Li 1997; Rau 1992, 1997; Starosta 1999; etc.). However, as I will demonstrate in 5.3.1.3.1, nominative full NPs are in fact UNMARKED rather than optionally marked by *qu?*. Moreover, the form *qu?* is NOT a “nominative” case marker or determiner, but a semantically empty “auxiliary noun” with a [+ extension] feature.

(3) verbal clause headed by an aspectual auxiliary: **Asp Neg.Exist *qu?* NP**

...nyux **ungat** *qu?* *tuqi=nha?*
 PROX.IMPRF NEG.EXIST QU? road=GEN.3P

‘...There is no road for them.’ (Ata 1-032)

In clauses that contain more than one verbal predicate, the first verbal predicate in the string of verbal predicates is considered to be the main verbal predicate. That is, in clauses containing both one (or more) auxiliary verb and a lexical verb,³ the first auxiliary in the string is the main verbal predicate, all other verbal predicates (including other auxiliary and the lexical verb) are all dependent verb(s). Lexical verbs are eligible to be the main verbal predicate of a clause IF AND ONLY IF there is NO auxiliary verb in the same clause.

In clauses that take more than one verbal predicate, the main predicate (i.e., an auxiliary) occurs clause initially and is first followed by other auxiliaries and then by a lexical verb, which in turn is followed by NPs, as in (4)–(8). In this type of verbal clause, the following ordering constraint is observed:

- **Aspectual Aux—Negative Aux—Modal Aux—*musa?/wahi*—lexical verb NP**

As shown in (6), when a negative auxiliary (*ini?*), a modal auxiliary (*((q)baq* ‘can’, *thoyay* ‘can/be able to’, etc.), and a lexical verb cooccur, the main verbal predicate of the clause is the negative auxiliary *ini?*, and all other verbal predicates are dependent verbs. Therefore, in this type of verbal clauses, the negative auxiliary occurs clauses initially

³ Elements that are called “auxiliary verbs” here are often referred to as “quasi verbs”, “preverbs”, “verb particles”, or “modal adverbs” in the literature (Egerod 1965, 1978; Huang 1989, 1993; etc.).

and is first followed by a modal auxiliary and then by a lexical verb, which in turn is followed by NPs.

In verbal clauses containing an aspectual auxiliary (such as *cyux* ‘distal imperfective’, *nyux* ‘proximal imperfective’, *wan* ‘perfective’, etc.) and other verbal predicates (including negative auxiliary, modal auxiliary, lexical verbs, etc.), the main verbal predicate of the clause is the aspectual auxiliary. Therefore, in this type of verbal clause, an aspectual auxiliary occurs clause initially and is first followed by a negative auxiliary, a modal auxiliary and then by a lexical verb, which in turn is followed by NPs, as in (3), (4), (7), and (8).

Whether a verbal clause is headed by an auxiliary verb or a lexical verb, it does not affect the ordering of full NPs (and of free form pronouns), but it does affect the ordering of clitic pronouns. As shown in (4), (6), and (8), although these verbal clauses are headed by an auxiliary verb rather than a lexical verb (often referred to as the main verb), the full NPs still occur after (but not necessarily immediately after) the LEXICAL VERB. However, in clauses headed by an auxiliary verb, if the NPs involved are pronominal clitics, they are expected to occur IMMEDIATELY AFTER the MAIN PREDICATE (i.e., the FIRST AUXILIARY) rather than the lexical verb, as in (5) and (7).

(4) verbal clause headed by an aspectual auxiliary: **Asp m-V NP**

...kwara? nanu? *cyux* *qmihut* kwara? tuqiy son qasa.
 all what DIST.IMPRF hinder all road become that

‘...many other things to hinder them from going.’ (Ata 1–024)

- (5) verbal clause headed by a negative auxiliary verb: **Neg=Gen V-i -m-V**

ini?=nha? **wahi smzey.**

NEG=GEN.3P come propose.marriage

‘No one would come to propose a marriage.’ (Ata 3–025)

- (6) verbal clause headed by a negative auxiliary verb: **Neg(=Nom) Modal V NP (Lcv)**

- a. *...ini?* **qbaq krayas** qu? hongu? qani uzi....
NEG can pass/cross.over QU? bridge this too

‘...she cannot even cross over this bridge either....’ (Ata 1–031)

- b. *...ini?* **qbaq powah** hongu? qani.
NEG can cross.over bridge this

‘...he cannot cross over this bridge.’ (Ata 1–022)

- c. *ini?* **thoyay tehok** squ? tayuh.tuhan.kayan.
NEG can arrive LCV heaven

‘They cannot arrive at Heaven.’ (Ata 1–026)

- d. *...ini?* **qbaq musa?** ngasan squliq.
NEG can go family person

‘...she will not get married.’ (Lit., ‘...she cannot become a family person.’) (Ata 3–024)

- (7) verbal clause headed by an aspectual auxiliary verb: **Asp=Gen Neg V-i**

nyux=maku? **ini? baqi** iyan....

PROX.IMPRF=GEN.IS NEG know a.little

‘(Though) I don’t know it....’ (Ata 5–007; Ata 6–005)

- (8) verbal clause headed by an aspectual auxiliary verb: **Asp *si* V-i; Asp *si* V NP; Asp *m*-V**

yaqih utux hiya? ga?, nanu?.yasa.qu?, mqwas qutux siliq
 bad luck 3S(CORE) TP.LK therefore sing one siliq
 kahun babaw tuqi qani ga?, syeq wan si uci, wan
 come.from above road this TP.LK SYEQ PERF directly do PERF
 si krayas qu? tuqi lga?, gani ga?, nyux hmtwi ma.
 directly cross.over QU? road LGA? this TP.LK PROX.IMPRF stop QUOT

‘As for bad luck, it is that, therefore, one *siliq* bird sings, flies over the road (with the noise) ‘*syeq*’, crosses the road from right to left. As for this, it will stop us from going (seems to tell us not to go on)’ (Ata 2–007)

Having discussed the relative order between various types of verbal predicates and NPs, I turn to the discussion of the relative order between verbal predicates and full NPs in various verbal clause patterns.

Three major verbal clause patterns are found in Squaliq Atayal: (i) Pattern 1: monadic ((-)m-) intransitive clauses, (ii) Pattern 2: dyadic ((-)m-) clauses, and (iii) Pattern 3: (a) dyadic –un clauses, (b) dyadic –an clauses, and (c) dyadic s- clauses.⁴ In pattern 1, the lexical verbs are either morphologically unmarked or have the morphological shape (-)m-. In pattern 2, the dyadic lexical verbs, like the monadic lexical verbs in pattern 1, are also either morphologically unmarked or have the morphological shape (-)m-.⁵ In patterns 3a–3c, the dyadic lexical verbs have the morphological shape –un, –an, and s–, respectively.

⁴ The formative –un is a reflex of PAN *-en, the formative –an is a reflex of PAN *-an, and the formative s- is probably a reflex of PAN *Si- (or *Sa-).

⁵ To make the identification of clause patterns easier, monadic and dyadic lexical verbs in pattern 1 and pattern 2, when morphologically unmarked, are referred to as monadic (-m-) verbs and dyadic (-m-) verb, respectively in the discussion.

In pattern 1 (a monadic intransitive clause), if a monadic intransitive verb functions as the main verbal predicate, it will occur clause initially and is followed by an unmarked nominative full NP, as in (9)

(9) monadic *-m-* clause with one full NP: ***-m-V NP (Nom)***

- a. *kman lawa mha, aw pqzway=simu aki=mamu baqun.*
 say Lawa mha OK tell=NOM.2P FUT=GEN.2P know

‘Lawa then said, “OK, let me tell you (pl.), so you (pl.) will know (it).”’ (Ata S1–040)

- b. ...*mwah qutux pswiy ŋarux.*
 come one male bear

‘...then a male bear came.’ (Ata S1–041)

If a monadic intransitive verb functions as a dependent verb of an auxiliary predicate, the main auxiliary predicate will occur clause initially and will be followed (by other auxiliary verbs and) by the lexical verb, which in turn is followed by an unmarked nominative full NP, as in (10).

(10) monadic *m-* clause with one full NP: ***si ŋyut m-V NP (Nom)***

- yasa qu? qsya? ga?, si ŋyut mbhoyaw qu? qsya?....*
 that LIG water TP.LK actually/just gradually increase QU? water

‘As for that water, the water actually gradually increased.’ (Ata 6–013)

In clauses containing two or more arguments, that is, pattern 2 and patterns 3a–3c clauses, the preferred word order is NOMINATIVE LAST;⁶ that is, the nominative NP is preferred to occur clause finally. In the Wulai dialect of Squliq Atayal, word order is rather rigid. Full NPs are often not (although they can be) overtly marked by any case-

⁶ More accurately, “Nominative last” refers to the nominative NP being the last NP in a clause. Nominative NPs actually can be followed by adverbs and/or discourse markers.

marking prenominal elements.⁷ Consequently, it is crucial to rely on word order to determine the grammatical functions of NPs.

In pattern 2 (a dyadic (-)*m*- clause), if a dyadic (-)*m*- verb functions as the main verbal predicate, it will occur clause initially and is first followed by a locative NP, and then by a nominative NP, as in (11)a. An alternative word order with the nominative NP preceding the locative NP is prohibited when neither NP is overtly case-marked by any prenominal elements, as in (11)b.

(11) Nominative last vs. Locative last (data from Huang 1993:11):

- a. dyadic *-m*- clause with two full NPs: *-m-V* NP (Lcv) NP (Nom) [**Nominative last**]

<i>tmtu</i>	<i>tali</i>	<i>qhuniq.</i>
crush	Tali	tree
<i>M-V</i>	LCV	NOM
	THEME	AGENT

‘A tree crushed Tali.’

- b. dyadic *-m*- clause with two full NPs: *-m-V* NP (Nom) NP (Lcv) [****Locative last**]

**tmtu	<i>qhuniq</i>	<i>tali.</i>
crush	tree	Tali
<i>M-V</i>	NOM	LCV
	THEME	AGENT

‘A tree crushed Tali.’

If a dyadic (-)*m*- verb functions as a dependent verb of an auxiliary predicate, the main auxiliary predicate will occur clause initially and will be followed (by other auxiliary verbs and) by the lexical verb, which in turn is followed by a locative NP and then by a nominative NP, as in (12)a. Again, an alternative word order with the

⁷ Huang (1993:56; 1994:142) comments that in the Wulai dialect of Atayal nowadays, the prenominal markers are seldom used by the younger generation.

nominative NP preceding the locative NP is NOT permitted when neither NP is NOT overtly case-marked by any pronominal elements, as in (12)b. Notice that *sayun* ‘Sayun’, occurring clause finally, can only be interpreted as a nominative NP and *tali* ‘Tali’ can only be interpreted as a locative NP in (12)b. If we reverse the interpretation of these two NPs by considering *sayun* ‘Sayun’ as a locative NP and *tali* ‘Tali’ as a nominative NP, the resulting sentence is ungrammatical.

(12) Nominative last vs. Locative last (data from Huang 1993:11):

- a. dyadic *m*- clause with two full NPs: Asp *m*-V NP (Lcv) NP (Nom) [Nominative last]

cyux	<i>mita?</i>	sayun	<i>tali.</i>
DIST.IMPRF	see	Sayun	Tali
ASP	M-V	LCV	NOM
		THEME	AGENT

‘Tali is watching Sayun.’

- b. dyadic *m*- clause with two full NPs: Asp *m*-V NP (Lcv) NP (Nom) [****Asp *m*-V NP (Nom) NP (Lcv)**]

cyux	<i>mita?</i>	tali	<i>sayun.</i>
DIST.IMPRF	see	Tali	Sayun
ASP	M-V	LCV	NOM
		THEME	AGENT

‘Sayun is watching Tali.’, but NOT ‘Tali is watching Sayun.’

In a dyadic (-)*m*- clause that contains a full NP and a pronominal clitic, regardless of being headed by an auxiliary verb or by a lexical verb, the only full NP in the clause always occur after the dyadic (-)*m*- verb, as in (13)–(14). In Squiliq Atayal, the third person singular/plural nominative pronouns are phonologically null. Therefore, only one overt NP (i.e., the locative NP) is found in (13)–(14). In examples that contain a third

person singular or plural nominative pronoun, I use the notation “(=Nom)” to indicate the position where a nominative pronominal clitic normally occurs.

- (13) dyadic *m*- clause with one full NP and one (clitic) pronominal NP: **Asp(=Nom)**
***m*-V NP (Lcv)**

<i>...nyux</i>	<i>maras</i>	<i>psaniq</i>	<i>nqu?</i>	<i>zyaw</i>	<i>ga?</i>
PROX.IMPRF	bring	shame	LIG	thing	GA?
ASP(=NOM)	M-V	LCV			
AUX(=AGENT)		THEME			

‘...if they have brought shame.’ (Ata 5–013)

- (14) dyadic *m*- clause with one full NP and one (clitic) pronominal NP: **V(=Nom)**
***m*-V NP (Lcv)**

<i>ktan</i>	<i>ga?</i>	<i>nyan</i>	<i>maras</i>	<i>qutux</i>	<i>qu?</i>	<i>laqi?</i>
see	GA?	come	carry	one	LIG	child
		V(=NOM)	M-V	LCV		
		V(=AGENT)		THEME		

‘(When they) saw her, (they noticed that) she was carrying a child.’ (Ata S1–035)

As already shown in (11)–(14), regardless of being headed by an auxiliary or a lexical dyadic (-)*m*- verb, full NPs in pattern 2 (a dyadic (-)*m*- clause) always occur after the dyadic (-)*m*- verb.

Having discussed the word order for full NPs in monadic and dyadic (-)*m*- clauses, I turn to the discussion of word order of full NPs in patterns 3a–3c (dyadic –*un* clauses, dyadic –*an* clauses, and dyadic *s*- clauses).

Like (pattern 2) dyadic (-)*m*- clauses, word order is also rather rigid in patterns 3a–3c (dyadic –*un* clauses, dyadic –*an* clauses, and dyadic *s*- clauses). Like pattern 2, the preferred word order in patterns 3a–3c is also NOMINATIVE LAST; that is, the nominative NP is preferred to occur clause finally.

In patterns 3a–3c (dyadic *-un* clauses, dyadic *-an* clauses, and dyadic *s-* clauses), if a dyadic *-un* verb, dyadic *-an* verb, or dyadic *s-* verb functions as the main verbal predicate, it will occur clause initially and is first followed by an agentive genitive NP, and then by a nonagentive nominative NP, as in (15)–(16)a, (17)a, and (18)a. An alternative word order with the nominative NP preceding the genitive NP is permitted only if the NP is case-marked, as in (18)b.

Comparing (18)b with (16)b and (17)b, we find that the genitive agent NP is case-marked by *na?* in (18)b; therefore, the grammatical functions of the two NPs in the sentence can be easily distinguished. Consequently, the alternative word order with the nominative NP preceding the genitive is permitted. However, in (16)b and (17)b, neither NP is case-marked by any prenominal elements; therefore, it is crucial to use word order to distinguish the grammatical functions of the two NPs. Consequently, the alternative word order with the nominative NP preceding the genitive NP is NOT permitted.

(15) dyadic *-un* clause with two full NPs: **V-*un* NP (Gen) NP (Nom) [Nominative last]**

... <i>inaras</i>	<i>lawa</i>	<i>laqi?</i>	<i>ɣarux</i>	<i>qasa....</i> ⁸
carry	Lawa	child	bear	that
V-UN	GEN	NOM		
	AGENT	THEME		

‘...Lawa brought that bear’s son back....’ (Ata S1–40)

⁸ The perfective aspect of dyadic *-un* verbs has a morphological shape *-in-* (rather than the nonoccurring form ***-in- -un*).

(16) Nominative last vs. Genitive last (data from Huang 1993:12):

- a. dyadic *-un* clause with two full NPs: **V-*un* NP (Gen) NP (Nom) [Nominative last]**

tʔun qhuniq *tali*.
 crush tree Tali
 V-UN GEN NOM
 AGENT THEME

‘The tree will crush Tali.’

- b. dyadic *-un* clause with two full NPs: **V-*un* NP (Nom) NP (Gen) [**Genitive last]**

***tʔun* *tali* qhuniq.
 crush Tali tree
 V-AN NOM GEN
 THEME AGENT

‘The tree will crush Tali.’

(17) Nominative last vs. Genitive last (data from Huang 1993:11–12):

- a. dyadic *-an* clause with two full NPs: **V-*an* NP (Gen) NP (Nom) [Nominative last]**

tʔan qhuniq *tali*.
 crush tree Tali
 V-AN GEN NOM
 AGENT THEME

‘The tree crushed Tali.’

- b. dyadic *-an* clause with two full NPs: **V-*an* NP (Nom) NP (Gen) [**Genitive last]**

***tʔan* *tali* qhuniq.
 crush Tali tree
 V-AN NOM GEN
 THEME AGENT

‘The tree crushed Tali.’

(18) Nominative last vs. Genitive last (data from Huang 1993:57):

- a. dyadic *-an* clause with two full NPs: **V-*an* NP (Gen) NP (Nom) Adv [Nominative last]**

<i>binhiyan</i>	<i>na?</i>	sayun	<i>tali</i>	<i>hira?</i>
beat	GEN	Sayun	Tali	yesterday
V-AN	GEN		NOM	
	AGENT		THEME	

‘Sayun beat Tali yesterday.’

- b. dyadic *-an* clause with two full NPs: **V-*an* NP (Nom) NP (Gen) [Genitive last is permitted because it is case-marked.]**

<i>binhiyan</i>	<i>tali</i>	<i>na?</i>	sayun	<i>hira?</i>
beat	Tali	GEN	Sayun	yesterday
V-AN	NOM	GEN		
	THEME	AGENT		

‘Sayun beat Tali yesterday.’

In a dyadic *-un* clause, dyadic *-an* clause, or dyadic *s-* clause that contains a full NP and a pronominal clitic, regardless of being headed by an auxiliary verb or by a lexical verb, the only full NP in the clause always occur after the dyadic *-un* verb, dyadic *-an* verb, or dyadic *s-* verb, as in (19)–(21). As mentioned previously, the third person singular/plural nominative pronouns are phonologically null in Sqliq Atayal. Therefore, only one overt NP (i.e., the genitive NP) is found in (19). Again, I use the notation “(=Nom)” to indicate the position where a third singular nominative pronominal clitic normally occurs in this example.

- (19) dyadic *-un* clause with one full NP and one (clitic) pronominal NP: **V=Gen Asp(=Nom) V-*un* NP (Gen)**

...yan=nha?	<i>wan</i>	<i>niqun</i>	<i>na?</i>	<i>ɲarux...</i>
regard=GEN.3P	PRF	eat	GEN	bear
V=GEN	AUX(=NOM)	V-UN	GEN	
V=THEME			AGENT	

‘...they thought that the bear had eaten her...’ (Ata S1–034)

- (20) dyadic *-un* clause with one full NP and one (clitic) pronominal NP: **V-*un*=Gen Adv NP (Nom)**

...*syun=nya?* *kya qu? knerin qasa....*
 put=GEN.3S there QU? woman that
 V-UN=GEN NOM
 V=AGENT THEME

‘...it put the woman there....’(Ata S1–011)

- (21) dyadic *-an* clause with one full NP and one (clitic) pronominal NP: **V-*an*=Gen NP (Nom)**

...*pinonjan=su?* *zyaw na? mhwah hupa? qsya?....*
 hear=GEN.2S thing LIG flow big water
 V-AN=GEN NOM
 V=AGENT THEME

‘...You (sg.) heard things regarding the big water....’ (Ata 6–002)

Having discussed the order of full NPs in three major verbal clause patterns, I turn to the discussion of the order of pronouns in 5.2.2.

5.2.2 The Order of Pronouns

Compared to the order of full NPs, the order of pronouns is somewhat more complicated.

In Squiliq Atayal, pronouns can be divided into two types: clitic pronouns and free form pronouns. These two types of pronouns differ in their syntactic distribution. Clitic pronouns are phonologically attached to the main predicate of a clause, whereas free form pronouns occur after (but not necessarily immediately after) a lexical verb. When the main predicate of a clause is a lexical verb, a clitic pronoun is attached to the lexical predicate, as in (22)–(27). When the main predicate of a clause is an auxiliary verb, a

clitic pronoun is attached to the main auxiliary predicate, rather than the lexical verb, as in (28)–(31).

- (22) lexical verb as the main predicate: **V=Nom NP (Lcv)**

baha.mswa? krayas=*ta?* hoŋu? qani ga?,...
 because cross.over=NOM.1PI bridge this TP.LK

‘Because we (in.) cross over this bridge,...’ (Ata 1–017)

- (23) lexical verb as the main predicate: **V-un=Gen NP (Nom)**

galun=*nha?* qu? sazing qani ru? hblan=*nha?*...
 take=GEN.3P QU? two this and tie=GEN.3P

‘They brought these two and tied them.’ (Ata 6–26)

- (24) lexical verb as the main predicate: **V-un=Gen Adv NP (Nom)**

...syun=*nya?* kya qu? knerin qasa....
 put=GEN.3S there QU? woman that

‘...it put the woman there....’ (Ata S1–011)

- (25) lexical verb as the main predicate: **V-an=Gen(=Nom) NP (Obl)**

blingan=*nha?* yaqih na? mlikuy, knerin....⁹
 throw.into=GEN.3P bad LIG man woman

‘After after they threw the bad woman and the bad man into it (the water),....’
 (Ata 6–021)

- (26) lexical verb as the main predicate: **V-an=Gen NP (Nom)**

...pinonjan=*su?* zyaw na? mhwah hupa? qsya?....
 hear=GEN.2S thing LIG flow big water

‘...You (sg.) heard about the big water....’ (Ata 6–002)

⁹ In this example, the nominative NP is a third person singular nominative pronoun (which is phonologically null in Atayal), and the noun phrase *yaqih na? mlikuy, knerin* ‘the bad man and the bad woman’ functions as an oblique NP.

- (27) lexical verb as the main predicate: **V-un=Gen s-V NP (Nom)**

...rasun=*nya?* spqaniq knerin qani....
 carry=GEN.3S CAUS.eat woman this

‘...it brought it to feed this woman.’ (Ata S1–013)

- (28) modal auxiliary as the main predicate: **Modal=Nom -m-V**

...baq=*ta?* tminun.
 can=NOM.1PI weave

‘...We (in.) can weave.’ (Ata 1–028)

- (29) aspectual auxiliary as the main predicate: **Asp=Nom V**

...nyux=*ta?* t?wayay....
 PROX.IMPRF=NOM.1PI thread

‘...We (in.) will thread....’ (Ata 1–028)

- (30) aspectual auxiliary as the main predicate: **Asp=Nom Modal m-V**

...nyux=*simu* thoyay mqyanux
 PROX.IMPRF=NOM.2P be.able.to live

‘...you (pl.) could live well.’ (Ata 6–010)

- (31) aspectual auxiliary as the main predicate:

yat qani nyux=*nya?* pqasun....
 NEG this PROX.IMPRF=GEN.3S like

‘This is not what he likes.’ (Ata 6–023)

Comparing the bound pronouns in (22)–(31) with the free form pronouns in (32)–(33), we observe that bound form pronouns can be attached to either a lexical verb or an auxiliary verb as long as it is the main predicate, whereas free form pronouns always occur after (but not necessarily immediately after) a lexical verb.

- (32) aspectual auxiliary as the main predicate: **Asp V NP (core)**

...nyux pcbaq *hiya?*
 PROX.IMPRF teach 3S(CORE)

‘...It seems to instruct (us).’ (Ata 1–003)

(33) aspectual auxiliary as the main predicate: **Asp m-V NP (core)**

...wan mhuqin misuw balay *hiya?* uzi.
 PRF die just true 3S(CORE) too

‘....he himself just died (recently).’ (Ata 5–023)

Having discussed the relative order between predicates and pronouns, I turn to the discussion of the relative order between pronouns.

In previous studies of Squiliq Atayal, the relative order between pronouns is often considered to be SOLELY conditioned by PERSON. For example, Rau (1992:146; 1997:502) proposes that the order of pronominal forms in Atayal follows Silverstein’s (1976) Agency Hierarchy; that is, the order is **1ST PERSON > 2ND PERSON > 3RD PERSON**. Huang (1989:124; 1993:19), however, suggests a different kind of hierarchy: **2ND PERSON > 1ST PERSON > 3RD PERSON**, although she notes that “the exact relationship between the 1st and 2nd Person is not completely clear to us yet....”.

Notice that Rau (1992, 1997) and Huang (1989, 1993) agree with each other in predicting that first person and second person pronouns precede third person pronouns. However, they disagree with each other in their predictions of the relative order between first person pronouns and second person pronouns. The disagreement between Rau’s and Huang’s proposals arises because of the type of data that they examined. Observing the existence of sentences like (34), Rau claims that first person pronouns precede second person pronouns. Noticing the data presented in (34)–(35), Huang proposes that second person pronouns precede first person pronouns.

- (34) dyadic *-an* clauses with two pronominal clitics: **Neg=Nom.1s=Gen.2p**

ini?*=ku?**=momu* bay suwali *musa?* qalaŋ lepa.¹⁰
 NEG=NOM.1S=GEN.2P very permit go village Lepa

‘You (pl.) did not permit me to go to the village of Lepa.’ (data from Y. C. Liao 1990:90; cited in Rau 1992:147)

- (35) relative order between a first person pronoun and a second person pronoun in dyadic *-un* clause (data from Huang 1989:124):

- a. dyadic *-un* clauses with two pronominal clitics: **V-un=Gen.2s=Nom.1s** (rare)

bhiyun=*su?**=saku?*
 beat=GEN.2S=NOM.1S

‘You (sg.) are going to beat me.’

- b. dyadic *-un* clauses with two pronominal clitics: ****V-un=Nom.1s=Gen.2s**

****bhiyun=*saku?**=su?***
 beat=NOM.1S=GEN.2S

‘You (sg.) are going to beat me.’

- c. dyadic *-un* clauses with two pronominal clitics: **V-un=Nom.1s** (frequent)

bhiyun=*saku?*
 beat=NOM.1S

‘You (sg.) are going to beat me.’

Simply looking at the data in (34), we find that a first person nominative pronoun DOES precede a second person genitive pronoun. However, simply looking at the data in (35)a–c, we find that a second person genitive pronoun DOES precede a first person nominative pronoun. It seems that both Rau’s and Huang’s proposals can account for SOME, but NOT ALL, of the pronominal order facts in Atayal. If NEITHER Rau’s proposal NOR Huang’s proposal can FULLY account for the pronominal order facts, what can be used for explaining the relative order between pronouns in Squliq Atayal?

¹⁰ Rau (1992:126, footnote 8) notes that *momu* alternates with *mamu* in the Taichung dialect of Atayal.

In this study, I argue that PERSON alone CANNOT adequately account for the pronominal order facts in Squliq Atayal. Instead, it should be used in conjunction with other constraints. I propose that three constraints are required to account for the order of pronominals in Squliq Atayal.

- (a) Clitic pronouns always precede free form pronouns.
- (b) The relative order between first/second person pronouns and third person pronouns: nominative pronouns always precede genitive pronouns.
- (c) The relative order between first person pronouns and second person pronouns: monosyllabic pronouns precede disyllabic pronouns. [Exception: The “portmanteau pronoun” *misu?*, which represents the combination of a first person singular genitive and a second person singular nominative, must be used in place of the nonoccurring sequences ***maku? su?* and ***su? maku?*.]

First, let us consider Constraint (a): clitic pronouns always precede free form pronouns.

This rule is predictable because of the basic syntactic difference between clitic pronouns and free form pronouns. As previously discussed, clitic pronouns are phonologically attached to the main predicate (either an auxiliary or a lexical verb) of a clause, whereas free form pronouns occur after (but not necessarily immediately after) a lexical verb. (36)–(37) illustrate that the clitic pronouns *nha?* ‘GEN.3P’ and *nya?* ‘GEN.3S’ precede the free form pronouns *hiya?* ‘3S(CORE)’ and *hga* ‘3P(CORE)’, respectively. Notice that the two NPs in both (36) and (37) are both THIRD PERSON pronouns. If we were to rely on PERSON as the sole constraint for determining

pronominal order in Atayal, we would not be able to predict which third person pronoun should come first and which one should come second?

- (36) a clitic pronoun precedes a free form pronoun: **Aux=Gen.3p V-i Dem 3s(core)**

...iniʔ=*nhaʔ* kuci qasa *hiyaʔ*.
 NEG=GEN.3P kill that 3S(CORE)

‘...they would not kill that one, him.’ (Ata 4–024)

- (37) a clitic pronoun precedes a free form pronoun: **Aux=Gen.3s V 3p(core)**

...nyux=*nyaʔ* psina *hga*....
 PROX.IMPRF=GEN.3S request 3P(CORE)

‘...he would like to request something from them....’ (Ata 6–010)

Second, let us consider Constraint (b): between first/second person pronouns and third person pronouns: nominative pronouns always precede genitive pronouns.

Huang (1989, 1993) and Rau (1992, 1997) both consider PERSON as the only factor that conditions the relative order between pronouns. However, a closer look at the Squiliq Atayal data suggests that person interacts with syntactic factors (such as case and grammatical relations) or with phonological factors (such as syllable weight) in conditioning the relative order between first/second person pronouns and third person pronouns, and the relative order between first person pronouns and second person pronouns.

In this study, I consider the order of clitic pronouns, depending on which persons are involved, is conditioned by two different factors, either syntactic or phonological. The relative order between first/second person pronouns and third person clitic pronouns is conditioned by syntactic factors, such as case or grammatical relations. Specifically,

when a first/second person clitic pronoun cooccurs with a third person clitic pronoun, the nominative clitic pronoun always PRECEDES the genitive clitic pronoun. However, the relative order between first person pronouns and second person pronouns is NOT syntactically conditioned. Instead, it is PHONOLOGICALLY conditioned. Specifically, when a first person pronoun cooccurs with a second person pronoun, a monosyllabic clitic pronoun must PRECEDE a disyllabic clitic pronoun. These two constraints are crucial in determining the relative order between first/second person pronouns and third person pronouns and the relative order between first person pronouns and second person pronouns in Squliq Atayal.

Let us first consider the relative order between first/second person pronouns and third person pronouns.

When a first person pronoun (e.g., *taʔ* ‘NOM.1PI’, *kuʔ* ‘NOM.1S’) cooccurs with a third person pronoun (e.g., *nyaʔ* ‘GEN.3S’), the nominative clitic pronoun must PRECEDE the genitive pronoun, as shown in (38)–(40). If the order between the nominative clitic pronoun and the genitive clitic pronoun is reversed, the resulting sentence is unacceptable, as in (41). When a second person pronoun (e.g., *suʔ* ‘NOM.2S’) cooccurs with a third person pronoun (e.g., *nyaʔ* ‘GEN.3S’), the nominative clitic pronoun must PRECEDE the genitive clitic pronoun, as in (42). If the order between the nominative clitic pronoun and the genitive clitic pronoun is reversed, the resulting sentence is unacceptable.

- (38) first person vs. third person: nominative clitic pronoun precedes genitive clitic pronoun:

...tmokun=**ta?**=nya? ru? phoqin=ta? kwara?...
 cover=NOM.1PI=GEN.3S and die=NOM.1PI all

‘...it will cover us (in.) and we (in.) will all die.’ (Ata 6–016)

- (39) first person vs. third person: nominative clitic pronoun precedes genitive clitic pronoun:

qsinuw s?aras=**ku?**=nya? pqaniq.
 wild.animal bring.with=NOM.1S=GEN.3S CAUS.eat

‘Wild animals are what it brought me to feed (me).’ (Ata S1–044)

- (40) first person vs. third person: nominative clitic pronoun precedes genitive clitic pronoun:

nyux=**saku?**=nya? pman.
 PROX.IMPRF=NOM.1S=GEN.3S wash

‘He is washing me.’ (data from Huang 1989:125)

- (41) first person vs. third person: **genitive clitic pronoun precedes nominative clitic pronoun:

nyux=nya?**=saku? pman.
 PROX.IMPRF=GEN.3S=NOM.1S wash

‘He is washing me.’ (data from Huang 1989:125)

- (42) second person vs. third person: nominative clitic pronoun precedes genitive clitic pronoun:

bhiyun=**su?**=nya?
 beat=NOM.2S=GEN.3S

‘He is going to beat you (sg.).’ (data from Huang 1989:123)

- (43) second person vs. third person: **genitive clitic pronoun vs. nominative clitic pronoun:

bhiyun=nya?**=su?
 beat=GEN.3S=NOM.2S

‘He is going to beat you (sg.).’ (data from Huang 1989:123)

Third, let us consider Constraint (c): monosyllabic pronouns precede disyllabic pronouns. As discussed earlier, the relative order between first person pronouns and second person pronouns is conditioned by a phonological factor. That is, when a first person pronoun cooccurs with a second person pronoun, the monosyllabic pronoun must precede the disyllabic pronoun. This constraint is crucial in determining the relative order between first person and second person pronouns.

In this study, I argue that the order of pronominal clitics in Squliq Atayal CANNOT be FULLY account for if one simply look at syntactic factors (such as case, grammatical relations, etc.) and/or semantic factors (such as person, number, etc.). Instead, phonological factors (such as syllable weight) should also be taken into consideration. I propose that the relative order between first person pronouns and second person pronouns in Squliq Atayal is conditioned by SYLLABLE WEIGHT, rather than by grammatical relations, case, or person. More specifically, a MONOSYLLABIC pronoun PRECEDES a DISYLLABIC pronoun. Such an explanation has been proposed by Schachter (1973) to account for the order of clitics in Tagalog, but still has not been employed in the study of Formosan languages. In this study, I explore the role of syllable weight in the determination of pronominal order in Squliq Atayal.

In the study of Tagalog clitic order, Schachter (1973:220) proposes that monosyllabic clitics (including monosyllabic pronouns and monosyllabic adverbials) always precede disyllabic clitics in Tagalog. Schachter's proposal can easily account for the following pairs of Tagalog data. Compared (44)a with (44)b, we find that the monosyllabic pronoun *mo* 'GEN.2S' can only precede the disyllabic pronoun *ako* 'NOM.1S'. Compared

(45)a with (45)b, we find that the monosyllabic question word *ba* can only precede the disyllabic pronoun *ako* ‘NOM.1S’.

(44) Tagalog (Schachter 1973:217)

a. a monosyllabic pronoun precedes a disyllabic pronoun:

Hindi=**mo**=**ako** kapatid.
NEG=GEN.2S=NOM.1S brother/sister

‘You (sg.) are not my brother/sister.’

b. **a disyllabic pronoun precedes a monosyllabic pronoun:

Hindi=ako**=**mo** kapatid.
NEG=NOM.1S=GEN.2S brother/sister

‘You (sg.) are not my brother/sister.’

(45) Tagalog (Schachter 1973:219)

a. a monosyllabic adverb precedes a disyllabic pronoun:

Nakita=**ba**=**ako** ni Juan.
see=Q=NOM.1S GEN Juan

‘Has Juan seen me?’

b. **a disyllabic pronoun precedes a monosyllabic adverb:

Nakita=ako**=**ba** ni Juan.
see=NOM.1S=Q GEN Juan

‘Has Juan seen me?’

If we apply the same phonological constraint to the Squiliq Atayal data presented in (34) and (35), repeated below in (46) and (47), we can easily account for the relative order between first person pronouns and second person pronouns. In (46), the first person singular nominative pronoun *ku?* is required to precede the second person plural genitive pronoun *momu* because *ku?* is monosyllabic and *momu* is disyllabic (but NOT because *ku?* is first person and *momu* is second person, as Rau (1992) claimed).

(46) a monosyllabic pronoun precedes a disyllabic pronoun:

ini?[?]=ku?[?]=*momu* bay suwali *musa?* qalaŋ lepa.
 NEG=NOM.1S=GEN.2P very permit go village Lepa

‘You (pl.) did not permit me to go to the village of Lepa.’ (data from Liao 1990:90; cited in Rau 1992:147)

In (47), the second person singular genitive pronoun *su?* is required to precede the first person singular nominative pronoun *saku?* because *su?* is monosyllabic and *saku?* is disyllabic (but NOT because *su?* is second person and *saku?* is first person, as Huang (1989, 1993) claimed). In (47)a, the disyllabic pronoun *saku?* precedes the monosyllabic pronoun *su?*. This violates the constraint that monosyllabic pronouns must precede disyllabic pronouns. Therefore, the resulting sentence is unacceptable.

Huang (1989) comments that when expressing an event involving a second person singular participant acting upon a first person singular participant, (47)a is acceptable but rarely used. Instead, a pattern like (47)b, in which the monosyllabic second person singular pronoun is elided, is often used. It is not yet clear to me why a pattern like (47)a is acceptable, but less preferable than a pattern like (47)c.¹¹

(47) dyadic *-un* clauses with two pronominal clitics (data from Huang 1989:124):

a. a monosyllabic pronoun precedes a disyllabic pronoun (rare)

bhiyun=*su?*=*saku?*.
 beat=GEN.2S=NOM.1S

‘You (sg.) are going to beat me.’

¹¹ Reid (pers. comm.) suggests that the agent here is probably nonspecific and that it probably means ‘(Someone) will beat me’, or ‘I’m going to get beaten’. If the Agent is there holding a stick, he certainly does not need to be encoded in the speech signal! It is interesting that a similar phenomenon occurs in Bontok with the same verb, *ba?igen daka*. ‘You will get beaten.’, without an explicit agent.

- b. **a disyllabic pronoun precedes a monosyllabic pronoun
 ***bhiyun=saku?=su?*.
 beat=NOM.1S=GEN.2S
 ‘You (sg.) are going to beat me.’
- c. dyadic *-un* clause with one pronominal clitic: **V-*un*=Nom (disyllabic)**
 (frequent)
bhiyun=saku?
 beat=NOM.1S
 ‘(You) are going to beat me.’

An alternative analysis for (47)c is to consider the form *saku?* as a “portmanteau pronoun” with the meaning ‘GEN.2S + NOM.1S’, just like *misu?* ‘GEN.1S + NOM.2S’. Such an analysis can be supported by evidence from Seediq, another Atayalic language. Holmer (1996:32) states that Seediq has three “portmanteau pronouns”: *misu* ‘GEN.1S + NOM.2S’, *saku* ‘GEN.2S + NOM.1S’, and *maku* ‘GEN.1S + NOM.2P’. He considers that *misu* is historically derived from the combination of *mu* ‘GEN.1S’ and *su* ‘NOM/GEN.2S’, and *saku* is historically derived from the combination of *su* ‘GEN/NOM.2S’ and *ku* ‘NOM.1S’. If Holmer’s analysis of the Seediq forms *misu* and *saku* is correct, it might offer us an explanation why (47)a is acceptable, but rarely used.¹²

Alternatively, one might consider that the use of a pattern like (47)c is preferred because it is modeled on the existing form *misu?* ‘GEN.1S+NOM.2S’. In Squiliq Atayal, when one wants to express an event involving a first person singular genitive pronoun and a second person singular nominative pronoun, the “portmanteau pronoun” *misu?*

¹² One major difference between Seediq and Atayal that needs to be pointed out is that Seediq does NOT have a first person singular nominative pronoun *saku*, NOR a first person genitive *maku*. Even if Holmer’s analysis of Seediq *saku* is correct, one still cannot be sure if the Squiliq Atayal form *saku?* in (47)c is simply a first person singular nominative pronoun or a portmanteau pronoun.

‘GEN.1S+NOM.2S’ must be used in place of the nonoccurring sequences ****maku? su?** and ****su? maku?** (Egerod 1966, 1978; Huang 1989, 1993; Rau 1992, 1997). As shown in (48)a–c, when expressing an event that involves a first person singular participant acting upon a second person singular participant, the “portmanteau pronoun” *misu?* ‘GEN.1S+NOM.2S’ is required (as in (48)), whereas the sequences of ****maku? su?** and ****su? maku?** are NOT permitted (as in (48)b–c).

The same constraint is also observed in the Mayrinax dialect of C?uli? Atayal (Huang 1995), but NOT in another Ataylic language Seediq.¹³ A similar kind of constraint is also reported in Tagalog and some other Philippine languages (Schachter 1973). It is not yet clear to me why a “portmanteau pronoun” is preferred in situations that involve a first person singular genitive pronoun and a second person nominative pronoun.

(48) dyadic *-un* clause with first person genitive and second person nominative (data from Huang 1989:124):

a. **V-*un*=*misu?***

bhiyun=***misu?***.

beat=GEN.1S+NOM.2S

‘I am going to beat you (sg.).’

b. ****V-*un*=Gen (disyllabic)=Nom (monosyllabic)**

****bhiyun=*maku?*=*su?***.

beat=GEN.1S=NOM.2S

‘I am going to beat you (sg.).’

¹³ Holmer (1996:70) states that “Portmanteau clitics exist only for a couple of combinations of arguments, and their use is gradually diminishing. For instance, *misu* (1sAG ⇒ 2sPAT) does occur, but it is usually considered archaic and speakers tend to prefer *su mu* (2s.n.—1s.g.) in normal conversation....”

c. ****V-*un*=Nom (monosyllabic)=Gen (disyllabic)**

*****bhiyun=suʔ=makuʔ*.**

beat=NOM.2S=GEN.1S

‘I am going to beat you (sg.).’

5.2.3 The Order of Elements in Possessive Constructions

Having discussed the order of full NPs and pronominal NPs in unmarked sentence structures, I now turn to the discussion of the relative order of elements of noun phrases. In this section, I focus my discussion on the order between possessors and possessed nouns in possessive constructions.

In Atayal, possessive constructions resemble unmarked main clause structures in having the head noun occur before its attribute. In a single possessive construction, the head noun (i.e., the possessed noun) precedes the dependent noun (i.e., the possessor), as in (49)–(53). In a multiple possessive construction, the possessed noun phrase precedes the dependent noun phrases, and each dependent noun phrase can be further divided into a possessed noun followed by a possessor, as in (53)–(54).

One thing to be noted from these examples is that the head-dependent relationship between a possessed noun and its possessor in a possessive construction is primarily determined by WORD ORDER (i.e., head first, then dependent), rather than by CASE. Comparing (49) with (50)–(54), we observe that the possessor in each of the following possessive construction can either be expressed by a Genitive pronoun, as in (52)–(54), or

be case-marked by a Genitive determiner or noun,¹⁴ as in (50)–(51) and (53)–(54).

However, it can also be expressed by a bare noun, as in (49).

(49) single possessive construction: **N (head) [N (possessor)]**

- a. ...kamit=nya? qani ga?, tnaq kamit [yarux]....
 nail=GEN.3S this TP.LK equal nail bear

‘...as for his fingernails, they were like the bear’s claws.’ (Ata S1–052)

- b. ...baq muŋ ke? [tayan]....
 know hear word Atayal

‘...he could understand the Atayal language...’ (Ata S1–037)

(50) single possessive construction: **N [na(Gen) Possessor]**

- ...qalang [na? utux kayan]....
 country GEN god sky

‘...the country of the god/spirit of the sky....’ (Ata 1–018)

(51) single possessive construction: **N [nqu? (Gen) Possessor]**

- ...tehuk qu? bbu? [nqu? rgyax....]
 reach QU? top GEN moutain

‘It reached the top of the mountain.’ (Ata 6–013)

(52) single possessive construction: **N[=Gen]**

- a. ...musa?=ta? mlaw squ? rusa?[=ta?].....
 go=NOM.1PI patrol LCV trap=GEN.1PI

‘...We (in.) go patrol our (in.) traps (i.e., iron nets),....’ (Ata 1–004)

- b. baq sswe?[=nya?].....
 turn.out young.brother=GEN.3S

‘It turned out to be his young brother...’ (Ata 5–20)

¹⁴ See section 5.3.1.3 for a possible analysis of so-called case-marking “determiners” as nouns in Squiliq Atayal.

- (53) single and multiple possessive constructions: N[=Gen]; N [*na?* (Gen) N[=Gen]]

nanu? zyaw na? ptasan hiya?, nanu? **tyqi[=nya?]** ptasan,
 what thing LIG tattoo 3S(CORE) what meaning=GEN.3S tattoo

rqyas [na? mrhuw[=ta?]] raran hiya?
 face GEN ancestor=GEN.1PI before/old.time 3S(CORE)

‘Regarding the thing which is (called) tattoo, what is the meaning of the tattoo on the faces of our (in.) ancestors?’ (Ata 3–001)

- (54) multiple possessive construction: N [*na?* (Gen) N[=Gen]]

...qu? **pinqzywan [na? mrhuw[=ta?]]** raran zyaw na? babaw hoqin....
 QU? legend GEN ancestor=GEN.1PI before thing LIG after die

‘...the legend of our (in.) ancestors about things after death....’ (Ata 1–003)

5.2.4 Word Order in Topicalized sentences

Having discussed the word order of elements in unmarked sentence structures and in possessive constructions, I now turn to the discussion of marked sentence structures.

While the basic word order in clauses is predicate-initial, Atayal has an alternate sentence pattern in which a topic, usually a noun phrase, precedes the predicate. A topic is indicated by its prepredicate position and intervening pause. It can be separated from the rest of a sentence by an optional topic linker *ga?* (cf. (55) and (56)).

- (55) topicalization with the topic linker *ga?*:

mrhuw **ga?**, aki=ta? swayaw qutux qu? betunux balay
 ancestor TP.LK FUT=GEN.1PI choose one LIG handsome/beautiful truly

na? mlikuy ru? betunux balay na? krakis, aki=ta?
 LIG man and handsome/beautiful truly LIG woman FUT=GEN.1PI

sbuling qsya? ma.
 throw.with water QUOT

‘As for the ancestors, it is said, “We (in.) would choose a handsome man and a beautiful woman, and we (in.) would throw them into the water.”’ (Ata 6–024)

(56) topicalization without any topic linker:

yaqih nqu? knerin ru? mlikuy, galun=nha? ru? sbuliŋ=nha?
 bad LIG woman and man take=GEN.3P and throw.with=GEN.3P
 qsya? qasa ma.
 water that QUOT

‘As for the bad woman and man, they took them and threw them into the water.’
 (Ata 6–20)

5.2.5 Summary

Let me summarize the discussion of Squliq Atayal word order in the previous sections. First, Squliq Atayal is basically a right-branching, predicate-initial language. It is often described as having the following exception to this generalization; in a noun phrase, a determiner precedes the head noun. However, as I will demonstrate in section 5.3.1.3, the so-called case-marking “determiners” in Squliq Atayal, like their equivalents in Philippine languages, might in fact be semantically empty “auxiliary nouns” that head the NPs that they are a part of.¹⁵ If the “auxiliary noun” analysis is correct, the branching problem observed in the NP structure disappears.

Second, main predicates (verbal or nonverbal; auxiliary or nonauxiliary) exhibit the following features: (a) they occur clause initially; (b) they attract clitic pronouns.

Third, Squliq Atayal allows a series of auxiliary verbs to occur before a lexical verb. When a string of auxiliary verbs precedes a lexical verb, the first auxiliary in the string is the one that functions as the main predicate of the clause; consequently, it attracts clitic pronouns.

¹⁵ See Reid (2002b) for an analysis of the so-called “determiners” as “auxiliary nouns” in Philippine languages.

Fourth, clitic pronouns differ from free form pronouns (and full NPs) in their syntactic distribution. In verbal clauses headed by an auxiliary verb, clitic pronouns occur IMMEDIATELY AFTER the FIRST AUXILIARY in the clause, whereas free form pronouns (as well as full NPs) occur after (but NOT NECESSARILY immediately after) the LEXICAL VERB.

Fifth, in clauses that involve (at least) two full noun phrases, the Nominative full noun phrase must occur after all other noun phrases, if they are not case-marked by a class of monosyllabic prenominal elements.

Sixth, three major constraints condition the order of pronouns in Squaliq Atayal. (a) Clitic pronouns ALWAYS precede free forms pronouns (as well as full NPs). (b) The relative order between first person/second person clitic pronouns and third person clitic pronouns is syntactically conditioned: nominative pronouns ALWAYS precede genitive pronouns. (c) The relative order between first person clitic pronouns and second person clitic pronouns is phonologically conditioned: monosyllabic clitic pronouns must precede disyllabic clitic pronouns. However, in events that involve a first person singular genitive and a second person nominative, the “portmanteau pronoun” *misu?* ‘GEN.1S+NOM.2S’ must be used in place of the nonoccurring sequences ***maku? su?* and ***su? maku?*.

5.3 CONSTRUCTION MARKERS AND CASE-MARKING SYSTEMS

In this section, I discuss construction markers and the case marking system in Squaliq Atayal. Sections 5.3.1.1 and 5.3.1.2 discuss the forms and functions of two of the three

types of construction markers. Section 5.3.1.3 deals with the Squliq Atayal case marking system for full nouns. Section 5.3.2 deals with the Squliq Atayal pronominal system.

5.3.1 Construction Markers

Like Kavalan and many other western Austronesian languages, three types of construction markers can be identified in Squliq Atayal: (i) topic linker, (ii) ligatures, and (iii) elements that are often assumed to be “determiners”. The first two types of construction markers will be discussed in sections 5.3.1.1 and 5.3.1.2. As for the “determiners”, they will be discussed in section 5.3.1.3.

5.3.1.1 Topic linker

The first type of construction marker to be introduced is a topic marker.

A topic linker is an element that links a topicalized NP and the rest of a sentence. In Squliq Atayal, a topic or topics can be linked to the rest of a sentence by the topic linker *ga?*, as in (57). However, like Kavalan, the presence of the topic linker is optional rather than obligatory. As already shown in example (56) of section 5.2.4 [repeated below in (58)], a topic can occur without the topic linker *ga?*.

(57) topic linker *ga?* links the topic to the rest of a sentence:

- a. *hi?*=*ta?* *ga?*, *uŋat* *bukin=nya?* *ma*.
 body=GEN.1PI TP.LK NEG.EXIST fur=GEN.3S QUOT
 ‘As for our (in.) body, it does not have fur.’ (Ata S1–021)

- b. buli? qasa *ga?*, yasa.qu? lman=nya? tmuya? squ? hzyan.
 knife that TP.LK so (do)first=GEN.3S bury LCV earth
 (*lman* < *lama?* + *-an*)

‘As for that knife, she buried it in the earth in advance.’ (Ata S1–025)

- c. ita? tayan *ga?*, khmay ita? tayan.
 IPI(CORE) Atayal TP.LK many IPI(CORE) Atayal

‘As for us (in.) Atayal, we (in.) Atayal are many.’ (Ata 6–007)

(58) topicalization without any topic linker:

yaqih nqu? knerin ru? mlikuy, galun=nha? ru? sbuliŋ=nha?
 bad LIG woman and man take=GEN.3P and throw.with=GEN.3P

qsya? qasa ma.
 water that QUOT

‘As for the bad woman and man, they took them and threw them into the water.’
 (Ata 6–20)

5.3.1.2 Ligatures

The second type of construction marker to be introduced is ligatures.

Like Kavalan and many other western Austronesian languages, Squliq Atayal makes use of a special type of construction marker, commonly referred to as a “ligature” or “linker”, to link a head (usually a noun or a verb) with its following attribute (e.g., a noun, possessor, or relative clause). As already discussed in Chapter 4, the categorical status of “ligatures” is not uncontroversial. Syntactically, they seem to behave like prepositions in that they typically take a NP as their exocentric dependent. Moreover, like prepositional phrases, the phrase which it is a part of is usually used to modify a noun or a verb. However, the “preposition” analysis of “ligatures” is problematic for Squliq Atayal because “ligatures” are optional in some construction types. If they were prepositions, they would be expected to function as the head of the prepositional phrase

in which they appeared and to be OBLIGATORILY present in ALL syntactic environments.

However, this is NOT the case in Squliq Atayal.

Three ligatures are found in Squliq Atayal: *naʔ*, *nquʔ*, and *quʔ*. The form *nquʔ* is probably historically derived from the combination of *naʔ* and *quʔ*. Synchronically, *nquʔ* behaves like *naʔ* rather than *quʔ*. My study of Atayal texts suggest that *quʔ* and *naʔ/nquʔ* seem to occur in different syntactic environments. More specifically, both *naʔ* and *nquʔ* are used to link a head noun (either an entity-denoting word or a property-denoting word) with its dependent noun or relative clause, as in (59), (61), and (63). The form *quʔ*, however, is used to link a head noun (either a quantifier, numeral, or demonstrative) with its dependent noun (an entity-denoting word) (as in (64), (66), and (68)), or to link a head noun (an entity-denoting word) with its dependent (a free core pronoun) (as in (70)).

There are two things about ligatures in Squliq Atayal that are worth noticing. First, they seem to be OPTIONALLY, rather than obligatorily, present in most of syntactic environments, as shown in (60), (62), (65), and (67). Second, ligatures do NOT seem to appear in at least the following two situations at all. (a) When a head noun (an entity-denoting word) occurs with its dependent noun (a property-denoting word), NO ligature is used. As shown in (61), when the entity-denoting noun *likuy* ‘man’ occurs with the property-denoting word *balay* ‘true’, they are NOT linked by any ligature. (b) When a

head noun (an entity denoting word) occurs with its dependent demonstrative,¹⁶ NO ligature is used. As shown in (69), when the entity-denoting noun *knerin* ‘woman’ occurs with its dependent demonstrative *qasa* ‘that’, they are not linked by any ligature.¹⁷

(59) ligature *na?* links a head noun (entity-denoting word) with a relative clause:

...*pinongan=su?* *zyaw na? mhwah hupa? qsya?*....
 hear=GEN.2S thing LIG flow big water

‘...You (sg.) heard about the thing regarding the big water....’ (Ata 6–002)

(60) a head noun is linked with its dependent relative clause without any ligature:

...*buli?* *snsun=nya? kryax.*
 ...knife carry=GEN.3S day

‘...the knife that she carried with her every day.’ (Ata S1–024)

(61) ligature *na?* links a head noun (property-denoting word) with a noun; a head noun (entity-denoting word) is linked with its dependent noun (property-denoting word) without any ligature:

kya qu? *yaqih na?* *likuy*, *yat likuy balay son=nya?* *la.*
 if QU? bad LIG man NEG man true call=GEN.3S LA

‘If (he is) a bad man, he cannot be called a real man.’ (Ata 1–019)

¹⁶ The syntactic behavior of demonstratives in Sqliq Atayal differs from that of demonstratives in other western Austronesian languages (e.g., Kavalan, Tagalog, Ilokano, etc.). In most western Austronesian languages, when a demonstrative precedes or follows a noun, a ligature is either optionally or obligatorily present in both constructions. However, in Sqliq Atayal, when a demonstrative precedes a noun, a ligature can be optionally employed between them; when a demonstrative follows a noun, no ligature is used. It seems to me that demonstratives in Sqliq Atayal might belong to two syntactic categories: nouns and determiners. When a demonstrative occurs in a “Dem-(Lig-)N” construction, it seems to function as a noun. However, when it occurs in a “N-Dem” construction, it seems to function like a determiner.

¹⁷ A similar observation has been made by Rau (1992). Rau (1992:114) states: “A common noun may be preceded or followed by an adjective modifier. The genitive/possessive marker *na?* is placed optionally between the proposed adjective modifier and the head noun but NOT between the head noun and the following adjective modifier.”. Rau’s “adjective modifier” is equivalent to “property-denoting word” in my analysis.

- (62) a head noun (property-denoting word) is linked with its dependent noun without any ligature:

yaqih utux hiya? ga?, nanu?.yasa.qu?, *mqwas* qutux siliq
 bad luck 3S(CORE) TP.LK therefore sing one siliq
kahun babaw tuqi qani ga?, *syeq* wan si uci, wan
 come.from above road this TP.LK SYEQ PRF directly do PRF
 si krayas qu? tuqi lga?, gani ga?, *nyux* hmtwi ma.
 directly cross.over QU? road LGA? this TP.LK PROX.IMPRF stop QUOT

‘As for bad luck, therefore, one *siliq* bird sings, flies over the road (with the noise) ‘*syeq*’, crosses the road from right to left. As for this, it will stop us from going (seems to tell us not to go on)’ (Ata 2–007)

- (63) ligature *nqu?* links a (property-denoting) head noun with a noun:

...nyux *maras psaniq nqu? zyaw* ga?.
 PROX.IMPRF bring shame LIG thing GA?

‘...if they have brought shame.’ (Ata 5–013)

- (64) ligature *qu?* links a head noun (a quantifier) with a noun:

nanu?.yasa?.qu? mɲluŋ *kwara? qu? mrhuw*...
 therefore think all LIG ancestor

‘Therefore, all the chiefs (ancestors) thought....’ (Ata 6–014)

- (65) a head noun (a quantifier) is linked with its dependent noun without any ligature:

qasa ga? *musa? mkayan squ?* kmukan ru? *musa? magan* cimuf
 that TP.LK go say LCV plains.people and go take salt
 ru? putuŋ ru? *kwara? qqaya* ru? wah=nha? *smatu?* tayan la.
 and match and all things and come=GEN.3P send Atayal LA

‘As for that one, he went to talk to the plains people, went to get salt, matches, and all other things, and they were all brought to the Atayals.’ (Ata 4–027)

- (66) ligature *qu?* links a head noun (a numeral) with its dependent noun:

ktan ga?, nyan *maras qutux qu? laqi?*.
 see GA? come carry one LIG child

‘(When they) saw her, (they noticed that) she was carrying a child.’ (Ata S1–035)

(67) a head noun (a numeral) is linked with its dependent noun without any ligature:

...*mwah qutux pswiy ŋarux*.
 come one male bear

‘...then a male bear came.’ (Ata S1–041)

(68) ligature *qu?* links a head noun (a demonstrative) with a noun:

yasa qu? qsya? ga?, si nyut mbhoyaw qu? qsya?...
 that LIG water TP.LK actually/just gradually increase QU? water

‘As for that water, the water actually gradually increased.’ (Ata 6–013)

(69) a head noun is linked with its dependent demonstrative without any ligature:

...*ini?=nya? niqi qu? knerin qasa*.¹⁸
 NEG=GEN.3S eat QU? woman that

‘...it (the bear) did not eat the woman.’ (Ata S1–011)

(70) ligature *qu?* links a head noun with a free pronoun:

zyaw qani ga?, minkayan kwara? ru? galun tunux qu? sami
 thing this TP.LK say all and take head LIG IPI(CORE)

hiya?
 EMPH

‘As for this thing, all (people) would discuss and hunt our (in.) heads. (Ata 4–021)

5.3.1.3 Case-marking system for full nouns

The third type of construction marker to be introduced is pronominal elements that are often referred to as “determiners” in the literature.

The so-called “determiners” are typically monosyllabic forms that occur before noun phrases. They are often assumed to mark the grammatical relations or case relations of noun phrases in some languages. Like other western Austronesian languages, full noun

¹⁸ Reid (pers. comm.) suggests that “Historically these demonstratives probably consisted of a ligature *qa* and a demonstrative formative *sa, ni*, etc.... So that they were originally linked to their preceding head noun.”

phrases in Sqliq Atayal do NOT exhibit formal differences to reflect their grammatical functions. Their grammatical functions can be manifested by contrastive word order and/or by a class of prenominal monosyllabic forms.¹⁹

In previous analyses of the Sqliq Atayal case-marking system for full nouns, Sqliq Atayal is commonly described as having a system similar to the one in table 5.1 (based on Egerod 1966, 1978; Huang 1993, 1994; Huang et al. 1998:32; Li 1997:348; Rau 1992; Starosta 1999:382; etc.)

TABLE 5.1 PREVIOUS ANALYSES OF ATAYAL CASE-MARKING “DETERMINERS”

NOMINATIVE	GENITIVE/ INSTRUMENTAL	LOCATIVE/ DATIVE/ACCUSATIVE	COMITATIVE/ ACCUSATIVE
qu?	na?; nqu?; (ni?)	sa; squ?; te	ki?

Most of these forms have been referred to as “case markers”, “determiners”, “particles”, etc. in previous analyses. However, their status as determiners is not uncontroversial. In this study, I reconsider the categorical status of these monosyllabic forms. Based on a careful analysis of Atayal textual data, I suggest that at least one (if not all) of the monosyllabic forms, that is, *qu?*, is best analyzed as an “AUXILIARY NOUN”, rather than a “determiner”, at least in some (if not in all) cases. In addition to *qu?*, my textual analysis also points out that another monosyllabic form, *squ?*, often analyzed as a locative determiner, at least in one instance, can also be analyzed as an “auxiliary noun”.

¹⁹ Huang (1993, 1994) and Huang et al. (1998) comment that the use of these prenominal elements is optional in the Wulai dialect of Sqliq Atayal. They often appear in senior speakers’ utterances and in longer discourse, but seldom appear in daily conversation, especially not in the younger generation’s speech.

The fact that *qu?* and *squ?* might be “auxiliary nouns” at least in some cases raises the possibility that all other monosyllabic prenominal elements in Atayal may also be “auxiliary nouns” (at least in some cases).

5.3.1.3.1 *qu?*: Nominative determiner, definite determiner, or noun???

In previous analyses of Squliq Atayal, the form *qu?* has been commonly analyzed as a noun particle/nominalizer (Egerod 1966), a nominative case marker or determiner (Huang 1995; Huang et al. 1998; Li 1997; Rau 1992, 1997; etc.), definite determiner (Rau 1992, 1997), and a (nominative) relator noun (Starosta 1999).²⁰ Most Formosanists seem to agree that *qu?* is a nominative case marker/determiner. However, a careful analysis of Atayal textual data suggests that *qu?* is NEITHER a nominative case marker/determiner, NOR a definite determiner; instead, it is an “AUXILIARY NOUN”, at least in some cases. Moreover, full nominative noun phrases are NOT morphologically marked for case. The misanalysis of *qu?* may result from overlooking some important data.

Let us re-examine the distribution of the form *qu?*.

First, *qu?* can introduce the sole argument of a monadic intransitive clause, as in (71).

²⁰ Starosta (1999:382) also analyzed *qu?* (written as *qu* in Starosta’s paper) as a “nominative” case marker. However, he did not consider the term “case marker” as a label of syntactic category. He considered “case markers”, such as Atayal *qu*, as RELATOR NOUNS because they perform relational functions.

(71) *qu?* introduces the sole argument of a monadic intransitive clause:

- a. *mhuqin qu? ŋarux qasa....*
 die QU? bear that
 ‘(After) that bear died, ...’ (Ata S1–029)

- b. *...m?awa? qu? knerin qasa,....*
 yell QU? woman that
 ‘...that woman yelled....’ (Ata S1–030)

Second, *qu?* can introduce a nonagentive argument of a dyadic *-un* clause, dyadic *-an* clause, or dyadic *s-* clause, as in (72)–(73).

(72) *qu?* introduces a nonagentive argument of a dyadic *-un* clause:

- ...syun=nya? kya qu? knerin qasa....*
 put=GEN.3S there QU? woman that
 ‘...it put the woman there....’ (Ata S1–011)

(73) *qu?* introduces a nonagentive argument of a dyadic *-an* clause:²¹

- a. *syuki cikay qu? zyaw qani.*
 answer please QU? thing this
 ‘Please answer this thing.’ (Ata 1–002)
- b. *...ini?=nya? niqi qu? knerin qasa.*
 NEG=GEN.3S eat QU? woman that
 ‘...it did not eat the woman.’ (Ata S1–011)

The distributional properties exhibited by *qu?* in examples (71)–(73), that is, being able to introduce the sole argument of a monadic intransitive clause and a nonagentive argument of a dyadic *-un* clause, dyadic *-an* clauses, or dyadic *s-* clause, seem to suggest that *qu?* is a nominative case marker. However, a careful examination of Sqliq Atayal

²¹ The infinitive form of *-an* verb in Sqliq Atayal is V-*i*.

textual data points out that *qu?* also occurs in some other clause environments where a nominative case marker/determiner in other languages of the world would not normally occur. For example, *qu?* can introduce an ADJUNCT location noun phrase, as in (74).

(74) *qu?* introduces an adjunct location noun phrase:

...siliq qani ga? si.ktay nyux mqwas ***qu?*** ***bzinah*** ***tuqi*** ru?....
 siliq this TP.LK suddenly PROX.IMPRF sing QU? side road and
 ‘...As for these *siliq* birds, suddenly they sing on the road side,....’ (Ata 2–004)

The fact that *qu?* can introduce an ADJUNCT location noun phrase suggests that *qu?* CANNOT be a NOMINATIVE case marker because nominative NPs are CORE ARGUMENTS rather than adjuncts. If *qu?* cannot be a nominative case marker, what can it be?

An alternative analysis offered in the literature is to consider *qu?* as a DEFINITE DETERMINER. As shown in (71)–(74), *qu?*, like a determiner in other languages of the world, occurs at the outer edge of the noun phrases that it introduces. Moreover, all the noun phrases introduced by *qu?* in these examples are definite. It seems that these examples do support the “definite determiner” analysis. However, a careful investigation of Atayal textual data suggests that the “definite determiner” analysis, like the “nominative case marker” analysis, is also problematic.

The “definite determiner” analysis is associated with two separate claims: (a) *qu?* is a definite marker, and (b) *qu?* is a determiner. These two claims are challenged by two types of data. The first type of data show that *qu?* does NOT ALWAYS introduce a DEFINITE noun phrase. The second type of data show that *qu?* does NOT exhibit (some of) the core properties of determiners.

Let us first consider examples that challenge the claim that *qu?* is a DEFINITE marker.

In (75)–(76), some general properties of a “real man” and a “bad man” are discussed.

The noun phrases introduced by *qu?* are NOT used for identifying any particular individual or object in these cases; therefore, they are UNLIKELY to be interpreted as DEFINITE. Because *qu?* is NOT used to introduce a DEFINITE noun phrase in these cases, it CANNOT be a DEFINITE marker.

(75) *qu?* introduces an indefinite noun phrase:

kya	<i>qu?</i>	mlikuy	balay	hiya?	ga?	nanu?.yasa.qu?	ini?
if	QU?	man	true	3S(CORE)	TP.LK	therefore	NEG
balay		knguju?					
true/really		fear/afraid					

‘If (he is) a real man, then he is really not afraid of anything.’ (Ata 1–010)

(76) *qu?* introduces an indefinite noun phrase:

kya	<i>qu?</i>	yaqih	na?	likuy ,	yat	likuy	balay	son=nya?	la.
if	QU?	bad	LIG	man	NEG	man	true	call=GEN.3S	LA

‘If (he is) a bad man, he cannot be called a real man.’ (Ata 1–019)

Now let us consider examples that challenge the claim that *qu?* is a DETERMINER.

Cross-linguistically, determiners have the following universal properties (outlined in Reid 2002b:298):

- (a) They are dependents of head nouns;
- (b) They typically occur at the outside edge of a noun phrase;
- (c) They cannot themselves be modified by any other form;

- (d) They often agree with semantic features of the head noun, such as definiteness, specificity, common vs. personal, plurality, and so forth, and may also agree with or “mark” the case of their head noun.

The supposed “determiner” *qu?* in Squiliq Atayal, however, sometimes exhibits the following two properties. First, it does NOT ALWAYS function as the dependent of a noun phrase. Second, it sometimes CAN be modified by another phrase. These typological oddities make the “determiner” analysis unsustainable.

Let us consider the following example.

In (77), the noun phrase *raytay qani* ‘this summary’ is in apposition to the form *qu?*. Cross-linguistically, an appositive noun phrase tends to immediately follow another noun phrase of identical reference. In this example, *qu?* is the only element that immediately precedes the noun phrase *raytay qani* ‘this summary’. If *qu?* were a determiner, why is there NO noun phrase intervening between *qu?* and *raytay qani* ‘this summary’? In this case, it seems that the noun phrase *raytay qani* ‘this summary’ is used to modify *qu?*, rather than any other overt or covert noun phrase. This example seems to suggest that the form *qu?* itself is a NOUN, rather than a determiner.

- (77) *qu?* followed by an appositive NP:

nanu?.yasa.qu? kita?=nha? siliq hiya?, yasa nanak *qu?*,
 therefore see=GEN.3P siliq 3S(CORE) that only QU?

raytay qani.
 summary this

‘Therefore, as for their seeing the *siliq* bird, this is only a summary of it.’ (‘Lit., Therefore, as for that, their seeing of the *siliq* bird, as for only that, this is a summary.’) (Ata 2–012)

Let us consider other types of examples that challenge the “determiner” analysis.

Cross-linguistically, determiners are dependents of head nouns. Therefore, we expect the elements introduced by *qu?* to be NOUNS in Squaliq Atayal. However, my analysis of Squaliq Atayal textual data points out that sometimes the elements introduced by *qu?* are UNLIKELY to be considered as NOUNS. Let us examine the elements that introduced by *qu?* in examples (78)–(81).

In (78), the element that immediately follows *qu?* carries affixation (the formative *m-* in the form *musa?* is often assumed to be a “verbal affix”) that identifies it as a verb. That is, in this case, *qu?* introduces a verbal clause headed by a lexical verb. This example might not be a big problem for the “determiner” analysis because one can assume that the form *musa?* is actually a zero-derived deverbal NOMINALIZATION, similar to the effect of *-er* nominalization in English, hence it might actually mean ‘the one who went...’ in this example. Alternatively, one could assume that *musa?* is a verb, as it appears to be, but is the predicate of a headless relative clause, so that, in effect, the noun phrase in which it appears is—on the surface at least—headless (see Kroeger 1998:2, 11).

(78) *qu?* followed by a verbal clause headed by a lexical verb:

...ini? swan uzi *qu?* *musa?* te b?nux.
 NEG agree too QU? go LCV plains

‘The ones who went to the plains did not agree.’ (Ata 4–013)

The “nominalization” account might sound reasonable for sentences like the one in (78). However, it might not be applicable to sentences like the ones in (79)–(81). In (79), the element immediately following *qu?* is a modal auxiliary verb. In (80)a–c, the

element immediately following *qu?* is a negative auxiliary verb. In (81), the element immediately follows *qu?* is an aspectual auxiliary verb. Although it might be possible to consider lexical verbs as “zero-derived deverbal nominalizations” when they follow a supposed determiner, it is UNLIKELY that auxiliary verbs (e.g., modal auxiliary, negative auxiliary, aspectual auxiliary, etc.) are nominalizations. The existence of sentences like examples (79)–(81) makes the “determiner” analysis particularly hard to sustain.

(79) *qu?* followed by a clause headed by a modal auxiliary:

kya *qu?* **baq** powah squ? hongu? qasa hiya? ga?,
 if QU? can pass/cross.over LCV bridge that 3S(CORE) TP.LK
 mlikuy balay son=nya?
 man true/real call/become=GEN.3S

‘If one can cross over that bridge, as for that, he is a real man.’ (Ata 1–009)

(80) *qu?* followed by a clause headed by a negative auxiliary:

a. yasa? *qu?* **ini?** tehok squ? musa? kya qalaŋ=nya?
 that QU? NEG arrive SQU? go there country=GEN.3S

‘As for that one, she cannot arrive at the place she is going to, (that is) her country (Heaven)’ (Ata 1–033)

b. nanu? kya *qu?* **ini?** puŋ ru?, musa? lga?,....
 therefore if QU? NEG hear and go LGA?

‘Therefore, if one does not listen to the warning and he continues to move on....’ (Ata 2–011)

c. kya *qu?* **ini?** qbaq tmring hiya? lga?, yasa *qu?* **putut** la.
 if QU? NEG can do.housework 3S(CORE) LGA? that LIG stupid LA

‘If someone cannot do housework, as for that, that (person) is stupid.’ (Ata 1–030)

(81) *qu?* followed by a clause headed by an aspectual auxiliary:

ɲarux *qu?* nyux=nha? bay kɲun uzi.
bear QU? PROX.IMPRF=GEN.3P very fear also

‘They were very much afraid of bears.’ (data from Rau 1992:138)

Based on the data discussed so far, it seems that *qu?* is NEITHER a nominative case marker, NOR a definite marker, NOR a determiner. Now, the question is: “what can it be?”

An answer to this question is offered by Reid (2002b).

Reid (2002b) re-examines the syntactic distribution of the so-called nominative or absolutive “determiners” in Philippine languages (e.g., Tagalog *ang*, Ilokano *ti*, Guinaang Bontok *nan*, etc.) and claims that these monosyllabic forms do NOT belong, at least in some cases, to the syntactic category of DETERMINERS. Instead, he considers these forms to be “AUXILIARY NOUNS” that carry the feature [+extension], that is, nouns that require a dependent predicate (p.304, 306). The “auxiliary noun” analysis is supported by the following pieces of evidence. First, these monosyllabic forms can occur before words that are themselves unlikely to be the heads of noun phrases, such as prepositions and auxiliary verbs. Second, Philippine languages are strongly RIGHT-BRANCHING, with dependents typically occurring to the RIGHT of their head. However, the supposed “determiners” are typologically anomalous in that they always occur to the LEFT of their head noun. Third, in the Talubin dialect of Bontok, these forms are followed by apparent dependents, as in (82).

(82) Talubin Bontok (Reid 2002b:305)

ʔuʔud na=k ʔásuk?
where NA=GEN.IS dog

‘Where is my dog?’

The “auxiliary noun” analysis proposed by Reid (2002b) seems to be applicable to the Atayal form *quʔ*.²² The “auxiliary noun” analysis of Atayal *quʔ* is supported by the following pieces of evidence. First, *quʔ* can occur before words that are themselves unlikely to be the heads of noun phrases, such as auxiliary verbs. Second, *quʔ* sometimes can be modified by a noun phrase. Third, like Philippine languages, Atayal is strongly RIGHT-BRANCHING, with dependents typically occurring to the RIGHT of their head. However, the supposed “determiner” is typologically anomalous in that it always occurs to the LEFT of its head noun.

The fact that *quʔ* might be an “auxiliary noun”, at least in some cases, poses the question as to whether all other monosyllabic pronominal elements in Atayal might also be “auxiliary nouns”, at least in some cases.

5.3.1.3.2 *naʔ* and *nquʔ*: Genitive determiners and/or nouns??

Having discussed the pronominal element that has been often analyzed as a nominative case marker/determiner. I now turn to the discussion of monosyllabic forms that are often referred to as “genitive case markers/determiners”.

²² As discussed earlier, Starosta’s (1999:379–380) analyzed *quʔ* (written as *qu* in Starosta (1999)) and other pronominal elements as “relator nouns” because they perform relational functions. In principle, Starosta’s “relator noun” analysis might also be applicable to Atayal *quʔ*. However, I prefer the “auxiliary noun” analysis because *quʔ* does not seem to behave exactly the same as “relator nouns” in other languages (e.g., English, Mandarin, Tibetan, etc.). First, “relator nouns” often require a Genitive complement (e.g., the relator nouns *bottom* and *top* in English take a genitive complement, as in *bottom of the house*, *top of the tree*, etc.). However, the Atayal form *quʔ* does not take a genitive complement. Second, relator nouns typically carry minimal information content, being composed of nothing but localistic components such as “interior”, “surface”, etc. However, the Atayal form *quʔ* does not seem to even carry any localistic information. Based on these differences, I consider *quʔ* to be an “auxiliary noun” rather than a “relator noun” (see Starosta 1985:112–118 for discussion of relator nouns).

Two forms, *naʔ* and *nquʔ*, are often referred to as genitive determiners in Squliq Atayal. The form *nquʔ* might be historically derived from the combination of *naʔ* and *quʔ*. Although the status of these two forms as “determiners” might be questionable, their status as some kind of “case-marking” elements is justifiable. In the Squliq Atayal textual data that I examined, there is no single instance of *naʔ* or *nquʔ* that is followed by an element that is unlikely to be a noun. Therefore, I will not discuss the categorical status of these two forms here. For convenience, I refer to *naʔ* and *nquʔ* as genitive case markers.

Like Tagalog, genitive case markers in Squliq Atayal are associated with three functions. First, they mark possessors in possessive constructions. As shown in (83)–(85), the form *naʔ* can mark a possessor (personal, nonpersonal, or core pronoun) in a possessive construction. As shown in (87)–(88), the form *nquʔ* can also mark a possessor in a possessive construction. However, as discussed earlier, the use of prenominal elements to mark the grammatical function of NPs is optional rather than obligatory in Squliq Atayal. It is also possible to express a possessor in a possessive construction without using either *naʔ* or *nquʔ*. As shown in (89), a noun phrase can be expressed as a possessor (that is, a dependent of its possessed noun) without being marked by *naʔ* or *nquʔ*. In this case, the relationship between a possessor and its head noun is manifested by word order, that is, a possessor follows its head noun.

Squliq Atayal has often been described as having lost the contrast between personal nouns and nonpersonal nouns (see Huang et al. 1998:32; Li 1995, 1997:347–348; etc.).

However, Rau (1992:142) states that “Genitive forms of common nouns optionally have the particle *naʔ* (or *n*) in front of them. Proper names and kinship terms sometimes have the alternate particle *niʔ* for the genitive”. As shown in (86), the form *niʔ* seems to also mark a personal noun as a possessor (cf. (85)).

(83) *naʔ* marks a possessor (a common noun):

nanuʔ [zyaw **naʔ** ptasan] hiyaʔ, nanuʔ tyqi=nyaʔ ptasan,
 what thing GEN tattoo 3S(CORE) what meaning=GEN.3S tattoo

rqyas [**naʔ** mrhuw=taʔ] raran hiyaʔ.
 face GEN ancestor=GEN.1PI before/old.time 3S(CORE)

‘About the thing (called) tattoo, what is the meaning of the tattoo on our (in.) ancestors’ faces.’ (Ata 3–001)

(84) *naʔ* marks a possessor (a core pronoun):

isuʔ gaʔ yayaʔ **naʔ** hiyaʔ.
 2S(CORE) TP.LK mother GEN 3S(CORE)

‘As for you (sg.), (you) are his mother.’ (Huang 1993:62)

(85) *naʔ* marks a possessor (a personal name):

isuʔ gaʔ yayaʔ **naʔ** tali.
 2S(CORE) TP.LK mother GEN Tali

‘As for you (sg.), (you) are Tali’s mother.’ (Huang 1993:62)

(86) *niʔ* marks a possessor (a personal name):

Temuʔ gaʔ, likuy **niʔ** Yaŋu Rasun uzi.
 Temuʔ TP.LK man GEN sister Rasun also

‘As for Temu, he was also the husband of sister Rasun.’ (data from Rau 1992:143)

(87) *nquʔ* marks a possessor (a common noun):

smkaʔ inluŋan=nyaʔ lgaʔ, nyux mtnaq inluŋan **nquʔ** ŋarux...
 split heart=GEN.3S LGAʔ PROX.IMPRF equal heart GEN bear

‘His heart split into two; one half was like the bear’s heart.’ (Ata S1–51)

(88) *nqu?* marks a possessor (a common noun):

pinqzywan ***nqu?*** ***nkis.raran*** (*hiya?*) *ga?*,
 legend GEN ancestor 3S(CORE) TP.LK

‘As for the legend of the ancestors, it is that,’ (Ata 1–006)

(89) a possessor marked by neither *na?* or *nqu?*:

...*rqyas=nya?* *uzi ga?* *nyux mi?a rqyas squliq uzi....*
 face=GEN.3S too TP.LK PROX.IMPRF resemble face person too

‘...as for his face too, it resembled a person’s face too....’ (Ata S1–022)

Second, genitive case markers *na?* and *nqu?* can mark the agent of a dyadic *–an* clause, as in (90). However, quite often they are not expressed, as in (91).²³

(90) *na?* marks the agent of a dyadic *–un* clause:

...*yan=nha?* *wan niqun na? qarux...*
 regard=GEN.3P PRF eat GEN bear

‘...they thought that the bear had eaten her...’ (Ata S1–034)

(91) the agent of a dyadic *–un* clause NOT marked by either *na?* or *nqu?*:

...*nyux katun bqzi....*
 ...PROX.IMPRF pierce thorn....

‘...They will be pierced by thorns.’ (‘Lit., ‘Thorns will pierce them.’) (Ata 1–032)

Third, genitive case markers *na?* and *nqu?*, like *ng /nan/* in Tagalog, can also mark the theme NP (or a nonagentive NP) of a dyadic *(–)m-* clause, as in (92)–(93).

(92) *na?* or *nqu?* marks the theme NP in a dyadic *m-* clause:

a. *mazi? na? gasin.*
 buy GEN rope

‘(He) bought a rope.’ (data from Rau 1997:499)

²³ Among the seven texts that I examined, I only found one instance of the agent of a dyadic *–un* verb being marked by *na?*. In all other cases, the grammatical relations of the agent of a dyadic *–un* verb, a dyadic *–an* verb, and a dyadic *s-* verb is marked only by word order.

- b. si=saku? pqwas *nqu?* qwas Utux lru?.²⁴
 just=NOM.1S sing GEN song god LRU?

‘I just sang about the song of God.’ (data from Rau 1992:143)

- (93) *na?* marks a nonagentive (an instrumental) NP in a dyadic *m*- clause:²⁵

miru?=saku? *na?* enpit qani.
 write=NOM.1S GEN pencil this

‘I write with this pen.’ (data from Huang 1994:131)

5.3.1.3.3 *sa* and *squ?*: Locative determiners and/or nouns?

Two forms, *sa* and *squ?*, are often referred to as locative determiners in Squliq Atayal. The form *squ?* might be historically derived from the combination of *sa* and *qu?*. Although the status of these two forms as “determiners” might be questionable, their status as some kind of “case-marking” elements is justified. For convenience, I refer to *sa* and *squ?* as locative case markers.

Like *sa* in Tagalog, the locative case markers *sa* and *squ?* are usually associated with two functions. First, they can mark a location noun (place name, common noun, or locative pronoun), as in (94)–(97). Second, they can mark a theme of a dyadic (*-*)*m*-clause,²⁶ as in (98)a–b.

²⁴ *p*-V is the dependent form of (*-*)*m*- verbs.

²⁵ When *na?* is used to mark an instrumental NP, it is sometimes referred to as “instrumental” case (see Huang 1995)

²⁶ In Tagalog, *ng* and *sa* can mark an indefinite theme and a definite theme, respectively. However, based on the limited Atayal data that I have access to, I am not able to determine whether *na?/nqu?* and *sa/squ?* show a similar contrast as Tagalog *ng* and *sa*; i.e., with *na?/nqu?* marking an indefinite theme and *sa/squ?* marking a definite theme in Squliq Atayal.

(94) *sa* marks a location noun:

mcyaw=saku? sa ulay.
work=NOM.1S LCV Wulai

‘I work in Wulai.’ (data from Huang 1994:131)

(95) *squ?* followed by a location noun:

yat thoyay musa? squ? tayuh.tuhan.kayan.
NEG can go LCV heaven

‘They cannot go to Heaven.’ (Ata 1–031)

(96) *squ?* followed by a location noun:

qasa ga? musa? mkayan squ? kmukan ru? musa? magan cimuf
that TP.LK go say LCV plains.people and go take salt
ru? putun ru? kwara? qqaya ru? wah=nha? smatu? tayan la.
and match and all things and come=GEN.3P send Atayal LA

‘As for that one, he went to talk to the plains people, went to get salt, matches, and all other things, and they were all brought to the Atayals.’ (Ata 4–027)

(97) *squ?* introduces a locative pronoun:

kmayan=saku? squ? sunan krryax.
say=NOM.1S LCV LCV.2S every.day

‘I talk to you (sg.) every day.’ (Huang 1993:61)

(98) *squ?* introduces a theme NP of a dyadic *m*- clause:

a. *...musa?=ta? mlaw squ? rusa?=ta?....*
go=NOM.1PI patrol LCV trap=GEN.1PI

‘... We (in.) go patrol our (in.) traps (i.e., iron nets),....’ (Ata 1–004)

b. *ana.ga? nyux smsun squ? buli? uxi ma.*
but PROX.IMPRF carry LCV knife too QUOT

‘But (she) carried a knife with her too, it is said.’ (Ata S1–003)

In (94)–(98), the elements introduced by *sa* or *squ?* are all clearly nouns. However, this is not always the case. As shown in (99), the element immediately followed *squ?* is a

lexical verb. The existence of this type of example makes the categorical status of *squ?* (and probably of *sa* too) somewhat controversial. It suggests that *squ?* might be “auxiliary noun” if the verbal form *musa?* ‘go’ is NOT a nominalization in this case. However, due to lack of data, I am not able to draw any firm conclusion regarding the categorical status of *squ?* (and *sa*) now. Further study on Atayal texts might help us determine whether *squ?* (and *sa*) is a determiner and/or noun.

(99) *squ?* followed by a verbal clause headed by a lexical verb:

yasa? qu? ini? tehok *squ?* musa? kya qalaŋ=nya?
 that QU? NEG arrive SQU? go there country=GEN.3S

‘As for that one, she cannot arrive at the place she is going to, (that is) her country (Heaven).’ (Ata 1–033)

5.3.1.3.4 *te* and *ci*: Locative determiners or nouns?

Two other forms, *te* and *ci*, are also often referred to as locative case markers or determiners. In general, the form *te* seems to introduce a directional location noun, as in (100), (102), (104); the form *ci* (and also *squ?*) seems to introduce a nondirectional location noun, as in (105) (and (101)). However, *te* and *ci* sometimes seem to be interchangeable, as in (104). Moreover, *te* also introduces a temporal location, as in (103). It is still not yet clear to me what might condition the occurrence of *te* and *ci*.

(100) *te* introduces a directional location noun:

a. ...ini? swan uzi qu? musa? *te* b?nux.
 NEG agree too QU? go LCV plains

‘The ones who went to the plains did not agree.’ (Ata 4–013)

- b. nanu? kmukan hiya? lga?, ana kahun inu? na?
 therefore plains.people 3S(CORE) LGA? ANA from where LIG
 kmukan mwah te rgyax lga?, lman=nha? kmut tunux pi.
 plains.people come LCV mountain LGA? first=GEN.3P cut head PI
 ‘Therefore, as for the plains people, no matter where the plains people are from, when they come to the mountain, they (the Atayals) would first cut off their heads.’ (Ata 4–024)

- c. mwah=ku? te tuqi? laban.
 come=NOM.1S LCV[+DIR] road wide
 ‘I come toward a wide road.’ (Huang 1993:40)

(101) *squ?* introduces a nondirectional location noun:

- mwah=ku? squ? tuqi? laban.*
 come=NOM.1S LCV[-DIR] road wide
 ‘I come onto a wide road.’ (Huang 1993:40)

(102) *te* introduces a locative pronoun (a recipient):

- nbyiq tali qutux kopu? te knan hira?.*
 give Tali one cup LCV LCV.1S yesterday
 ‘Tali gave me a cup yesterday.’ (Huang 1993:61)

(103) *te* introduces a temporal location noun:

- te qutux hiya? ga?, maha.nanu? qu? pinqzywan na?*
 LCV one 3S(CORE) TP.LK how QU? legend GEN
mrhuw=ta? raran zyaw na? babaw hoqin hiya?,
 ancestor=GEN.1PI before/old time thing LIG beyond/after die 3S(CORE)
baqun=su?.
 know=GEN.2S

‘At first, how about the legend about what happened after our (in.) ancestor’s death, do you know it?’ (Ata 1–003)

(104) *ci* introduces a location noun; *te* introduces a directional location noun:

nanu?.yasa.qu?, qsugun=nya? qasa lga?, nyux mucu pkaki *ci*
 therefore split=GEN.3S that LGA? PROX.IMPRF do live LCV
 lahu? hiya? ga?, tayan lsa ru?, musa? *ci/te* b?nux hiya?
 mountain 3S(CORE) TP.LK Atayal LSA and go LCV plain 3S(CORE)
 ga? kmukan.
 TP.LK plains.people

‘Therefore, after its split, those who stay living in the mountain are called Atayal, and those who went down to the plains are called *Kmukan* (plains people).’ (Ata 4–009)

(105) *ci* introduces a nondirectional location noun:

- a. nanu?.yasa.qu? msthay *ci* rgyax hiya? lga?, ini? khmay
 therefore stay LCV mountain 3S(CORE) LGA? NEG many
 hga?...
 3P(CORE)

‘Therefore, not many of them stayed in the mountain.’ (Ata 4–012)

- b. si.ktay qu? khmay balay qu? ubuy tkuta? *ci* b?nux hiya? la
 suddenly QU? many very QU? belong toward LCV plains 3S(CORE) LA
 ‘Suddenly, really many people belong to the plains people.’ (Ata 4–011)

5.3.1.3.5 *ki*: Comitative determiner or noun?

The last prenominal element to be discussed is *ki*. The function of *ki* is to introduce a comitative NP, as in (106).

(106) *ki* introduces a comitative NP:

nanu?.yasa.qu? msayu? *ki* laqi? tayan....
 therefore quarrel LCV child Atayal

‘Therefore, when he fought with other Atayal children,...’ (Ata S1–52)

5.3.1.3.6 Summary

Summarizing the above discussion, we can conclude that Squliq Atayal has four sets of pronominal case-marking elements: Genitive, Locative 1 (*sa* and *squ?*), Locative 2 (*te* and *ci*), and Comitative, as shown in table 5.2. The occurrence of the case markers is not obligatory and is often dropped in daily conversation and younger speakers' speech in the Squliq Atayal spoken in Wulai.

TABLE 5.2 SQULIQ ATAYAL CASE-MARKING SYSTEM

NOMINATIVE	GENITIVE	LOCATIVE 1	LOCATIVE 2	COMITATIVE
	na?; nqu? (ni? [+prsn])	sa; squ?	te [+DIR] ci [-DIR]	ki?

Genitive case markers can mark three different grammatical functions. First, they can mark the possessor in a possessive construction. Second, they can mark the agent argument of a dyadic *-un* clause, a dyadic *-an* clause, and a dyadic *s-* clause. Third, they can mark the theme argument (or a nonagentive argument) of a dyadic *(-)m-* clause.

Locative 1 case markers, *sa* and *squ?*, can mark two different grammatical functions. First, they can mark location nouns. Second, they can mark the theme NP of a dyadic *(-)m-* clause.

Locative 2 case markers, *te* and *ci*, introduce a location noun. The form *te* seems to introduce directional location noun, whereas *ci* seems to introduce nondirectional location noun. However, they are sometimes interchangeable. It is still not yet clear to me what might condition the occurrence of these two locative case markers.

Comitative marker introduces a comitative noun.

As shown in table 5.2, the form *qu?*, commonly analyzed as a nominative marker/determiner or a definite determiner, is considered to be an “AUXILIARY NOUN”, rather than a nominative case marker/determiner or a definite determiner, at least in some cases. Nominative full noun phrases in Squliq Atayal are morphologically UNMARKED for case. Their grammatical function is manifested by word order.

In addition to *qu?*, my textual analysis also points out that another monosyllabic form, *squ?*, often analyzed as a locative determiner, at least in one instance, can also be analyzed as an “auxiliary noun”.

The fact that *qu?* and *squ?* might be “auxiliary nouns” (at least in some cases) suggests the possibility that other monosyllabic pronominal elements in Atayal might also be “auxiliary nouns”.²⁷ Moreover, the fact that monosyllabic forms in Atayal can be analyzed as “auxiliary nouns” is also of great typological significance in that it suggests that Reid’s “auxiliary nouns” analysis might also be applicable to other Formosan languages. Furthermore, it also suggests that the auxiliary noun analysis might be applicable to other western Austronesian languages as well. Further studies on the syntactic distribution of so-called case-marking determiners in Formosan languages as well as other western Austronesian languages are needed to verify the claims made here.

²⁷ Based on the fact that *qu?* might be a noun (at least in some cases), one might argue that BOTH *nqu?* and *squ?* are CASE-MARKED NOUNS (at least in some cases) because they are probably historically derived from the combination of *na?* plus *qu?* and from the combination of *sa* plus *qu?*, respectively. However, due to lack of data, I refrain from drawing such a conclusion here.

5.3.2 The Squliq Atayal Personal Pronoun System

Unlike full noun phrases, personal pronouns in Squliq Atayal exhibit formal differences depending on their syntactic functions. The forms and functions of Squliq Atayal personal pronouns are summarized in table 5.3. The pronominal forms appearing in the following table are based on Huang (1989:117; 1993:17; 1994:130).²⁸

TABLE 5.3 PERSONAL PRONOUNS IN SQULIQ ATAYAL

	CLITICS		FREE	
	NOMINATIVE	GENITIVE	CORE	LOCATIVE
1S [+SPKR, -ADDR, -PLRL]	=saku?/=ku?	=maku?/=mu/=ku?	kuziŋ/kun	knan
2S [-SPKR, +ADDR, -PLRL]	=su?	=su?	isu?	sunan
3S [-SPKR, -ADDR, -PLRL]	---	=nya?	hiya?	hiyan
1PI [+SPKR, +ADDR, +PLRL]	=ta?	=ta?	ita?	itan
1PE [+SPKR, -ADDR, +PLRL]	=sami	=myan	sami	sminan
2P [-SPKR, +ADDR, +PLRL]	=simu	=mamu	simu	smunan
3P [-SPKR, -ADDR, +PLRL]	---	=nha?	hga?	hgan
=misu? 'GEN.1S + NOM.2S'				

As illustrated in table 5.3, Squliq Atayal personal pronouns distinguish three persons (first, second, and third) and two numbers (singular and plural). First person plural pronouns make a further distinction between inclusive and exclusive forms. The use of inclusive or exclusive forms is determined by whether the hearer(s) is/are included. Inclusive forms are employed when hearer(s) is/are included, otherwise exclusive forms are employed.

²⁸ In previous studies, Squliq Atayal has often been described as having a third person singular nominative clitic pronoun *hi(y)a?* and a third person plural nominative clitic pronoun *hga?* (see Egerod 1966 and 1978; Chen and Lin 1985; Rau 1992 for details). However, as Huang (1989) has argued convincingly that the forms *hiya?* and *hga?* do NOT behave like clitic pronouns; instead they behave like other free form pronouns (as well as full noun phrases). My study of Atayal textual data supports Huang's analysis in treating the third person singular and plural nominative pronouns as phonologically null.

Squliq Atayal personal pronouns consist of four sets: Nominative, Genitive, Core, and Locative. Bound nominative pronouns and genitive pronouns are identified as pronominal clitics, which are indicated by the equal sign '='. Core pronouns and locative pronouns are free form pronouns.

Genitive pronouns are the pronominal equivalents of *na*-marked or *nqu?*-marked full noun phrases. Like their corresponding *na*-marked or *nqu?*-marked full noun phrases, genitive pronouns can function as the attribute (i.e., the possessor) in a possessive construction, as in (107). Moreover, they can function as the agent of a dyadic *-un* clause, the agent of a dyadic *-an* clause, and the agent of a dyadic *s-* clause, as in (108)–(111). Genitive clitic pronouns sometimes seem to have a cross-referencing function. Although no single instance of a genitive pronoun cooccurring with a genitive full noun phrase is found in my study of Atayal texts, Huang (1993:60) provides an elicited example with a genitive pronoun cooccurring with a genitive full noun phrase. As shown in (112), the full noun phrase *tali* 'Tali', that is, the agent of a dyadic *-an* clause, cooccurs with a genitive clitic pronoun *=nya?* 'GEN.3S', which agrees with *tali* in person and number features.

(107) genitive clitic pronoun as the possessor in a possessive construction:

- a. ...*musa?*=*ta?* *mlaw* *squ?* *rusa?*=*ta?*....
 go=NOM.1PI patrol LCV trap=GEN.1PI

'...We (in.) go patrol our (in.) trap (i.e., iron net),....' (Ata 1–004)

- b. *baq* *sswe?*=*nya?*....
 turn.out young.brother=GEN.3S

'It turned out to be his young brother...' (Ata 5–20)

- (108) genitive clitic pronoun as the agent of a dyadic *s-* clause and the agent of a dyadic *-un* clause:

nanu? spaŋa?=*nya?* lru?, rasun=*nya?* squ? ska? hlahuy.
so carry.on.the.back.with=GEN.3S and carry=GEN.3S LCV middle forest

‘So, it carried her on its back into the forest.’ (Ata S1-008)

- (109) genitive clitic pronoun as the agent of a dyadic *-un* clause and the agent of a dyadic *s-* clause:

yaqih nqu? knerin ru? mlikuy, galun=*nha?* ru? sbuling=*nha?*
bad LIG woman and man take=GEN.3P and throw.with=GEN.3P

qsya? qasa ma.
water that QUOT

‘As for the bad woman and man, they took them and threw them into the water.’
(Ata 6–20)

- (110) genitive clitic pronoun as the agent of a dyadic *-un* clause and as the agent of a dyadic *-an* clause:

galun=*nha?* qu? sazing qani ru? hblan=*nha?*....
take=GEN.3P QU? two this and tie=GEN.3P

‘They brought these two and tied them.’ (Ata 6–26)

- (111) genitive clitic pronoun as the agent of a dyadic *-an* clause:

...pinonan=*su?* zyaw na? mhwah hupa? qsya?....
hear=GEN.2S thing LIG flow big water

‘...You (sg.) heard about the thing regarding the big water....’ (Ata 6–002)

- (112) genitive clitic pronoun agrees with the agent of a dyadic *-an* clause:

bhyan=*saku?*=*nya?* tali.
beat=NOM.1S=GEN.3S Tali

‘Tali beat me.’ (Huang 1993:60)

Nominative pronouns have three functions. First, they can be used as the sole argument of a monadic clause, as in (113) and (115). Second, they can be used as the

agent of a dyadic (-*m*-) clause,²⁹ as in (114). Third, they can be used as the nonagentive noun phrase of a dyadic -*un* clause, a dyadic -*an* clause, or a dyadic *s*- clause, as in (115)–(117).

(113) nominative clitic pronoun as the sole argument of a monadic clause:

- a. *mhiy=saku?* tali.
beat=NOM.1S Tali
'I beat Tali.' (Huang 1993:60)
- b. ...nyux=*simu* thoyay *mqyanux*
PROX.IMPRF=NOM.2P be.able.to live
'...you (pl.) could live well.' (Ata 6–010)
- c. ...baq=*ta?* tminun.
can=NOM.1PI weave
'...We (in.) can weave.' (Ata 1–028)
- d. ...nyux=*ta?* t?wayay....
PROX.IMPRF=NOM.1PI thread
'...We (in.) will thread....' (Ata 1–028)

(114) nominative clitic pronoun as the agent of a dyadic (*m*-) clause:

- baha.mswa? krayas=*ta?* hoŋu? qani ga?,...
because cross.over=NOM.1PI bridge this TP.LK
'Because we (in.) cross over this bridge,....' (Ata 1–017)

(115) nominative clitic pronoun as the theme of a dyadic -*un* clause and as the sole argument of a monadic clause:

- ...tmokun=*ta?*=*nya?* ru? phoqin=*ta?* kwara?...
cover=NOM.1PI=GEN.3S and die=NOM.1PI all
'...it will cover us (in.) and we (in.) will all die.' (Ata 6–016)

²⁹ As discussed earlier, some of the monadic and dyadic lexical verbs in pattern 1 and pattern 2 are morphologically unmarked. They are referred to as monadic (-*m*-) verbs and dyadic (-*m*-) verb in this study.

(116) nominative clitic pronoun as the theme of a dyadic *-un* clause:

nway=*sami* khmay hiya? gi, galun=*sami* tunux.....
 may=NOM.1PI many 3S(CORE) GI take=NOM.1PI head

‘We (in.) may have many people; (the Atayals) will take our (in.) heads.’ (Ata 4–019)

(117) nominative clitic pronoun as a nonagentive NP (location) of a dyadic *-an* clause:

kman lawa mha, aw pqzway=*simu* aki=*mamu* baqun.³⁰
 say Lawa mha OK tell=NOM.2P FUT=GEN.2P know

‘Lawa then said, “OK, let me tell you (pl.), so you (pl.) will know (it).”’ (Ata S1–040)

Core pronouns have a number of syntactic functions.³¹ First, they can be used as a topic in a topicalized sentence, as in (118)–(121). Second, they can be used as a possessor, as in (120). Third, they can be used as the nonpredicate nominal of a nominal clause, as in (121). Fourth, they can be used as the sole argument of a monadic clause, as in (122). Fifth, they can be used as an absolute possessive, as in (123).

(118) free core pronoun as a topic:

simu tayan rgayx hiya? ga?, yat=*simu* p?agan tunux
 2P(CORE) Atayal mountain 3S(CORE) TP.LK NEG=NOM.2P take head
 ru? wahun=*mamu* magan tunux ma.
 and come=GEN.2P take head QUOT

‘It is said that as for you (pl.) Atayal living in the mountain, you (pl.) will not cut (each other’s) heads off and you (pl.) will come to take our (plains people’s) heads.’ (Ata 4–022)

³⁰ *V-ay* is the subjunctive form of *-an* verbs.

³¹ Free core pronouns in the present analysis are referred to as “free nominative pronouns” in Huang (1989, 1993, 1994); Rau (1992); and Li (1997). They are referred to as “Nom/Gen” by Starosta (1999) because they can function not only as a nominative, but also a genitive. I prefer the label “core pronouns” because they express CORE ARGUMENTS in a sentence.

(119) free core pronoun *isu?* as a topic:

isu? *ga?* *yaya?* *na?* *tali.*
2S(CORE) TP.LK mother GEN Tali

‘As for you (sg.), (you) are Tali’s mother.’ (Huang 1993:62)

(120) free core pronoun *isu?* as a topic and free form pronoun *hiya?* as a possessor:

isu? *ga?* *yaya?* *na?* *hiya?*
2S(CORE) TP.LK mother GEN 3S(CORE)

‘As for you (sg.), (you) are his mother.’ (Huang 1993:62)

(121) free core pronoun *ita?* as a topic and as the nonpredicate nominal of a nominal clause:

ita? *tayan* *ga?*, *khmay* *ita?* *tayan.*
1PI(CORE) Atayal TP.LK many 1PI(CORE) Atayal

‘As for us (in.) Atayal, we (in.) Atayal are many.’ (Ata 6–007)

(122) free core pronoun as the sole argument of a monadic clause:

a. ...*wan* *mhuqin* *misuw* *balay* *hiya?* *uzi.*
 PRF die just true 3S(CORE) too

‘...he himself just died (recently).’ (Ata 5–023)

b. ...*nyux* *pcbaq* *hiya?*
 PROX.IMPRF teach 3S(CORE)

‘...It seems to instruct (us).’ (Ata 1–003)

(123) free core pronoun as an absolute possessive:

zyaw *qani* *ga?*, *minkayan* *kwara?* *ru?* *galun* *tunux* *qu?* *sami*
thing this TP.LK say all and take head LIG 1PI(CORE)
hiya?
3S(CORE)

‘As for this thing, all (people) would discuss and hunt our (in.) (the plains people’s) heads. (Ata 4–021)

Free locative pronouns have a number of functions. First, like free nominative pronouns, they can be used a topic, as in (124). Second, they can be used as a possessor,

as in (124). Third, they can be used as the less agentive noun phrase of a dyadic *m*-clause, as in (125). Fourth, they can be used as a recipient, as in (126).

Notice that the free locative pronouns can be introduced by the locative case markers *squ?* (as in (126)a) or *te* (as in (126)b). The existence of this type of construction make the “determiner” analysis of these locative case markers somewhat problematic in that personal pronouns are by definition DEFINITE. In principle, they do NOT need any “determiner” to narrow down the reference of the pronoun. However, in (126), the free pronouns *sunan* ‘LCV.2S’ and *knan* ‘LCV.1S’ are preceded by the locative case markers *squ?* and *te*, respectively.

(124) free locative pronoun as a topic and as a possessor:

qani hiya? ga?, **itan** tayan raran ga?, khmay
 this 3S(CORE) TP.LK LCV.1PI Atayal before/old.time TP.LK many
 qu? hiy **itan** tayan lga?,....
 QU? body LCV.1PI Atayal LGA?....

‘As for this thing, in the past, as for us (in.) Atayal, there are many of us (in.) Atayal,....’ (Ata 4–008)

(125) free locative pronoun as the less agentive NP of a dyadic *m*- clause:

ima? qsu? mwah kraya? mwah **mita?** **knan** ga?
 who first come above come see LCV.1S Q

‘Who first came up to see me?’ (data from Rau 1997:499)

(126) free locative pronoun as a recipient:

kmayan=saku? **squ?** **sunan** krriyax.
 say=NOM.1S LCV LCV.2S every.day

‘I talk to you (sg.) every day.’ (data from Huang 1993:61)

(127) free locative pronoun as a recipient:

nbyiq tali qutux kopu? *te* knan hira?
 give Tali one cup LCV LCV.IS yesterday

‘Tali gave me a cup yesterday.’ (data from Huang 1993:61)

5.4 TRANSITIVITY IN ATAYAL VERBAL CLAUSES

In this section, I discuss transitivity in Atayal verbal clauses. I first discuss Atayal verbal clause patterns in 5.4.1. Then I discuss three proposals concerning Atayal transitivity and actancy structure in 5.4.2. Section 5.4.3 provides an evaluation of previous analyses. Section 5.4.4 summarizes the discussion in this section.

5.4.1 Atayal Verbal Clause Patterns

Three major verbal clause patterns are found in Squaliq Atayal: (i) Pattern 1: monadic ((-)m-) intransitive clauses, (ii) Pattern 2: dyadic ((-)m-) clauses, and (iii) Pattern 3: (a) dyadic *-un* clauses, (b) dyadic *-an* clauses, and (c) dyadic *s-* clauses. In pattern 1, the lexical verbs are either morphologically unmarked or have the morphological shape (-)m-. In pattern 2, the dyadic lexical verbs, like the monadic lexical verbs in pattern 1, are also either morphologically unmarked or have the morphological shape (-)m-.³² In patterns 3a–3c, the dyadic lexical verbs have the morphological shape *-un*, *-an*, and *s-*, respectively. These three clause patterns are represented schematically in table 5.4.

³² To make the identification of clause patterns easier, monadic and dyadic lexical verbs in pattern 1 and pattern 2, when morphologically unmarked, are referred to as monadic (-m-) verbs and dyadic (-m-) verb, respectively in the discussion.

In this study, dyadic *-un* clauses, dyadic *-an* clauses, and dyadic *s-* clauses are considered to form one major type of dyadic clauses because they share the same case frame. That is, they all expect both an agentive genitive NP and a nonagentive nominative NP. However, they differ from each other in the interpretation of the nominative NP. In dyadic *-un* clauses, the nominative NP is usually interpreted as a directly affected theme. In dyadic *-an* clauses, the nominative NP is usually interpreted as a location, or a less directly affected theme. In dyadic *s-* clauses, the nominative NP is usually interpreted as an instrument or beneficiary.

TABLE 5.4 VERBAL CLAUSE PATTERNS IN SQULIQ ATAYAL

PATTERN 1: (-) <i>m</i> -V Intr.		N	Nom agent/theme
PATTERN 2: (-) <i>m</i> -V Intr.?Tr.?	(<i>naʔ/nquʔ/sa/squʔ</i>) Gen?/Lcv?/Acc? theme	N	Nom agent
PATTERN 3A: V- <i>un</i> Intr.?Tr.?	(<i>naʔ/nquʔ</i>) Gen agent	N	Nom theme
PATTERN 3B: V- <i>an</i> Intr.?Tr.?	(<i>naʔ/nquʔ</i>) Gen agent	N	Nom location
PATTERN 3C: <i>s</i> -V Intr.?Tr.?	(<i>naʔ/nquʔ</i>) Gen agent	N	Nom instrument/benefactive

Pattern 1 typically consists of monadic (-)*m*- verbs that expect only one nominative NP, as in (128)a. In some cases, the monadic verbs may also allow an optional peripheral

argument (or adjunct) that is (optionally) marked by locative case marker *te*, *ci*, *sa* or *squ?*, as in (128)b.

(128) pattern 1: monadic intransitive clause

- a. ...*mwah* *qutux* *pswiy* *ɲarux*.
 come one male bear
 ‘...then a male bear came.’ (Ata S1–041)
- b. *nanu?*.*yasa*.*qu?*, *qasa* *hiya?* *ga?*, *si.krian* *pkzyaw* *mhoqin*
 therefore that 3S(CORE) TP.LK even miss die
 squ? *tuqi* *nwahan=nya?*.
 LCV road come=GEN.3S
 ‘Therefore, as for that one, he would even lose his way and die on the road that he comes along.’ (Ata 1–025)

Pattern 2 typically consists of dyadic (-)*m*- verbs that expect both a nominative NP and a *na?*/*nqu?*-marked or *sa/squ?*-marked full NP (or a locative pronoun), as in (129)a–d. However, nominal case markers are optional in Squliq Atayal, so sometimes dyadic (-)*m*-verbs can take a nominative agent and a bare nonagentive NP, as in (129)e–f.

(129) pattern 2: dyadic *m*- clause:

- a. *mazi?* *na?* *gasin*.
 buy GEN rope
 ‘(He) bought a rope.’ (data from Rau 1997:499)
- b. *si=saku?* *pqwas* *nqu?* *qwas* *Utux* *lru?*.
 just=NOM.IS sing GEN song god LRU?
 ‘I just sang about the song of God.’ (data from Rau 1992:143)

- c. qasa ga?, musa? **mkayan** squ? kmukan ru? musa? magan cimu?
 that TP.LK go say LCV plains.people and go take salt
 ru? putung ru? kwara? qqaya ru? wah=nha? smatu? tayan la.
 and match and all things and come=GEN.3P send Atayal LA
 ‘As for that one, he went to talk to the plains people, went to get salt, matches,
 and all the other things to give them to the Atayals.’ (Lit. ‘As for that one, he
 went to talk to the plains people, went to get salt, matches, and all other things,
 and they came to the Atayals.’) (Ata 4–027)
- d. ana.ga? nyux **smsun** squ? buli? uxi ma.
 but PROX.IMPRF carry LCV knife too QUOT
 ‘But she carried a knife with her too, it is said.’ (Ata S1–003)
- e. siliq qani hiya? ga?, ke? na? tayan nkis raran
 siliq this 3S(CORE) TP.LK word/language GEN Atayal old.man before
 uzi ga?, nanu?.yasa.qu? **mita?**=ta? siliq qani hiya? ga?,
 too TP.LK therefore see=NOM.1PI siliq this 3S(CORE) TP.LK
 qiwan.balay nyux **pcbaq** hiya?
 really.like PROX.IMPRF teach 3S(CORE)
 (*mita?* < *m-* + *kita?*)
 ‘As for this *siliq* bird, according to what our Atayal ancestors also reported, this
siliq bird is the one that we (in.) (will) see, therefore, it is the one that will really
 instruct us (in.).’ (Ata 2–003)
- f. ...mromun **tmutu?** qhuniq....
 lower.head cut tree
 ‘...she lowered her head cutting trees,....’ (Ata S1–004)

Patterns 3a–c typically consists of dyadic *-un* verbs, dyadic *-an* verbs, or dyadic *s-* verbs that expect both an agentive genitive-marked full NP (or a genitive pronoun) and a nonagentive nominative NP, as in (130)–(133). Case markers are optional in Squiliq Atayal, so sometimes dyadic *-un* verbs, dyadic *-an* verbs, or dyadic *s-* verbs can take a bare agentive NP and a nominative nonagentive NP, as in (130)c. Like the verbs in pattern 1 and pattern 2, the dyadic *-un* verbs, dyadic *-an* verbs, or dyadic *s-* verbs may

also allow an optional peripheral argument (or adjunct) that is marked by a locative markers, as in (134).

(130) pattern 3a: dyadic *-un* clause:

- a. ...**tmokun=ta?***nya?* ru? phoqin=ta? kwara?...
 cover=NOM.1PI=GEN.3S and die=NOM.1PI all

‘...it will cover us (in.) and we (in.) will all die.’ (Ata 6–16)

- b. ...yan=*nha?* wan **niqun** *na?* ŋarux...
 regard=GEN.3P PRF eat GEN bear

‘...they thought that the bear had eaten her...’ (Ata S1–034)

- c. ...**nyux** **katun** bqzi....
 PROX.IMPRF pierce thorn

‘....They will be pierced by thorns.’ (Lit., ‘Thorns will pierce them.’) (Ata 1–032)

(131) pattern 3a: dyadic *-un* clause; pattern 3b: dyadic *-an* clause:

- gal**un**=*nha?* qu? sazing qani ru? hblan=*nha?*....
 take=GEN.3P QU? two this and tie=GEN.3P

‘They brought these two and tied them.’ (Ata 6–26)

(132) pattern 3a: dyadic *-un* clause; pattern 3b: dyadic *s-* clause:

- ...ras**un**=*nya?* spqaniq knerin qani....
 carry=GEN.3S CAUS.eat.with woman this

‘...it brought (it) to feed to this woman.’ (Ata S1–013)

(133) pattern 3c: dyadic *s-* clause:

- qsinuw **s?aras=ku?***nya?* pqaniq.
 wild.animal bring.for=NOM.1S=GEN.3S CAUS.eat

‘Wild animals are what it brought me to feed (me).’ (Ata S1–044)

(134) pattern 3c: dyadic *s-* clause; pattern 3a: dyadic *-un* clause:

- nanu? spanya?*nya?* lru?, ras**un**=*nya?* squ? ska? hlahuy.
 so carry.on.the.back=GEN.3S and carry=GEN.3S LCV middle forest

‘So, it carried her on its back into the forest.’ (Ata S1–008)

5.4.2 Three proposals Concerning Atayal Transitivity and Actancy

As shown in 5.4.1, there are two major dyadic clause patterns that are ambiguous regarding transitivity. Varying in their interpretation of these two major patterns, three proposals concerning Atayal transitivity and actancy structure have been (explicitly or implicitly) proposed in previous analysis of Atayal syntax: a passive analysis, a split-ergative analysis, and an ergative analysis.

The passive analysis, adopted by Egerod (1965, 1966, 1978), Wolff (1973), Rau (1992), treats the *naʔ/nquʔ*-marked or *sa/squʔ*-marked theme full NP (or the locative pronoun) in pattern 2 as an “accusative” object of an active transitive construction but the *naʔ/nquʔ*-marked agent (or the genitive pronoun) in patterns 3a–c as a demoted agent of passive constructions. By treating pattern 1 as intransitive, pattern 2 as canonical transitive, and patterns 3a–c as passives, Atayal is analyzed as an accusative language. The passive analysis is schematically summarized as in table 5.5.

TABLE 5.5 SQUALIQ ATAYAL AS AN ACCUSATIVE LANGUAGE

PATTERN 1: (-)m-V Intr.			N Nom agent/theme
PATTERN 2: (-)m-V Tr.	(na?/nqu?/sa/squ?) Acc theme	N	N Nom agent
PATTERN 3A: V-un Intr.	(na?/nqu?) Gen agent	N	N Nom theme
PATTERN 3B: V-an Intr.	(na?/nqu?) Gen agent	N	N Nom location
PATTERN 3C: s-V Intr.	(na?/nqu?) Gen agent	N	N Nom instrument/benefactive

The split-ergative analysis, adopted by Li (1997), treats the *na?/nqu?*-marked or *sa/squ?*-marked theme full NP (or the locative pronoun) in pattern 2 as an “accusative” object of one type of transitive construction, and the *na?/nqu?*-marked agent (or the genitive pronoun) in patterns 3a–c as an agent of the other type of transitive construction. By treating pattern 1 as intransitive and both pattern 2 and patterns 3a–c as canonical transitive, Atayal is analyzed as a split-ergative language. The split-ergative analysis is summarized schematically in table 5.6.

TABLE 5.6 SQULIQ ATAYAL AS A SPLIT-ERGATIVE LANGUAGE

PATTERN 1: (-) <i>m</i> -V Intr.			N Nom/Abs agent/theme
PATTERN 2: (-) <i>m</i> -V Tr.	(<i>na?</i> / <i>nqu?</i> / <i>sa/squ?</i>) Acc theme	N	N Nom agent
PATTERN 3A: V- <i>un</i> Tr.	(<i>na?</i> / <i>nqu?</i>) Gen/Erg agent	N	N Nom/Abs theme
PATTERN 3B: V- <i>an</i> Tr.	(<i>na?</i> / <i>nqu?</i>) Gen/Erg agent	N	N Nom/Abs location
PATTERN 3C: <i>s</i> -V Tr.	(<i>na?</i> / <i>nqu?</i>) Gen/Erg agent	N	N Nom/Abs instrument/benefactive

The ergative analysis, adopted by Huang (1994), Rau (1997), Starosta (1997, 1998, 1999), treats the *na?*/*nqu?*-marked or *sa/squ?*-marked theme full NP (or the locative pronoun) in pattern 2 as an oblique-marked extended core argument of an extended intransitive construction but the *na?*/*nqu?*-marked agent (or the genitive pronoun) in patterns 3a–c as an agent of transitive constructions. By treating pattern 1 as intransitive, pattern 2 as extended intransitive, and patterns 3a–c as transitives, Atayal is analyzed as a pure ergative language. The ergative analysis is summarized schematically in table 5.7.

TABLE 5.7 SQULIQ ATAYAL AS AN ERGATIVE LANGUAGE

PATTERN 1: (-) <i>m</i> -V Intr.			N Nom/Abs agent/theme
PATTERN 2: (-) <i>m</i> -V Intr.	(<i>na?</i> / <i>nqu?</i> / <i>sa/squ?</i>) Gen/Lcv theme	N	N Nom/Abs agent
PATTERN 3A: V- <i>un</i> Tr.	(<i>na?</i> / <i>nqu?</i>) Gen/Erg agent	N	N Nom/Abs theme
PATTERN 3B: V- <i>an</i> Tr.	(<i>na?</i> / <i>nqu?</i>) Gen/Erg agent	N	N Nom/Abs location
PATTERN 3C: <i>s</i> -V Tr.	(<i>na?</i> / <i>nqu?</i>) Gen/Erg agent	N	N Nom/Abs instrument/benefactive

As illustrated in tables 5.5–5.7, all three proposals agree in treating pattern 1 as an intransitive structure, but disagree as to whether pattern 2 and/or patterns 3a–c should be treated as transitive structures. Such disagreement exists because both pattern 2 and patterns 3a–c are dyadic structures that might be considered transitive. Because both pattern 2 and patterns 3a–c are possible candidates for transitive constructions, it is crucial to determine which one of the two, or whether both, should count as transitive constructions in Atayal. In the following section, I examine the morphosyntactic and semantic properties that these clause patterns exhibit in order to decide the matter.

5.4.3 An Evaluation of Previous Analyses

In previous analyses of Atayal clauses, both pattern 2 (i.e., dyadic (-)*m*- clauses) and patterns 3a–c (i.e., dyadic –*un* clauses, dyadic –*an* clauses, and dyadic *s*- clauses) have been analyzed as transitive as well as intransitive. Pattern 2 and pattern 3 is equally frequently analyzed as transitive. The determination of transitivity in some of the previous analyses (e.g., Li 1997) seems to be based primarily on translation. If a clause is translatable as transitive in Taiwanese, Mandarin Chinese, English, or other accusative languages, then it has often been automatically treated as transitive. If a clause is translatable as passive in these languages, then it has often been automatically treated as passive. Some linguists working on the Atayal language (as well as other Formosan languages) have given the morphosyntactic properties of clause structures and their correlations with semantic properties significant weight (e.g., Huang 1994; Rau 1997; Starosta 1997, 1998, 1999, 2002b).

In this study, I follow the “transitivity” approach adopted by some Formosanists (such as Huang 1994; Rau 1997; Starosta 1997, 1998, 1999, 2002b; etc.) in considering the morphosyntactic and semantic properties of Atayal clause structures as key factors in determining the transitivity of Atayal clause structures. In this section, I evaluate the three proposals discussed in section 5.4.2 in terms of morphosyntactic and semantic criteria. Based on the morphosyntactic and semantic properties that the three Atayal verbal clause patterns exhibit, I argue that the ergative analysis is a better analysis of Atayal transitivity. The following morphosyntactic and semantic evidence can justify this claim.

5.4.3.1 Nominal case-marking and agreement

In this section, I evaluate the three proposals in terms of the nominal case-marking system and agreement.

If we compare the three proposals in terms of the nominal case-marking system, we find that the ergative analysis is a better analysis of Atayal transitivity.

If the passive analysis were correct, then the *naʔ/nquʔ*-marked or *sa/squʔ*-marked full NP (or the locative pronoun) in pattern 2 would be an “accusative” NP and the *naʔ/nquʔ*-marked full NP (or the genitive pronoun) in patterns 3a–c would be a peripheral argument or an adjunct. Such an analysis would have to claim that the *naʔ/nquʔ*-marked or *sa/squʔ*-marked full NP (or the LOCATIVE pronoun) in pattern 2 is either an “accusative” core argument O (when it functions as a theme) or an adjunct (when it functions as a location) depending on the thematic role that it encodes in the situation. However, as already discussed in Chapter 4, NOT ALL theme NPs are “direct objects”. The association of theme NPs with “direct objects” without considering the morphosyntactic and semantic properties that dyadic clauses exhibit might result in mistakenly identified the theme in an antipassive construction as “direct objects” (see Cooreman 1994:52-6; and Manning 1996:12, 15, 84-98 for detailed discussion). Moreover, such an analysis would have to claim that LOCATIVE pronouns can sometimes be used “accusatively” as a “direct object” but sometimes be used “locatively” as an adjunct. It is not clear how a noun phrase can be LOCATIVE and ACCUSATIVE at the same. Besides, the analysis that treats the *naʔ/nquʔ*-marked full NP (or the genitive pronoun) in patterns 3a–c as an adjunct may raise questions such as “If the *naʔ/nquʔ*-marked full NP (or the genitive pronoun) in

patterns 3a–c is an adjunct, why is it almost always present in this type of clause?” or “If the *naʔ/nquʔ*-marked full NP (or the genitive pronoun) in patterns 3a–c is an adjunct, why can it undergo some syntactic processes?”, and so forth.

If the split-ergative analysis were correct, the *naʔ/nquʔ*-marked or *sa/squʔ*-marked theme full NP (or the locative pronoun) in pattern 2 would be an “accusative” NP and the *naʔ/nquʔ*-marked full NP (or the genitive pronoun) in patterns 3a–c would be an “ergative” NP. As just noted, such an analysis would have to claim that the *naʔ/nquʔ*-marked or *sa/squʔ*-marked theme full NP or the LOCATIVE pronoun in pattern 2 is sometimes used as an “accusative” direct object, but sometimes as a “locative” adjunct. Moreover, if the split-ergative analysis were the correct characterization of Atayal transitivity, we would run into the following problem in typology.

Typologically speaking, if a language exhibits a split case-marking system, it is commonly conditioned by one or more of the following factors: (1) the semantic nature of the main verb, (2) the semantic nature of the core NPs (e.g., pronominals vs. full noun phrases), (3) the tense/aspect/mood of the clause, and (4) the grammatical status of a clause (i.e., whether it is a main or subordinate clause) (Dixon 1979, 1994). However, none of these factors seems to condition the supposed split case-marking system described in the split-ergative analysis. From a typological perspective, such an analysis would be undesirable because it would make Atayal (as well as many other western Austronesian languages) typologically unusual in that it would show an idiosyncratic type of split case-marking system, one that had none of the usual motivations for such a split.

On the other hand, if the ergative analysis is correct, then all the problems that we encountered for the other two proposals are avoided. Under an ergative analysis, the *naʔ/nquʔ*-marked or *sa/squʔ*-marked theme full NP (or the locative pronoun) in pattern 2 would be an OBLIQUE-marked extended core argument E and the *naʔ/nquʔ*-marked full NP (or the genitive pronoun) in patterns 3a–c would be an ergative-marked A (genitive-marked A in my analysis).

One more piece of evidence that seems to support the ergative analysis is that genitive clitic pronouns can have a cross-referencing function. As already shown in example (112) in section 5.3.2 [repeated below in (135)], the genitive clitic pronoun =*nyaʔ* ‘GEN.3S’ can agree with the agent of a dyadic *-an* clause, *tali* ‘Tali’, in person and number features.

(135) genitive clitic pronoun agrees with the agent of a dyadic *-an* clause:

bhyan=sakuʔ=nyaʔ tali.
beat=NOM.1S=GEN.3S Tali

‘Tali beat me.’ (Huang 1993:60)

Typologically speaking, agreement is a property that is more likely associated with the core arguments S, A, and O than with any other arguments and/or adjuncts (Whaley 1997:153, 164–165; Dixon 1994:45). If a verb agrees with adjuncts or arguments other than the three core arguments S, A, and O in some features, we would expect that it would also agree with S, A, and O in those features, and not vice versa.

If the passive analysis were the correct characterization of Atayal transitivity, then the *naʔ/nquʔ*-marked full NP (or the genitive pronoun) in patterns 3a–c would be an adjunct. Typologically speaking, we would expect that the verb would agree with the genitive-

marked NP (an adjunct in this type of analysis) if, and only if, it also agrees with the nominative NP and the “accusative” NP (i.e., the *naʔ/nquʔ*-marked or *sa/squʔ*-marked theme full NP (or the locative pronoun) in this type of analysis). However, this is not what we found in the example presented in (135).

If the split-ergative analysis were correct, then Atayal would have a split agreement system in which only certain types of transitive clauses would exhibit verbal agreement, but other types of transitive clauses would not. Again, like the supposed split case-marking system, the supposed split agreement system is not conditioned by any of the four factors cited earlier. And again, from a typological point of view, such an analysis would be undesirable because Atayal would become typologically unusual in that it would show an idiosyncratic type of split-agreement system, one without any of the usual motivations.

If the ergative analysis is correct, then Atayal has a pure ergative agreement system in which (in some cases) the verb of a transitive clause agrees only with the genitive-marked A in person and number features, but not with the nominative-marked S and O or other core arguments or adjuncts.³³ From a typological point of view, this type of ergative agreement system is typologically plausible, though rare.

³³ The agreement fact is not a very strong piece of evidence for Atayal ergativity in that we do not find a productive agreement system.

5.4.3.2 Semantic transitivity

In the preceding section, I have shown that evidence from the nominal case-marking system (and agreement) suggests that an ergative analysis is a better analysis of Sqliq Atayal transitivity than other proposed analyses.³⁴ In this section, I demonstrate that semantic evidence converges with morphosyntactic evidence in this conclusion.

As discussed in Chapter 4, linguists working on different language families agree with Hopper and Thompson (1980) in the observation that semantic properties often correlate with morphosyntactic transitivity in a systematic way (e.g., Tsunoda 1999; Gibson and Starosta 1990; Dixon 1994; Huang 1994; Starosta 1997, 1998, 1999, 2002b; Lazard 1997; Rau 1997). More specifically, they have shown that if semantic parameters covary with morphosyntactic manifestations of transitivity, clauses exhibiting high semantic transitivity are more likely to be encoded grammatically (morphologically and syntactically) as transitive.

However, they disagree with each other on whether all of the ten semantic parameters that Hopper and Thompson proposed should be considered equally relevant to the morphosyntactic manifestations of transitivity. For instance, Tsunoda (1999:4) suggests that AFFECTEDNESS OF THE PATIENT is the most important and is (almost) always relevant

³⁴ Both Huang (1994) and Starosta (1997, 1998, 1999) consider verbal morphology as a piece of evidence to support their ergative analyses of Atayal. They consider the fact that both monadic (-) *m* clauses and dyadic (-) *m*- clauses share the same morphological shape (-) *m*-, but dyadic *nonm* clauses have their unique verbal morphological shapes –*un*-, –*an*-, or *s*- is related to morphological transitivity. More specifically both monadic (-) *m*- clauses and dyadic (-) *m*- clauses are intransitive, whereas dyadic *nonm* clauses are transitive. Although no exception is found in the data available now, I do not rule out the possibility that Atayal might also have constructions like the “be infested with” construction in Pazeh/Pazih, Siraya, Thao, Tagalog, Ilokano, etc. (See chapter 2 for details about the “be infested with” constructions in various Formosan and Philippine languages.) I do not consider the morphological identify test a reliable test of transitivity because verbal morphology might be used to encode some semantic contrast between forms. See Chapter 2 for an evaluation of the morphological identify test.

to the morphosyntactic manifestations of transitivity. However, as discussed in Chapter 4, my analysis of Kavalan textual data shows that another semantic parameter, INDIVIDUATION OF THE THEME, is most relevant to the morphosyntactic manifestations of Kavalan transitivity. In this study, I consider three semantic parameters, VOLITIONALITY, INDIVIDUATION OF THE THEME, and AFFECTEDNESS OF THE THEME, as most relevant to the morphosyntactic manifestations of transitivity in Squliq Atayal.

Let us compare pattern 2 (i.e., dyadic (-)*m*- clauses) with patterns 3a-c (i.e., dyadic -*un* clauses, dyadic -*an* clauses, or dyadic *s*- clauses) in terms of volitionality, individuation of the theme, and affectedness of the theme.

First, let us consider volitionality of agent-like participants in examples (136) and (137). Although both sentences means ‘A saw B’, they occur in different kind of discourse situations. (136) is used in the situation that the agent-like participant ‘it’ (the male bear) ACCIDENTALLY or NONVOLITIONALLY saw the theme-like participant *knerin* ‘the woman’ when it was moving around in the forest.³⁵ However, (137) is used in a situation in which the agent-like participant ‘they’ (the woman’s family) came to see ‘her’ (the woman) PURPOSEFULLY or VOLITIONALLY because they heard her yelling.³⁶ This pair of sentences suggest that dyadic (-)*m*- clauses are semantically less transitive than dyadic -*an* clauses.

³⁵ Although the *m*- clause is dyadic, only one overt NP is present because the third person singular nominative pronoun is phonologically null in Squliq Atayal.

³⁶ Based on discourse cues, we can infer that the -*an* clause is dyadic. However, the agent-like participant ‘they’ is elided here, whereas the theme-like participant ‘her’, being the third person singular nominative, is phonologically null.

(136) pattern 2: dyadic *m-* clause with a nonvolitional agent-like participant

mita? *squ?* *knerin*....
 see LCV woman
 (*mita?* < *m-* + *kita?*)

‘When it (the bear) saw the woman....’ (Ata S1–007)

(137) pattern 3b: dyadic *-an* clause with a volitional agent-like participant; pattern 2: dyadic *m-* clause with a nonvolitional agent and with an indefinite theme

ktan *ga?*, *nyan* *maras* *qutux* *qu?* *laqi?*.
 see GA? come carry one LIG child
 (*ktan* < *kita?* + *-an*; *maras* < *m-* + *aras*)

‘(When they) saw her, (they noticed that) she was carrying a child.’ (Ata S1–035)

Second, let us consider volitionality of the agent NPs and individuation of the theme NPs in examples (137)–(138). Although the sentences in (137) and (138) both express ‘A brought B’, they differ in the interpretation of the theme NPs and volitionality of the agent. The dyadic *m-* clause in (137) is used in the situation when the woman’s family came to see her, they happened to see a child accompanying her, but they did not have any idea who this child was. In this situation, volitionality of the agent is not crucial and the theme NP *laqi?* ‘child’ is INDEFINITE or NONINDIVIDUATED.

In contrast, the dyadic *-un* clause in (138) is used in the situation that the agent ‘she’ (the woman) had already killed her bear husband and had decided to bring her child home. In this case, volitionality of the agent NP is crucial and the theme NP *laqi?* ‘child’ is DEFINITE or INDIVIDUATED. This pair of sentences show also that dyadic (*-*)*m-* clauses are semantically less transitive than dyadic *-un* clauses.

Comparing (137) with (139), one might be tempted to say that dyadic *s-* clauses, like dyadic (*-*)*m-* clauses, are also semantically less transitive than dyadic *-un* clauses because

dyadic *s*- clauses also take an indefinite theme. However, a careful examination of the examples in (137)–(139) suggests that dyadic *s*- clauses are syntactically and semantically more similar to dyadic *-un* clauses than to dyadic *(-)m*- clauses. Syntactically, the sentences in (138) and (139) both take a genitive-marked agent and a nominative NP. They both express a situation that a volitional agent performing an action and consequently another participant (a theme NP in (138), but a beneficiary NP in (139)) in the sentence was affected by this action.³⁷

In contrast, the sentence in (137) takes a nominative agent (not overt because the third person singular nominative is phonologically null) and a theme NP that is not expressed by a nominative pronoun or nominative full NP. Moreover, the volitionality of the agent and the affectedness of the theme are NOT crucial in (137). Based on this set of data, we can conclude that dyadic *(-)m*- clauses are semantically less transitive than both dyadic *-un* clauses and dyadic *s*- clauses.

(138) pattern 3a: dyadic *-un* clause with a volitional agent and a definite and affected theme (nominative)

rasun=nya? ηasan qu? laqi? qasa....
 carry=GEN.3S home QU? child that
 (rasun < ?aras + -un)

‘...she brought that child home.’ (Ata S1–029)

³⁷ Among the ten semantic parameters proposed by Hopper and Thompson, two of them (i.e., Affectedness of theme NPs and Individuation of theme NPs) need to be modified in order to cover dyadic applicative constructions in languages that make extensive use of applicative constructions. These two semantic parameters can be restated as “Affectedness of NONAGENTIVE NPs” and “Individuation of NONAGENTIVE NPs”, in which nonagentive NPs can be theme NPs or beneficiary NPs, instrument NP, etc.

(139) pattern 3c: dyadic *s*- clause with a definite and affected beneficiary
(nominative)

qsinuw sʔaras=kuʔ=nyaʔ pʔaniq.
wild.animal bring.for=NOM.1S=GEN.3S CAUS.eat

‘Wild animals are what it brought for me to feed (me).’ (Ata S1–044)

Let us consider the volitionality of the agent NPs in examples (140) and (141).

Although both sentences means ‘A carried B’, they occur in different kind of discourse situations. The dyadic (-)*m*- clause in (141) is used in the following situation. The agentive participant *mrkyas mlukuy* ‘young men’ went to the forest to check if there was really a dead bear in the stone cave (as the woman had said that she had killed the bear and had left it inside the cave) and they really found a dead bear, so they carried it home. In this case, the agentive NP did not go to the forest for the purpose of carrying the dead bear home. Instead, they carried it home simply because they found it inside the cave. In this case, the agentive NP NONPURPOSEFULLY rather than PURPOSEFULLY carried the bear home.

In contrast, the dyadic *s*- clause in (140) is used in the situation in which the agentive participant ‘it’ (the bear) saw ‘her’ (the woman) and decided to take her as its wife. In this case, the agentive NP took the woman home PURPOSEFULLY or VOLITIONALLY. Based on this pair of sentences, we can conclude that dyadic (-)*m*- clauses are semantically less transitive than dyadic *s*- clauses.

(140) pattern 3c: dyadic *s*- clause with a volitional agent; pattern 3a: dyadic *-un* clause with a volitional agent

nanuʔ spanaʔ=nyaʔ lruʔ, rasun=nyaʔ squʔ skaʔ hlahuy.
so carry.on.the.back.with=GEN.3S and carry=GEN.3S LCV middle forest

‘So, it carried her on its back into the forest.’ (Ata S1-008)

(141) pattern 2: dyadic *m*- clause with a nonvolitional agent

...*musa?* *mrkyas* *mlikuy* *mpana?* *narux* *qasa*....
 ...go young man carry.on.the.back bear that....

‘...some young men went; and carried (back) that bear on their back....’ (Ata S1–048)

Summing up the discussion in this section, we can state that dyadic (-)*m*- clauses are associated with nonvolitional or nonpurposeful agentive NPs, nonindividuated and/or nontotally affected nonagentive NPs, whereas dyadic *-un* clauses, *-an* clauses, and *s*-clauses are associated with volitional or purposeful agentive NPs, highly individuated and/or totally affected nonagentive NPs. These semantic properties suggest that dyadic (-)*m*- clauses are semantically LESS transitive than dyadic *-un* clauses, *-an* clauses, and *s*-clauses. If we correlate the semantic properties with the morphosyntactic properties that we discussed in the preceding section, we find that semantically more transitive dyadic *-un* clauses, *-an* clauses, and *s*-clauses are manifested grammatically as more transitive than semantically less transitive dyadic (-)*m*- clauses.

5.4.3.3 Transitivity in grammar and discourse

Another piece of evidence that supports the ergative analysis comes from the interaction between grammar and discourse. As Hopper and Thompson (1980) point out, the degree of transitivity tends to match the discourse function of grounding. More specifically, HIGHLY TRANSITIVE expressions tend to be associated with the FOREGROUND (e.g., the material supplies the main points (or thread/backbone)) of narrative discourse, whereas LESS TRANSITIVE expressions tend to be associated with the BACKGROUND (e.g., fill in settings, clarify details and explain things).

My study of Atayal textual material, concurring with Rau's (1997) study of Atayal discourse, points out that patterns 3a–c clauses (dyadic *-un* verbs, dyadic *-an* verbs, or dyadic *s-* verbs) are associated with the FOREGROUND of narrative discourse, whereas pattern 2 clauses (dyadic *(-)m-* clauses) are associated with the BACKGROUND of the discourse. If we correlate transitivity in grammar and transitivity in discourse, we can state that patterns 3a–c clauses are transitive clauses that are primarily used in the foreground of narrative discourse, whereas pattern 2 clauses are intransitive clauses that are primarily used in the background of the discourse.³⁸

5.4.4 Summary

In the preceding sections, I have re-examined Squliq Atayal transitivity in terms of morphosyntactic and semantic criteria. Based on the morphosyntactic and semantic properties that Squliq Atayal verbal clauses exhibit, we can conclude that an ergative analysis is the best analysis of Squliq Atayal transitivity.

5.5 ERGATIVITY

Having determined the transitive constructions in Squliq Atayal, it is possible to determine what type of actancy structure Squliq Atayal has.

³⁸ Huang (1994:133) provides frequency counting result to support an ergative analysis of Atayal. She observes that dyadic *nonm* clauses (i.e., dyadic *-un* clauses, dyadic *-an* clauses, and dyadic *s-* clauses) have higher text frequency than dyadic *m-* clauses (52 instances of *nonm* clauses vs. 30 instances of *m-* clauses). I consider the frequency data rather unreliable because the result might vary depending on the genre of the texts that one examine. Instead, I consider the correlation between grounding and transitivity as a more reliable test of transitivity than frequency alone.

Incorporating the observations in section 5.4, we can characterize Squliq Atayal clause structures as in table 5.8. From the table, we can observe that the S of an intransitive clause and the O of a transitive clause are either morphologically unmarked (if they are full NPs) or are expressed by a nominative pronoun, while the A of a transitive clause has a distinct morphological marking (marked by an optional genitive marker *na?* or *nqu?*) or are expressed as a genitive pronoun. This suggests that Squliq Atayal has a pure ergative case-marking system rather than an accusative or a split-ergative system. Unlike Kavalan, Squliq Atayal does not seem to have a productive verbal agreement system. Therefore, based on the case-marking system alone, we can conclude that Squliq Atayal has a pure ergative actancy structure.

TABLE 5.8 SQULIQ ATAYAL ACTANCY STRUCTURE

PATTERN 1: (-)m-V Intr.			N Nom S agent/theme
PATTERN 2: (-)m-V Intr.	(na?/nqu?/sa/squ?) Gen/Lcv E theme	N	N Nom S agent
PATTERN 3A: V-un Tr.	(na?/nqu?) Gen A agent	N	N Nom O theme
PATTERN 3B: V-an Tr.	(na?/nqu?) Gen A agent	N	N Nom O location
PATTERN 3C: s-V Tr.	(na?/nqu?) Gen A agent	N	N Nom O instrument/benefactive

5.6 CONCLUSION

In this chapter, I have re-examined Squliq Atayal clause structures in terms of morphosyntactic and semantic criteria. Four questions have been answered.

First, what are the constraints that condition the relative order of pronouns?

As discussed in 5.2.2, three major constraints condition the order of pronouns in Squliq Atayal. (a) Clitic pronouns ALWAYS precede free forms pronouns (as well as full NPs). (b) The relative order between first person/second person clitic pronouns and third

person clitic pronouns is syntactically conditioned: nominative pronouns ALWAYS precede genitive pronouns. (c) The relative order between first person clitic pronouns and second person clitic pronouns is phonologically conditioned: monosyllabic clitic pronouns MUST precede disyllabic clitic pronouns. However, in events that involve a first person singular genitive and a second person nominative, the “portmanteau pronoun” *misu?* ‘GEN.1S+NOM.2S’ must be used in place of the nonoccurring sequences ***maku? su?* and ***su? maku?*.

Second, are the prenominal monosyllabic forms determiners or nouns in Squaliq Atayal?

As shown in 5.3.1.3, two of the prenominal monosyllabic forms, *qu?* and *squ?*, commonly analyzed as a nominative marker/determiner or a definite determiner and a locative determiner respectively, might be “AUXILIARY NOUNS”, at least in some cases. The fact that *qu?* and *squ?* might be “auxiliary nouns” suggests the possibility that other monosyllabic prenominal elements in Atayal might also be “auxiliary nouns”.

Third, what constitutes the transitive construction in Squaliq Atayal?

As shown in 5.4, based on the morphosyntactic and semantic properties that Squaliq Atayal clauses exhibit, we can conclude that dyadic *-un* clauses, dyadic *-an* clauses, and dyadic *s-* clauses are the transitive constructions, whereas the dyadic *(-)m-* clauses are extended intransitives or pseudo-transitives, a type of intransitive clause.

Fourth, what kind of actancy structure does Squaliq Atayal have (accusative, ergative, or split ergative)?

Based on the discussion in 5.4, we observe that the S of an intransitive clause and the O of a transitive clause have the same morphological marking (for full noun phrases) or morphological shape (for pronouns), whereas the A of a transitive clause has a distinct morphological marking or morphological shape. This suggests that Atayal has an ergative case-marking system. Unlike Kavalan, Squliq Atayal does not seem to have a productive verbal agreement system. Therefore, based on the case-marking system alone, we can conclude that Squliq Atayal has a pure ergative actancy structure.

CHAPTER 6

TRANSITIVITY AND ERGATIVITY IN

CENTRAL CAGAYAN AGTA

6.1 INTRODUCTION

Central Cagayan Agta is an Austronesian language spoken by some 700 to 800 Negritos living in the central region of Cagayan Province in the northern part of the island of Luzon, the Philippines (Mayfield 1987; <http://www.ethnologue.com>). It has been classified as a member of the Cagayan Valley branch of the Northern Cordilleran subgroup of Cordilleran languages (Reid 1989:57).

This chapter re-examines Central Cagayan Agta clause structures from a broad typological perspective and determines the canonical transitive construction and actancy structure of Central Cagayan Agta based on morphosyntactic and semantic criteria. Three major questions will be answered here. First, are the prenominal monosyllabic forms determiners or nouns in Central Cagayan Agta? Second, what constitutes the transitive construction in Central Cagayan Agta? Third, what kind of actancy structure does Central Cagayan Agta have (accusative, ergative, or split ergative)? In order to answer these questions, some basic linguistic facts about Central Cagayan Agta will be provided.

This chapter is organized as follows. Section 6.2 discusses word order in Central Cagayan Agta. Section 6.3 deals with construction markers, the case-marking system and the agreement system in Central Cagayan Agta. Section 6.4 discusses transitivity in

Central Cagayan Agta clause structure. Section 6.5 argues that Central Cagayan Agta is best analyzed as having a pure ergative actancy structure. Section 6.6 summarizes the discussion in this chapter.

6.2 WORD ORDER

In this section, I discuss word order in Central Cagayan Agta. The discussion of word order is divided into five parts: (1) the order of full noun phrases and demonstrative pronouns, (2) the order of personal pronouns, (3) the order of elements in possessive constructions, (4) word order in topicalized sentences, and (5) summary.

6.2.1 The Order of Full Noun Phrases and Demonstrative Pronouns

In this section, the relative order of predicates and full noun phrases and demonstrative pronouns is discussed. The relative order of predicates and personal pronouns will be discussed in section 6.2.2.

Central Cagayan Agta is a right-branching, predicate-initial language. In Central Cagayan Agta, predicates can be either verbal or nonverbal. In a nonverbal clause, a nonverbal predicate occurs in clause-initial position.¹ As shown in (1)–(2), a predicate nominal occurs clause initially and is followed by a nonpredicate noun phrase, which can be a nominative full noun phrase or a complex noun phrase introduced by the auxiliary noun *ya*.

¹Clausal conjunctions can occur to the left of a predicate, whether verbal or nonverbal. To simplify the discussion, I leave out clausal conjunctions in my discussion.

(1) nominal clause: NP (Predicate) NP (Nominative)²

a **yan** ya uma=in o, atākkun ya bali=en....³
 CONJ this NOM swidden=this/here INJ near NOM house=that
 PREDICATE NOMINATIVE

‘This here is the swidden; the house is nearby.’ (Agt 8–054)

(2) nominal clause: NP (Predicate) *ya*

...*Ute* *Batilu* ya *mangayāg* teyāk.
 Uncle Batilu NOM call LCV.IS

‘...Uncle Batilu was the one who called me.’ (Agt 1–092)

Verbal clauses can be headed by either an auxiliary verb or a lexical verb. In a pragmatically unmarked verbal clause, the main verbal predicate precedes ALL other elements (e.g., noun phrases, dependent verbs, adverbs, etc.), as in (3).

(3) verbal clause headed by an existential verb: **Exist=Adv** *ya* NP

ittā=n ya pana=na=en.
 EXIST=already NOM arrow=GEN.3S=that

‘I got his arrow.’ (Agt 8–042)

Three major verbal clause patterns are found in Central Cagayan Agta: (i) Pattern 1: monadic intransitive clauses, (ii) Pattern 2: dyadic *-um-*, *ma-*, *-um-*, *mag-*, or *maN-* clauses, and (iii) Pattern 3: (a) dyadic *-an* clauses, (b) dyadic *-ān* clauses, (c) dyadic *i-* clauses, and (d) dyadic *i-* *-ān* clauses.⁴ In pattern 1, the lexical verbs are either

² Unless otherwise indicated, all Central Cagayan Agta data used in this study are taken from the eleven texts in Mayfield (1987). The example reference numbers following the free translation are organized according to the order that they appeared in Mayfield’s monograph. For example, Agt 8–054 means that the example is the 54th sentence of Central Cagayan Text 8.

³ The Central Cagayan Agta orthography used here is the same as that used by Mayfield (1987). The symbol *a* stands for a mid central vowel; *ā* stands for a low central vowel (represented as *ā* or *á* in other publications on this language); *ng* stands for velar nasal; and – stands for glottal stop. Glottal stop is written only in consonant clusters. There are no vowel clusters in Central Cagayan Agta; hence contiguous vowels in text must be pronounced with an intervocalic glottal stop.

⁴ The Central Cagayan Agta reflexes of PAN **-um-*, PMP **maR-*, PMP **maN-*, PAN **-en*, PAN **-an*, PAN **Si-* (or PMP **hi-*) are *-um-*, *mag-*, *maN-*, *-an*, *-ān*, and *i-*, respectively.

morphologically unmarked or have the morphological shape *-um-*, *ma-*, *mag-*, *maN-*.⁵ In pattern 2, the dyadic lexical verbs are either morphologically unmarked or have the morphological shape *-um-*, *ma-*, *mag-*, or *maN-*. In patterns 3a–3d, the dyadic lexical verbs have the morphological shape *-an*, *-ãñ*, *i-*, and *i- -ãñ* respectively.

In pattern 1 (a monadic intransitive clause), if a monadic intransitive verb functions as the main verbal predicate, it will occur clause initially and is followed by a nominative full NP or demonstrative pronoun, as in (4)–(8).

- (4) pattern 1: monadic *-um-* clause with one (personal) full NP: ***-um-V NP (Nom)***

ã sangaw, te dumatang ig aboy ig Leting,
 CONJ later because/so.that arrive NOM.PL daughter NOM.PL Leting

ã *nebâr=da* teyãk ta *naliwatãñ=da* ya arãw na boda.
 CONJ said=GEN.3P LCV.1S TA forgotten=GEN.3P NOM day GEN wedding
 [*nebâr* < *na-* + *ibâr*]

‘Well, by and by when my daughter Leting and her companions arrived, they told me that they (the other party) had forgotten what day the wedding celebration was to be.’ (Agt 1–001)

- (5) pattern 1: monadic *-um-* clause with one (nonpersonal) full NP: ***-um-V NP (Nom)***

umange=n ya katuhangãñ=k=en, en=na *inalãp*.
 go=already NOM parent.in.law=GEN.1S=that/there go=GEN.3S got

‘My parent-in-law went and got it.’ (Agt 8–072)

- (6) pattern 1: monadic *ma-* clause with one (personal) full NP: ***na-V NP (Nom)***

nasidug hapa ya Mandaripãñ.
 asleep also NOM Mandaripan

‘Mandaripan also went to sleep.’ (Agt 7–008)

⁵ Like Tagalog, Ilokano, and other Philippine languages, the formative *ma-* is associated with a number of grammatical functions. For example, it can be associated with the formation of stative verbs, the formation of true passive verbs (i.e., dynamic *ma-* verbs that take only a nonagentive nominative NP), and the formation of the potentive form (i.e., dynamic *ma-*, *ma- -ãñ*, or *me-* forms that occur with both an agentive nominative NP and a nonagentive nominative NP) of verbs that occur in pattern 3 clauses. Please refer to Newell (1993), Foley and Van Valin (1984), Brainard (1994a, 1996, 1997) for the discussion of *ma-* forms in Batad Ifugao, Tagalog, and Karao, respectively.

- (7) pattern 1: monadic *mag*- clause with one demonstrative pronoun: *mag*-V NP (Nom)

...atsi *nag*ñāṅk yen.
INJ gave.birth that(NOM)

‘...Oh—oh, it has given birth.’ (Agt 8–086)

- (8) pattern 1: monadic *mag*- clause with one (personal) full NP: *mag*-V NP (Nom)

*mag*liplipay ya Mandaripān....
look.around NOM Mandaripan

‘Mandaripan looked around....’ (Agt 7–047)

In clauses containing two or more full NPs, that is, pattern 2 and patterns 3a–3d clauses, the preferred word order is the agent preceding the theme (or location, instrument, or beneficiary), regardless of their grammatical relations.

In pattern 2 (a dyadic *-um-*, *ma-*, *mag-*, or *maN-* clause), if a dyadic *-um-*, *ma-*, *mag-*, or *maN-* verb occurs with two full NPs, the lexical verb will occur clause initially and is first followed by a nominative agent, and then by an oblique theme, as in (9). In a dyadic *-um-*, *ma-*, *mag-*, *maN-* clause that contains a full NP and a pronominal clitic, regardless of being headed by an auxiliary verb or by a lexical verb, the only full NP in the clause always occurs after the dyadic *-um-*, *ma-*, *mag-*, or *maN-* verb, as in (10)–(12).

- (9) pattern 2: dyadic *mag*- clause with two full NPs: *mag*-V NP (Nom) NP (Obl)

*mag*galgal ya lalaki ta kayu ta ragādi.
saw NOM man OBL tree LCV two.man.saw
PREDICATE AGENT THEME

‘The man is sawing a tree with a two-man saw.’ (data from Mayfield 1987:123)

- (10) pattern 2: dyadic *mag-* clause with one pronominal clitic and one full NP:
nag-V=Nom NP (Lcv) NP (Lcv) NP (Obl)

...te *nagsosaw=āk* ta wer=ewan, dalān=ewan, *ta uway*,
 because trimmed=NOM.1S LCV creek=that trail=that OBL rattan

imange=kid.

went=NOM.3P

(*imange* < *-in-* + *-um-* + *ange*)

‘...because I was trimming rattan on the trail at the nearby creek. So they went.’

(Agt 1–005)

- (11) pattern 2: dyadic *maN-* and *mag-* clauses with one pronominal clitic and one full NP: *e (Aux)=Nom naN-V nag-V NP (Obl)*

e=kid *nangalāp* *nagbunāg* *ta danum*, *nagbunāg=kid*
 go=NOM.3P got transported OBL water transported=NOM.3P

āddet ta mahimat...
 end/until LCV dusk

‘They went to get and transport water; they transported until dusk....’ (Agt 1–042)

- (12) pattern 2: dyadic *maN-* clause with one pronominal clitic and one full NP:
maN-V=Nom NP (Obl)

...*mangalāp=kām* *ta uway=ina* te takkal=muy....
 get=NOM.2P OBL rattan=that for arm.band=GEN.2P

‘...take some of that rattan for your (pl.) armband....’ (Agt 5–001)

In patterns 3a–3d (dyadic *-an* clauses, dyadic *-ān* clauses, dyadic *i-* clauses, and dyadic *i-* *-ān* clauses), if a dyadic *-an* verb, dyadic *-ān* verb, dyadic *i-* verb, or dyadic *i-* *-ān* verb functions as the main verbal predicate, it will occur clause initially and is first followed by an agentive genitive NP, and then by a nonagentive nominative NP, as in (13) and (15). If a dyadic *-an* verb, dyadic *-ān* verb, dyadic *i-* verb, or dyadic *i-* *-ān* verb functions as a dependent verb of an auxiliary predicate, the main auxiliary predicate will occur clause initially and will be followed (by other auxiliary verbs and) by the lexical

verb, which in turn is followed by an agentive genitive NP and then by a nonagentive nominative NP, as in (14).

- (13) pattern 3a: dyadic *-an* clause with two full NPs: *-in-V NP (Gen) NP (Nom)*

...te	ginavwāt	na	atu=en	ya	ugta=en,	toro	na	ugta. ⁶
because	attacked	GEN	dog=that	NOM	deer=that	big.buck	LIG	deer
	V-AN		AGENT		THEME			

‘...because the dog attacked the deer, (which was) a big buck.’ (Agt 8–013)

- (14) pattern 3a: dyadic *-an* clause with two full NPs: *en=Gen Adv V-an NP (Gen) NP (Nom)*

kuga	en=na	hã	bangātan	na	Mandaripān	ya	māmānuk=en.
immediately	go=GEN.IS	again	butcher	GEN	Mandaripan	NOM	bird=that
	AUX		V-AN		AGENT		THEME

‘Mandaripan goes off again to butcher the bird.’ (Agt 7–014)

- (15) pattern 3c: dyadic *-i* clause with two full NPs: *ne-V NP (Gen) NP (Nom)*

...nelubeg	na	ugta	ya	anāk=k=en	ã	nasi=n....
trod.on	GEN	deer	NOM	child=GEN.IS=that	CONJ	dead=already/now
I-V		AGENT		THEME		

(nelubeg < na- + i- + lubeg)⁷

‘The deer trod on my child and it’s dead now.’ (Agt 4–013)

In patterns 3a–d (a dyadic *-an* clause, dyadic *-ān* clause, dyadic *i-* clause, and dyadic *i- -ān* clause) that contain a full NP (or demonstrative pronoun) and a pronominal clitic, regardless of being headed by an auxiliary verb or by a lexical verb, the only full NP (or demonstrative pronoun) in the clause always occurs after (but not necessarily immediately after) the dyadic *-an* verb, dyadic *-ān* verb, dyadic *i-* verb, or dyadic *i- -ān* verb, as in (16)–(19).

⁶ Like other Philippine type languages, the perfective aspect of dyadic *-an* verbs in Central Cagayan Agta has a morphological shape *-in-* (rather than the nonoccurring form ***-in- -an*).

⁷ The form *ne-* is the perfective aspect of the potentive form of dyadic *i-* verbs. Like other Philippine languages (such as Tagalog, Ilokano, etc.), the potentive form in Central Cagayan Agta is used to express meanings such as “...be able to...” or “...happen to”.

- (16) pattern 3a: dyadic *-an* clause with one pronominal clitic and one full NP:

V-*-an*=Gen...NP (Nom)

bakkān=da kân ya hukal=na=en...
 smash=GEN.3P REPORT.SP NOM seed=GEN.3S=that
 (bakkān < bakka + -an)

‘They would smash the seed,....’ (Agt 5–016)

- (17) pattern 3a: dyadic *-an* clause with one pronominal clitic and one demonstrative pronoun: **V-*-an*=Gen Adv Dem (Nom)**

...am makalong=kid ta lamān ā alungtan=*da* hapa *yen*,
 if shoot=NOM.3P OBL wild.pig CONJ eat.alone=GEN.3P also that(NOM)
 iasal=*da* hapa ta afuy,....
 roast=GEN.3P also LCV fire

‘...if they are able to shoot a wild pig, they eat that by itself; they roast it in the fire....’ (Agt 5–014)

- (18) pattern 3b: dyadic *-ān* clause with one pronominal clitic and one full NP:

V-*-ān*=Gen NP (Nom)

indagān=*mi* bit *i* aboy=*en*, te ange gumātāng
 wait.for=GEN.1PE for.a.moment NOM daughter=that because go buy
 ta baggāt, te balonan=*muy*, petta ittā hapa kānan=*muy* ta
 OBL rice because travel=GEN.2P so.that EXIST also eat=GEN.2P LCV
 bali=*muy*....
 house=GEN.2P

‘We (ex.) are waiting for the daughter because she went to buy some rice for your (pl.) travel provisions, so you (pl.) will have something to eat at home....’ (Agt 1–025)

- (19) pattern 3c: dyadic *i-* clause with one pronominal clitic and one full NP:

***i*-V=Gen NP (Nom)**

a intu paha ibār=*ku* teko, Ginyamor, kuman=*na*
 CONJ TOP.3S yet tell=GEN.1S LCV.2S Ginyamor similar=GEN.3S

iwahad=*mu* minā *ya* *dulay na nonot*,....
 throw.with=GEN.2S should NOM bad LIG thoughts

‘And another thing I will tell you (sg.), Ginyamor, it is like this, you (sg.) should throw away any bad ideas,....’ (Agt 2–003)

6.2.2 The Order of Personal Pronouns

Like Squaliq Atayal, pronouns in Central Cagayan Agta can be divided into two types: clitic pronouns and free form pronouns. These two types of pronouns differ in their syntactic distribution. Clitic pronouns are phonologically attached to the main predicate of a clause, whereas free form pronouns occur after, but not necessarily immediately after, a lexical verb (cf. (20)–(22) vs. (22)). When the main predicate of a clause is a lexical verb, a clitic pronoun is attached to the lexical predicate, as in (20) and (23). When the main predicate of a clause is an auxiliary verb, a clitic pronoun is attached to the main auxiliary predicate, rather than the lexical verb, as in (21) and (24).

- (20) clitic pronoun immediately following the main predicate (a lexical verb) of a clause: **V-an=Gen**

a *itān=ku* *ā* *awān hamān,* *awān hamān,*....
 CONJ see=GEN.IS CONJ NEG surprisingly NEG surprisingly
 (*itān* < *ita* + *-an*)

‘I looked and surprisingly it was not there, it was not there.’ (Agt 8–027)

- (21) clitic pronoun immediately following the main predicate (an auxiliary) of a clause: **en(Aux)=Gen V-an NP (Nom) NP (Lcv)**

en=ku *itān* *ya* *atu=en* *ugugan* *ta* *danum=en.*
 go=GEN.IS see NOM dog=that bark LCV water=that

‘I went to see what the dog was barking at in the water.’ (Agt 8–026)

- (22) clitic pronoun immediately following the main predicate (a lexical verb) of a clause; free form pronoun not immediately following a lexical verb:

V=Nom=Adv Lcv

sangaw *tekami=en* *nahulāt nagbabida* *ā* *imange=kid=na*
 later LCV.1PE=that bored were.talking CONJ went/came=NOM.3P=already

teyāk.

LCV.IS

‘Later on, when we (ex.) were weary of conversing, they came up to me.’ (Agt 1–016)

- (23) lexical verb as the main predicate: **maN-V=Nom NP (Obl)**

mangwa=ka ta hutotug=mu.
do/make=NOM.2S OBL bow=GEN.2S

‘Make yourself (sg.) a little bow.’ (Agt 7–003)

- (24) negative auxiliary as the main predicate: **Neg=Gen=Nom Adv Adv i-V**

ara awe=k=kid lā bit ikaskāsu.
INJ NEG=GEN.1S=NOM.3P only/just for.a.moment acknowledge

‘Well, I won’t acknowledge them yet.’ (Agt 1–015)

In pattern 1 (a monadic intransitive clause), if a monadic intransitive verb functions as the main verbal predicate, it will occur clause initially and is immediately followed by a nominative personal pronoun and other elements (such as adverbs, quantifiers, etc.), as in (25)–(27). If an auxiliary verb is the main predicate, it will occur clause initially and is immediately followed by a nominative pronoun (and adverbs), and then by a lexical verb, as in (28).

- (25) pattern 1: monadic *-um-* clause with one pronominal clitic: **-um-V=Nom=Adv**

ā umange=kami=n, magkakāmpat=kami=n ngāmin,....
CONJ go=NOM.1PE=already assemble=NOM.1PE=already all
(*magkakāmpat* < *mag-* + *Ca-* + *kāmpat*; *Ca-* reduplication indicates/agrees with the plurality of the agent)

‘So we (ex.) went, we (ex.) were all assembled together....’ (Agt 1–048)

- (26) pattern 1: monadic *mag-* clause with one pronominal clitic: **nag-V=Nom=Adv**

gafu ta kuman=en nagtoli=kid=na.
reason LCV similar=that returned=NOM.3P=already

‘As the result of that, they came back again.’ (Agt 1–006)

- (27) pattern 1: monadic intransitive (*maN-*) clause with one pronominal clitic:
(*mang-*)V=Nom

...*e=kām* mantu ta bali, te *mangān=kitām* bit...
 go/come=NOM.2P then LCV house because eat=NOM.1PI for.a.moment
 (*mangān* < *maN-* + *kān*)

‘...Come on to the house and we (in.) will all eat first....’ (Agt 1–022)

- (28) pattern 1: monadic intransitive clause with one pronominal clitic: *e* (*Aux*)=Nom
Adv *ma-V*

e=yāk bit *masidug.*
 go=NOM.1S for.a.while sleep
 AUX=NOM ADV *MA-V*

‘I am going to sleep for a while.’ (Agt 7–011)

In patterns 3a–3d (dyadic *-an* clauses, dyadic *-ān* clauses, dyadic *i-* clauses, and dyadic *i-* *-ān* clauses) with two pronominal clitics,⁸ regardless of being headed by a lexical verb or an auxiliary verb, the main verbal predicate will occur clause initially and is first followed by an agentive genitive pronoun, and then by a nonagentive nominative pronoun, as in (29)–(34).

- (29) pattern 3a: dyadic *-an* clause with two pronominal clitics: **V-*an*=Gen=Nom**

“*ā* ikamuy hapa, te *mabannāg=kid* *naggagāsa*, *ā*
 CONJ TOP.2P also because tired=NOM.3P were.beating.gong CONJ

tubbatan=muy=kid hapa,” *kun=ku*, *ā* “on”.
 relieve=GEN.2P=NOM.3P also QUOT=GEN.1S CONJ yes

“‘You (pl.) also (do it) because they are tired beating the gongs; you (pl.) relieve them sometimes too,’ I said, ‘All right.’” (Agt 1–049)

- (30) pattern 3b: triadic *-ān* clause with two pronominal clitics: **V-*ān*=Gen=Nom NP (Obl)**

āy *atadān=mi=kid* ta *baggāt=en.*
 INJ give=GEN.1PE=NOM.3P OBL rice=that

‘So we (ex.) supplied with them some of the rice.’ (Agt 1–031)

⁸ Pattern 2 clauses do not take two pronominal NPs; therefore, they are excluded from the discussion here.

- (31) pattern 3b: dyadic *-ān* clause with two pronominal clitics:

en(Aux)=Gen=Nom=Adv V-ān

en=*da=kid*=na tinuludān ta inafuy.
go=GEN.3P=NOM.3P=already escorted LCV cooked.rice

‘And they went and brought them cooked rice.’ (Agt 1–057)

- (32) pattern 3c: dyadic *i-* clause with two pronominal clitics: **Neg=Gen=Nom Adv Adv i-V**

ara *awe=k=kid* lā bit ikaskāsu.
INJ NEG=GEN.1S=NOM.3P only/just for.a.moment acknowledge

‘Well, I won’t acknowledge them yet.’ (Agt 1–015)

- (33) pattern 3c: dyadic *i-* clause with two pronominal clitics: **i-V=Gen=Nom**

gafu ta kuman=en ya bida=da awān hud
since LCV similar=that NOM talk=GEN NEG RHETORIC.NEG

ikāllak=*ku=kid* hapa,....
pity.to=GEN.1S=NOM.3P also

‘Since that was their story, should I not pity them,....’ (Agt 1–096)

- (34) pattern 3c: dyadic *i-* clause with two pronominal clitics:

en(Aux)=Gen=Nom=Adv i-V NP (Lev)

...en=*da=ka*=n itulud ta arigi na rantay....
go=GEN.3P=NOM.2S=already escort.with LCV post GEN bridge

‘...they are going to take you (sg.) to the supports for the bridge.’ (Agt 3–007)

6.2.3 The Order of Elements in Possessive Constructions

Having discussed the order of full NPs and pronominal NPs in unmarked sentence structures, I now turn to the discussion of the relative order of elements of noun phrases. In this section, I focus my discussion on the order between possessors and possessed nouns in possessive constructions.

In Central Cagayan Agta, possessive constructions resemble unmarked main clause structures in having the head noun occur before its attribute. In a single possessive

construction, the head noun (i.e., the possessed noun) precedes the dependent noun (i.e., the possessor), as in (35)–(38). In a multiple possessive construction, the possessed noun phrase precedes the dependent noun phrases, and each dependent noun phrase can be further divided into a possessed noun followed by a possessor, as in (38)–(39).

(35) single possessive construction: N [*na* N]

tekid *nabalin=na* *mangān*, *nagpedda=kami* ta *umag=en*,
LCV.3P finished=already eat lay.down=NOM.1PE LCV inside=that

umag [*na bali*].

inside GEN house

(*mangān* < *mang-* + *kān*)

‘When they had finished eating, we (ex.) lay down inside, inside the house.’
(Agt 1–024)

(36) single possessive construction: N [*ni* N]

ay, *en=da* *inakkāt* ta **ba**li [*ni Homān*], *yen ya*
CONJ go=GEN.3P lifted LCV house GEN Homan that NOM

nangigafun=da.

source=GEN.3P

(*nangigafun* < *nang-* + *i-* + *gafu* + *-ān*)

‘Rather, they went and lifted (her) down from Homan’s house; that is where they started from.’ (Agt 1–084)

(37) single possessive construction: N[=*Gen*]

...*iatad=ku* *teko ya* *baggāt=in ā* *iko=n* *ya*
give=GEN.1S LCV.2S NOM rice=this CONJ PRED.2S=already NOM

makkāmu ta **buyut**[=*mu*]....

know LCV group=GEN.2S

‘...I will give this rice to you (sg.) and you (sg.) be responsible for your (sg.) group....’ (Agt 1–099)

(38) single and multiple possessive constructions: N[=Gen]; N [*na* N[=Gen]]

en=nāk *binolsān* *na* **kabalay**[=k]=in *ta* *limā* *pesuk*,⁹
 go=GEN.3S+NOM.1S pocketed GEN ASS.house=GEN.1S=this LCV five peso

ā *kuman*=kami *na* *kwa*=en *maglelehut* *ay*, *te*
 CONJ similar=NOM.1PE GEN thing=that circling INJ because

awe=na *naapagān* *ya* **blosa** [*na* **saping**[=k]]=en.
 NEG=GEN.3S found NOM pocket GEN short.pants=GEN.1S=that

‘My *kabalay* came to put five pesos in my pocket, and it is like we (ex.) were what-you-call-it, going around in circles, because he could not find the pocket of my short pants.’ (Agt 1–051)

(39) multiple possessive constructions: N [*na* N [*ni* N]]

ā *ināyagān*=dāk=na *hapa* *ta* **talekud** [*na* **bali**
 CONJ called=GEN.3P+NOM.1S=already also LCV behind GEN house

[*ni* **Aleng**]].

GEN son

(=*dāk* ‘GEN.3P + NOM.1S’ <=*da* ‘GEN.3P’ +=*āk* ‘NOM.1S’)

‘And they called me behind my son’s house.’ (Agt 1–091)

6.2.4 Word Order in Topicalized sentences

Having discussed the word order of elements in unmarked sentence structures and in possessive constructions, I now turn to the discussion of marked sentence structures.

While the basic word order in clauses is predicate-initial, Central Cagayan Agta, like Kavalan and Atayal, also allows an alternate sentence pattern in which a topic, usually a noun phrase, a locative or temporal phrase, precedes the predicate. A topic is indicated by its prepredicate position (and intervening pause), as in (40)–(44). However, unlike Kavalan and Atayal, there seems to be NO (obligatory or optional) topic linker occurring between a topic and the rest of the sentence in Central Cagayan Agta. Notice that when a nominative NP is topicalized, the sentential topic is expressed by a topic/predicate

⁹ Mayfield (1987:16) comments that “*kabalay*, the term of relationship between members of a marriage relationship (from *ka*- ‘fellow participant’ + *balay* ‘house’, an Ilokano term)....”

pronoun and the main clause can take a resumptive nominative pronoun that is coreferential with the topic, as in (40)a–b.

(40) topic/predicate pronoun (with a deictic determiner) as a topic:

- a. *iyāk=in* *e=yāk* *namān* *ta* *talun...*
 TOP.1S=here go=NOM.1S at.last LCV forest

‘As for me here, I am going to the forest again.’ (Agt 8–070)

- b. ...*te* *iyāk=in* *dinagdag=nāk* *na* *atu=in...*
 because TOP.1S=here chased=GEN.3S+NOM.1S GEN dog=that
 (=nāk ‘GEN.3S + NOM.1S’ < =na ‘GEN.3S’ + =āk ‘NOM.1S’)

‘...because, as for me here, that dog chased me....’ (Agt 4–010)

(41) demonstrative as a topic:

- a *ye-yen* *hapa*, *am* *bikāl* *o* *am* *kayu* *ã* *mabalin*
 CONJ that also if bamboo or if wood CONJ can/possible

- lã* *ya* *ikim* *ten* *ã* *afuy* *yen.*
 just NOM like.this+GEN.2S there CONJ fire that

‘Now about that, if (there is) bamboo or wood, you (sg.) can just put it there and (there will) be fire.’ (Agt 5–007)

(42) full noun phrase as a topic:

- ya* *panã=k* *ã* *nekusar=ku* *ay.*
 NOM arrow=GEN.1S CONJ discarded=GEN.1S INJ

‘I had let go of my bow and arrows.’ (Agt 8–036)

(43) full noun phrase (locative expression) as a topic:

- ye* *ta* *Ugãm=en*, *yen* *ya* *nagyanãn=mi.*
 INJ LCV Ugãm=there that NOM stayed=GEN.1PE

‘There, at Ugãm, that’s where we (ex.) were living.’ (Agt 8–081)

(44) full noun phrase (temporal expression) as a topic:

- ay* *ta* *lãlãkwāt* *nagafuy=kid=na* *hã.*
 INJ LCV morning cooked.rice=NOM.3P=already again

‘Then in the morning, they cooked rice again.’ (Agt 1–073)

6.2.5 Summary

Let me summarize the discussion of Central Cagayan Agta word order in the previous sections.

First, Central Cagayan Agta is basically a right-branching, predicate-initial language.

Second, main predicates (verbal or nonverbal; auxiliary or nonauxiliary) exhibit the following features: (a) they occur clause initially; (b) they attract clitic pronouns.

Third, clitic pronouns differ from free form pronouns (as well as full NPs and demonstrative pronouns) in their syntactic distribution. In verbal clauses headed by an auxiliary verb, clitic pronouns occur IMMEDIATELY AFTER the FIRST AUXILIARY in the clause, whereas free form pronouns (as well as full NPs and demonstrative) occur after (but NOT NECESSARILY immediately after) the LEXICAL VERB.

Fourth, in clauses that involve (at least) two full noun phrases, an agentive full noun phrase must precede a nonagentive full noun phrase, regardless of their grammatical relations, if they are not case-marked by a class of monosyllabic pronominal elements.

Fifth, in clauses that involve one pronominal clitic and one full noun phrase (or demonstrative pronoun), the pronominal clitic always precedes the full noun phrase (or demonstrative pronoun).

Sixth, in clauses that involve two pronominal clitics, the agentive genitive clitic pronoun precedes the nonagentive nominative clitic pronoun.

6.3 CONSTRUCTION MARKERS AND CASE-MARKING SYSTEMS

In this section, I discuss construction markers and the case marking system in Central Cagayan Agta. Section 6.3.1 discusses the forms and functions of three types of construction markers: ligatures, deictic elements (determiners, locative adverbs, and demonstrative pronouns), and case-marking forms. Section 6.3.2 deals with the Central Cagayan pronominal system.

6.3.1 Construction Markers

Like Kavalan, Squliq Atayal, and many other western Austronesian languages, Central Cagayan Agta has elements that can be identified as “ligatures”, and also a class of forms that are the equivalents of so-called “determiners” in other western Austronesian languages. However, unlike Kavalan and Squliq Atayal, in a topicalized construction, Central Cagayan Agta does not seem to use any element, that is, a topic linker, to link a topicalized NP with the rest of the sentence. Moreover, Central Cagayan Agta makes use of deictic elements, such as deictic determiners, locative adverbs, and demonstrative pronouns, to express distinction of reference with respect to location or time.

6.3.1.1 Ligatures

The first type of construction marker to be introduced is ligatures.

Like Kavalan, Squliq Atayal, and many other western Austronesian languages, Central Cagayan Agta also makes use of a special type of construction marker, commonly referred to as a “ligature” or “linker”, to link a head (usually a noun or a verb)

with its following attribute (e.g., a noun, possessor, or relative clause). As already discussed in Chapters 4 and 5, the categorical status of “ligatures” is not uncontroversial (see Chapter 5, section 5.3.1.2 for discussion).

In Central Cagayan Agta, one ligature, *na*, is found.¹⁰ Like the ligatures in other western Austronesian languages, the form *na* is used to link a head noun with its dependent, as in (45)–(49).

(45) *na* links a head noun with a dependent noun:

ittā hapa ya maglāku=kid=en ta pānsit, ay sã
 EXIST also NOM sell=NOM.3P=that OBL noodles INJ all
 negabur=kid=na=hã naggagātāng, pase tinutunuduk
 crowded=NOM.3P=already=again were.buying as.well.as skewered
 na dekat,....
 LIG rice.candy

‘There were also some people selling noodles, and they all crowded around to buy some, as well as skewered rice candy,....’ (Agt 1–060)

(46) *na* links a head noun (a demonstrative) with a dependent noun (abstract noun):

nakāru ye-yen na bisin namān na.
 severe that LIG hunger at.last already

‘That famine was very severe.’ (Agt 8–006)

¹⁰ Mayfield (1987) reports the existence of another ligature (“relative clause marker” in his term), *nga*, which is used to link a head noun (a demonstrative) with a relative clause. This form appears only once in the eleven Central Cagayan Agta texts that I examined. It is possibly a borrowing from Ilokano.

(1) ...iatad=ku=teko ya baggāt=in ā iko=n ya
 give=GEN.1S=LCV.2S NOM rice=this CONJ PRED.2S=already NOM
 makkāmu ta buyut=mu kid=ina nga mangatad....
 know LCV group=GEN.2S PL=this LIG give

‘...I will give this rice to you (sg.) and you (sg.) be the one responsible to give it/them to your (sg.) own group....’ (Agt 1–099)

(47) *na* links a head noun with a dependent relative clause:

...te *masikan* *haman* *ya* *asok* *na* *paddayan=mi=n*
 because strong surprisingly NOM smoke LIG make=GEN.1PE=already
na *hunut*
 GEN torch

‘...because the smoke of the torches we (ex.) make is strong.’ (Agt 11–022)

(48) *na* links a head noun (a numeral) with a dependent noun:

...*mangalāp=ka* ta *magatut* *na* *bāhuy*, *dwāgatut* *na*
 get=NOM.2S OBL hundred LIG pig two.hundred LIG
ānwāng, *ikid* *na* *magatut* *na* *bāka*.
 water.buffalo and GEN hundred LIG cow

‘...you (sg.) get one hundred pigs, two hundred water buffalos, and one hundred cows.’ (Agt 7–042)

(49) *na* links a head noun (a quantifier) with a dependent noun:

itān=na *ya* *pirāk*, *adāddu* *na* *pirāk*, *pāke* *adāddu* *na* *pirāk*.
 see=GEN.3S NOM money many LIG money really many LIG money
 (*itān* < *ita* + *-ān*)

‘He saw money, much money, really much money.’ (Agt 7–034)

6.3.1.2 Deictic elements: Deictic determiners, locative adverbs, and demonstrative pronouns

The second type of construction marker to be introduced is deictic elements.

Three subtypes of deictic elements are found in Central Cagayan Agta: deictic determiners, locative adverbs, and demonstrative pronouns.

6.3.1.2.1 Deictic determiners and locative adverbs

Deictic determiners, previously referred to as “identifiers” (Mayfield 1987:114) or as a type of “impersonal pronouns” (P. Healey 1960:89), are deictic elements that provide local or temporal information about entities in an event. They can be used to distinguish

entities in space or time, but CANNOT be used to distinguish the grammatical functions of noun phrases.

In previous analyses, Central Cagayan Agta has been described as having a deictic determiner system similar to the one in table 6.1 (based on Mayfield 1987:114; P. Healey 1960:89).

TABLE 6.1 CENTRAL CAGAYAN AGTA DEICTIC DETERMINERS/LOCATIVE ADVERBS

	SINGULAR	PLURAL
SPEAKER	=in	kid=in
HEARER	=ina	kid=ina
SEMIREMOTE	=ewan	kid=ewan
REMOTE	=en	kid=en

As illustrated in table 6.1, Central Cagayan Agta deictic determiners distinguish four deictic positions ('close to the speaker', 'close to hearer', 'semiremote', 'remote'). Each of these four deictic positions can have both a singular form and a plural form. The singular forms are enclitics that are phonologically attached to the noun that they specify. The plural forms are formed by addition of the formative *kid* to the beginning part of the singular forms.

These forms can attach to or follow a nonpersonal noun phrase (as in (50)–(51)), a personal noun (as in (52)), a possessed noun phrase (as in (52) and (54)), a topic/predicate pronoun (as in (53)), or an oblique pronoun (as in (54)). The fact that they appear at the outer edge of a possessed noun phrase strongly implies that they are determiners.

- (50) deictic determiner cliticizes to a nonpersonal common noun phrase:

a *timullu=yāk* tagad ta *ulu=na=en*.
 CONJ went.up=NOM.1S toward LCV head=GEN.3S=that/there

‘So I went up towards the front of it.’ (Agt 10–009)

- (51) deictic determiner cliticizes to a nonpersonal noun (place name):

“on, *ikitām* yana anupan ya ulu na *tagumay=en*,” kun=na.
 yes PRED.1PI that hunt NOM head GEN Tagumay=that QUOT=GEN.3S

‘“Yes, we (in.) will be the ones to hunt the head of the Tagumay Creek,” he said.’ (Agt 8–010)

- (52) deictic determiner cliticizes to a personal noun; plural deictic determiner following a possessed noun:

...te *ayagān=ku* i *Ipig=en* ta pana=na *kid=en*...
 because call=GEN.1S NOM Ipig=that/there LCV arrow=GEN.3S PL=that

‘...because I will call Ipig for those arrows of his.’ (Agt 8–037)

- (53) deictic determiner cliticizes to a topic/predicate pronoun:

iyāk=in e=yāk namān ta talun...
 TOP.1S=here go=NOM.1S at.last LCV forest

‘As for me here, I am going to the forest again.’ (Agt 8–070)

- (54) deictic determiner cliticizes to an oblique pronoun; plural deictic determiner following a possessed noun:

tekami=*en* *naggabgābi* ta kofun=mi=in, en=na=kami
 LCV.1PE=that came.early LCV friend=GEN.1PE=this go=GEN.3S=NOM.1PE

inalāp malat, tatākit ya ānāk=ku *kid=in*, ta lālākwāt.¹¹
 got certainly pain NOM child=GEN.1S PL=this LCV morning

‘The time when we (ex.) left early in the morning with our (ex.) friend, he came and got us (ex.) for sure; these children of mine were sick, in the early morning.’ (Agt 10–001)

The homophonous forms of the singular deictic determiners can attach to verbs, as in

- (55)–(56). When they are cliticized to verbs, they are considered to be locative adverbs.

¹¹ Mayfield (1987:83) comments that *tatakit* ‘sick’ is a very unusual contracted form of *nagtatakit*.

Locative adverbs provide local or temporal information about an event itself (rather than about a particular entity in an event).

(55) locative adverb cliticizes to an existential verb:

o, ittā=*in* ya barak=*in*
 INJ EXIST=here NOM baby.wild.pig=this/here

‘Okay, there is a piglet here.’ (Agt 8–096)

(56) locative adverb cliticizes to a directional auxiliary:

a em=*ina* alapan ay te maglangan=*ka=n*
 CONJ go+GEN.2S=there get INJ because singe=NOM.2S=already

te mangigup=*ãk*.
 because eat.meat=NOM.1S

‘Well, go there and get it and singe the hair, because I want to eat some meat.’
 (Agt 8–097)

6.3.1.2.2 Demonstrative pronouns and locative adverbs

In addition to being homophonous with deictic determiners, locative adverbs can also be homophonous with some of the demonstrative pronominal forms.

In previous analyses, Central Cagayan Agta has been described as having a demonstrative pronoun system similar to the one in table 6.2 (based on Mayfield 1987:114; P. Healey 1960:89).

TABLE 6.2 PREVIOUS ANALYSES OF CENTRAL CAGAYAN AGTA DEMONSTRATIVES

		NOMINATIVE	GENITIVE	OBLIQUE
SPEAKER	SINGULAR	yan/ye-yan/yeyan	na inin	ta isin/sin
	PLURAL	yeyan kid /ye-yan	na inin kid	
HEARER	SINGULAR	yana/ye-yana/yeyana	na inina	ta isina/sina
	PLURAL	yeyana kid	na inina kid	
SEMIREMOTE	SINGULAR	yewan/ye-yewan	na inewan	ta itewan/tewan
	PLURAL	yewan kid	na inewan kid	
REMOTE	SINGULAR	yen/ye-yen	na inen	ta iten/ten
	PLURAL	yen kid	na inen kid	
***With the 'semiremote' and 'remote' demonstrative pronouns, <i>yo</i> sometimes occurs, emphasizing great distance: <i>yo yewan</i> ('semiremote'), <i>yo yen</i> ('remote') (P. Healey 1960:17)				

Demonstrative pronouns, previously referred to as “demonstrative substitutes” (Mayfield 1987:117) or as a type of “impersonal pronouns” (P. Healey 1960:17, 89), are pronominal forms that contain a deictic component. Like the deictic determiners, demonstrative pronouns also distinguish four deictic positions (‘close to the speaker’, ‘close to hearer’, ‘semiremote’, and ‘remote’). Each of these four deictic positions (for the nominative and the genitive forms) can also have both singular and plural forms. The plural forms are formed by addition of the formative *kid* to the end of the singular forms.

In previous analyses, Central Cagayan Agta has been described as having three sets of demonstrative pronouns: nominative, genitive, and oblique. However, a thorough analysis of Central Cagayan Agta textual data suggests that there are only two sets of demonstrative pronouns: nominative and genitive demonstratives. As for the so-called “oblique” demonstrative pronouns, they NEVER function as nouns; instead, they function as locative adverbs.

The nominative demonstrative pronouns are the demonstrative pronominal equivalents of *ya/i/ig*-marked full noun phrases. Like their corresponding *ya/i/ig*-marked

full noun phrases, they can function as the sole argument of a monadic intransitive clause, as in (57).

(57) demonstrative as the sole argument of a monadic intransitive clause:

- a. *mappya yeyen, talintin=en.*
 good that service.line=that
 ‘That one, that service line is good....’ (Agt 11–035)
- b. a *sorsoriban=nāk, kuga tinoli=nāk hā,*
 CONJ gaze=GEN.3S+NOM.1S PERSIST return=GEN.3S+NOM.1S again
te nagporay ye-yen na ugta.
 because angry that LIG deer
 ‘It peered at me and then it came right back to me again because that was an angry deer.’ (Agt 8–016)
- c. ...atsi *nagānāk yen.*
 INJ gave.birth that
 ‘...Oh—oh, it has given birth.’ (Agt 8–086)

They can function as the theme or nonagentive NP of a dyadic *-an* clause, dyadic *-ān* clause, dyadic *i-* clause, or dyadic *i-* *-ān* clause, as in (58) and (59).

(58) demonstrative as the theme NP of a dyadic *-an* clause:

- a *tvtuvwidan=mi yen.*
 CONJ join.together=GEN.1PE that/these
 ‘And we (ex.) join these together.’ (Agt 11–017)

(59) demonstrative as the nonagentive NP (instrument) of a dyadic *i-* clause:

- ikarga=m yen am dwagappak=kid, kunna ten.*
 load.with=GEN.2S that if two.pieces=NOM.3P similar that
 ‘You (sg.) load that up (i.e., into the basket) if there are two pieces, similar to that.’ (Agt 11–038)

They can also function as the predicate nominal of a nominal clause, as in (60).

(60) demonstrative as the predicate nominal of a nominal clause:

- a. *yan* ya uma=in o, atākkun ya bali=en....
 this NOM swidden=this INJ near NOM house=that
 ‘This here is the swidden; the house is nearby.’ (Agt 8–054)

- b. ay *umange*=yāk, ay *yen* ya *negāwāt*=da=en.
 INJ go=NOM.1S INJ that NOM reached=GEN.3P=that
 (*negāwāt* < *na-* + *i-* + *gāwāt*)
 ‘So I went and that is what they handed me.’ (Agt 1–094)

They can also function as the nonpredicate nominal of a nominal clause and as a topic of a topicalized construction, as in (61).

(61) demonstrative as a topic of a topicalized construction and demonstrative as the nonpredicate nominal of a nominal clause:

- a *ye-yen* hapa, am bikāl o am kayu ā *mabalin*
 CONJ that also if bamboo or if wood CONJ finish
 lā ya *ikim* ten ā afuy *yen*.
 just NOM like.this+GEN.2S there CONJ fire that

‘Now about that, if (there is) bamboo or wood, you (sg.) can just put it there and (there will) be fire.’ (Agt 5–007)

The genitive demonstrative pronouns are the demonstrative pronominal equivalents of *na/ni/nig*-marked full noun phrases. In all the eleven Agta texts that I examined, there is only one occurrence of the genitive demonstrative pronoun (62). It is not clear whether they have exactly the same syntactic distribution as their corresponding *na/ni/nig*-marked full noun phrases.

(62) genitive demonstrative:

- ta kabalinan *na inen*, “Mamaddya=kitām ta balok....
 LCV afterward that(GEN) make=NOM.1P OBL leaf.bag
 ‘After that, “Let’s also make a leaf bag....’ (Agt 11–014)

As discussed earlier, NOT ALL “demonstrative substitutes” in Mayfield’s analysis are demonstrative pronouns. Some of the so-called “demonstrative substitutes” are actually locative adverbs. As shown in (63)–(64), the so-called “oblique demonstrative substitutes” are functioning as locative adverbs (that provide local or temporal information about an event) rather than as demonstrative pronouns (that provide local or temporal information about the entity itself).

(63) full form locative adverb:

- a. a māski am awān ta kāsafego=muy am alapan=muy *ye-yen*,
 CONJ even if NEG LCV match=GEN.2P if get=GEN.2P that
 hulu=en na lipātu ā am igalgal=mu ta kunna
 bamboo=that LIG soft-dry-stage CONJ if saw=GEN.2S LCV similar
ta iten ā afuy hapa *yen*.
 there/that CONJ fire also that

‘And even if you (pl.) don’t have any matches, if you (pl.) get that, soft-dry-stage bamboo, and if you (sg.) saw it (into pieces) similar to that, it will also burn.’ (Agt 5–006)

- b. *katotolay* yana=n, te awe=na *māfmaafut* na
 people that=already because NEG=GEN.3S consume LIG
 tolay=en ange *mangisāgpaw*=na ta ulu=na ta
 person=that go place.on=already LCV head=GEN.3S OBL
 gā-gāmit, āddet *ta iten* āllong=en.
 clothing end/until there/that dancing.platform=that

‘That was a crowd because there was no end of people going to place clothing on her head as far as the dancing platform.’ (Agt 1–086)

- c. a gafu ta kwa, abikan=ka=n *ta iten*,
 CONJ since LCV thing near/close=NOM.2S=already there/that
 a kun=da=n, alistu=kid=na hapa.
 CONJ similar=GEN.3P=now swift=NOM.3P=already also

‘So when you (sg.) are close there (at the hive), they are doing like this (fast motion); their activity is fast.’ (Agt 11–006)

- d. am itta=kid *ten* a dagdagam=kid hapa ay.
 if EXIST=NOM.3P there CONJ follow+GEN.2S=NOM.3P also INJ
 (*dagdagam* < *dagdagan* + =m)

‘If they are there, then followed them.’ (Agt 11–002)

- e. ya nonot=ku ta kādwān, “magidda=yāk bit lā *sin*.”
 NOM mind=GEN.1S LCV some lie.down=NOM.1S for.a.while just here

‘On the other hand, I thought, “I will just lie down here for a while.”’ (Agt 10–022)

- (64) full form locative adverb *tewan* and the deictic determiner =*ewan*:

gafu ta madamdān=āk teg aleng, “e=yāk hapa lā
 since LCV sad=NOM.1S LCV.PL son go=NOM.1S also just

tewan, bali=da=*ewan*,” kun=ku.
 there house=GEN.3P=there QUOT=GEN.1S

‘Since I was lonesome for my son and the others, I said to myself, “I am going over there, to their house over there.’ (Agt 10–023)

In addition to the so-called “oblique demonstrative substitutes”, other demonstrative substitutes sometimes seem to be able to function as locative adverbs too. For example, the “nominative substitute” *yen* in (65) seems to function as a locative adverb (in this case, it provides temporal information about the event) rather than a demonstrative pronoun.

- (65) *yen* as locative adverb:

awe=k=kid=na maita *yen*,....
 NEG=GEN.1S=NOM.3P=already see that

‘I won’t see them after that....’ (Agt 10–021)

6.3.1.2.3 Summary

Let me sum up the discussion in this section. In Central Cagayan Agta, there are three types of deictic elements: deictic determiners, demonstrative pronouns, and locative adverbs. Both deictic determiners and demonstrative pronouns provide local or temporal

information about the entity involved in an event and both can have singular and plural forms. Locative adverbs, however, provide local or temporal information about the event itself rather than about an entity. Locative adverbs can be homophonous with either deictic determiners or demonstrative pronouns. All three types of deictic elements distinguish four deictic positions ('close to the speaker', 'close to hearer', 'semiremote', and 'remote').

Demonstrative pronouns in Central Cagayan Agta distinguish two case forms: nominative and genitive. The nominative demonstrative pronouns are the equivalents of the *ya/i/ig*-marked full noun phrases. They can occur as the sole argument of a monadic intransitive clause, as the theme or nonagentive argument of a dyadic *-an* clause, dyadic *-ãn* clause, dyadic *i-* clause, or dyadic *i- -an* clause. They can also occur as the predicate nominal and the nonpredicate nominal of a nominal clauses. Moreover, they can also occur as the topic of a topicalized construction.

As for the genitive demonstrative pronouns, they are the demonstrative pronominal equivalents of the *na/ni/nig*-marked full noun phrases. However, due to lack of data, I am unable to determine whether they have exactly the same syntactic distribution as their corresponding genitive-marked full noun phrases.

TABLE 6.3 CENTRAL CAGAYAN AGTA DEMONSTRATIVE PRONOUNS

		NOMINATIVE	GENITIVE
SPEAKER	SINGULAR	yan/ye-yan/yeyan	na inin
	PLURAL	yeyan kid /ye-yan	na inin kid
HEARER	SINGULAR	yana/ye-yana/yeyana	na inina
	PLURAL	yeyana kid	na inina kid
SEMIREMOTE	SINGULAR	yewan/ye-yewan	na inewan
	PLURAL	yewan kid	na inewan kid
REMOTE	SINGULAR	yen/ye-yen	na inen
	PLURAL	yen kid	na inen kid

6.3.1.3 Case-marking system for full nouns

The last type of construction marker to be introduced is pronominal elements that are equivalents of so-called case-marking “determiners” in other western Austronesian languages.

Full noun phrases in Central Cagayan Agta do NOT exhibit formal differences to reflect their grammatical functions. Their grammatical functions are manifested by a class of pronominal monosyllabic forms.

In previous analyses of the Central Cagayan case-marking system for full nouns, Central Cagayan Agta is commonly described as having a system similar to the one in table 6.4 (based on P. Healey 1960:89; Mayfield 1987:116).

TABLE 6.4 PREVIOUS ANALYSES OF CENTRAL CAGAYAN AGTA CASE-MARKING PARTICLES

	NOMINATIVE	GENITIVE	OBLIQUE
NONPERSONAL	ya	na	ta
PERSONAL (SG.)	(y)i ¹²	ni	te
PERSONAL (PL.)	(y)ig	nig	teg

¹² The forms *i* and *ig* (in Mayfield's orthography) are written as *yi* and *yig* respectively in P. Healey (1960).

These forms have been referred to as “case-marking particles” or “ligatures” in previous analyses. From the label “case-marking particles”, it is clear that these forms function as some kind of “case-marking” element, but it is not clear what syntactic category they belong to. In this study, I reconsider the categorical status of these monosyllabic forms.

6.3.1.3.1 *ya, i, ig*: Nominative determiners or nouns???

In previous analyses of Central Cagayan Agta, the form *ya* has been commonly analyzed as a nominative case-marking particle for nonpersonal nouns, the form *i* as a nominative case-marking particle for singular personal nouns (including some kinship terms), and the form *ig* as a nominative case-marking particle for plural personal nouns (i.e., a personal noun and his/her associate(s)). From the label “nominative case-marking particles”, it is clear that these forms function as nominative case-marking elements. However, it is not clear what syntactic category they belong to. A careful analysis of Central Cagayan textual data suggests that *ya, i, and ig* are “AUXILIARY NOUNS” that carry the nominative case marking feature.

Before we decide the categorical status of *ya/i/ig*, let us first consider their syntactic distribution.

First, *ya/i/ig* can introduce the sole argument of a monadic intransitive clause, as in (66)–(67).

- (66) *ya* introduces the sole argument (a nonpersonal noun) of a monadic *mag*-clause:

yen *ya* *ianup=dāk* te e *paruba talo am*
 that NOM hunt.with=GEN.3P+NOM.1S because go try in.case if

magānāk ya lamān.

give.birth NOM wild.pig

(=*dāk* 'GEN.3S + NOM.1S' <=*da* 'GEN.3S' +=*āk* 'NOM.1S')

'That was their reason for using me in hunting, to go and try in case the wild pigs had given birth.' (Agt 8-004)

- (67) *ig* introduces the sole argument (a personal noun and his/her associate) of a monadic *mag*- clause:

ya ange hapa *naggāsa ig Munit ni* Litdag, ay Apaw hapa,....
 NOM go also beat.gong NOM.PL Munit GEN Litdag INJ Apaw also

'The ones who went to beat the gongs were Munit with Litdag, and also Apaw,' (Agt 1-065)

Second, *ya/i/ig* can introduce a nonagentive argument of a dyadic *-an* clause, a dyadic *-ān* clause, a dyadic *i-* clause, or a dyadic *i- -ān* clause, as in (68)–(70).

- (68) *ya* introduces the theme argument (a nonpersonal noun) of a dyadic *-an* clause:

“on, *ikitām yana anupan ya ulu na tagumay=en,*” kun=na.
 yes PRED.1PI that hunt NOM head GEN Tagumay=that QUOT=GEN.3S

“‘Yes, we (in.) will be the ones to hunt the head of the Tagumay Creek,’ he said.’ (Agt 8-010)

- (69) *ya* introduces the nonagentive argument (a nonpersonal noun) of a dyadic *-ān* clause:

e=yāk *inukadān ya baggāt=en nehu-huk=ku=n* ta
 go=NOM.1S opened NOM rice=that poured=GEN.1S=already LCV

igāw=en.

winnowing.tray=that

'I went and opened the rice, (and) poured it on the winnowing tray.' (Agt 1-098)

(70) *i* introduces the nonagentive argument (a kinship term) of a dyadic *-ān* clause:¹³

indagān=mi bit *i* aboy=en, te ange gumātāng
wait.for=GEN.1PE for.a.moment NOM daughter=that because go buy

ta baggāt, te balonan=muy, petta ittā hapa kānan=muy ta
OBL rice because travel=GEN.2P so.that EXIST also eat=GEN.2P LCV

bali=muy....
house=GEN.2P

‘We (ex.) are waiting for the daughter because she went to buy some rice for your (pl.) travel provisions, so you (pl.) will have something to eat at home....’
(Agt 1–025)

Third, *ya/i/ig* can introduce the nonpredicate nominal of a nominal clause, as in (71)–

(72).

(71) *ya* introduces the nonpredicate nominal (a nonpersonal noun) of a nominal clause:

a yan *ya* uma=*in* o, atākkun ya bali=en....
CONJ this NOM swidden=this INJ near NOM house=that

‘This here is the swidden; the house is nearby.’ (Agt 8–054)

(72) *i* introduces the nonpredicate nominal (a personal name) of a nominal clause:

kaluhung=ku *i* Tinoy.
relative=GEN.1S NOM Tinoy

‘Tinoy is my relative.’ (P. Healey 1960:13)

Fourth, *yal/ilig* can introduce the predicate nominal of a nominal clause, as in (73).

¹³ Not all kinship terms are marked by (y)*i* or (y)*ig*. P. Healey (1960:13) describes that the following kinship terms are marked by (y)*i* or (y)*ig*: *ābay* ‘daughter, girl’, *āne* ‘older sibling (term of address)’, *aleng* ‘son, boy’, *atawa* ‘spouse’, *bābo* ‘grandparent’, *kabirāt* ‘spouse of sibling-in-law’, *kaka-* ‘old sibling (term of reference)’, *káyung* ‘brother-in-law of man’, *dama-* ‘father (term of reference)’, *hina-* ‘mother (term of reference)’, *ipág* ‘sibling-in-law other than *káyung*’, *masina* ‘aunt (true or by marriage)’, *úte* ‘uncle (true or by marriage)’, *wagi* ‘young sibling’. All other kinship terms other than the above are marked by the personal nominative auxiliary noun (“nonpersonal ligature” in P. Healey’s analysis). Among these others are: *manuháng* ‘child-in-law’, *katuhangán* ‘parent-in-law’, *afu* ‘grandchild’, *pangánakán* ‘sibling’s child’, *kasinsin* ‘cousin’, *aná* ‘offspring’, *kábayán* ‘boy’s sister’, *kalakáyán* ‘girl’s brother’.

(73) *ya* introduces the predicate nominal (a nonpersonal noun) of a nominal clause:

te āmu=m ya polu arāw ā medyo nakurāng
because know=GEN.2S NOM first day CONJ somewhat lack

ya gā-gāmit, ā ya afuy ya pagkatolayān=da, kunna ten.
NOM clothing CONJ NOM fire NOM cause.of.life=GEN.3P similar that
(*pagkatolayān* < *pa-* 'CAUS' + *pag-* -*ān* + *katolay*)

'For as you (sg.) know about the early days, there was a lack of clothing, and fire was their means of staying alive, similar to that.' (Agt 5–012)

The fact that the elements introduced by *ya*, *i*, or *ig* in (66)–(73) are all clearly nouns might suggest that these forms are DETERMINERS in that they occur at the outside edge of a noun phrase and might be interpreted as dependents of head nouns. However, a careful examination of Central Cagayan Agta texts points out that sometimes the elements introduced by *ya* are UNLIKELY to be considered as NOUNS. Let us examine the elements that introduced by *ya* in examples (74)–(79).

In (74)–(75), the element that immediately follows *ya* carries affixation (the formatives *mag-*, *ne-*, *-in-* are often assumed to be “verbal affixes”) that identifies it as a verb. That is, in this case, *ya* introduces a verbal clause headed by a lexical verb. These examples might not be a big problem for the “determiner” analysis because one can assume that the forms *magindag*, *nebār*, and *binida* are actually zero-derived deverbal NOMINALIZATIONS, similar to the effect of *-er* nominalization in English, hence they might actually mean ‘the one who wait’, ‘the thing that they said’, and ‘the thing that she talked’, respectively, in these example. Alternatively, one could assume that these forms are verbs, as they appear to be, but are the predicates of headless relative clauses, so that, in effect, the noun phrases in which they appear are—on the surface at least—headless (see Kroeger 1998:2, 11).

(74) *ya* followed by a clause headed by a lexical verb:

ã attamãn=tãm la bit *ya magindag*, te yen
 CONJ endure=GEN.1PI just for.a.moment NOM wait because that
ya nebãr=da=en, ã fuhãb ta Liggũ te mapãtu
 NOM said=GEN.3P=that CONJ afternoon LCV Sunday because hot
 kãn *ya dalãn*,” kun=ku hapa.
 REPORT.SP NOM trail QUOT=GEN.1S also
 (*nebãr* < *na-* + *ibãr*)

“Let’s just wait patiently, because that’s what they said, Sunday afternoon, because they said the trail will be hot,” I added.’ (Agt 1–038)

(75) *ya* followed by a clause headed by a lexical verb:

ã gafu ta kuman=en *ya binida=na*, “ay on mantu,
 CONJ reason LCV similar=that NOM talked=GEN.3S INJ yes then
paggustun=tãm=kid, te *magamãmat*,” kun=da.
 CAUS.enough=GEN.1PI=NOM.3P because shame QUOT=GEN.3P
 (*binida* < *-in-* + *bida*; *paggustun* < *pa-* ‘CAUS’ + *pag-* + *gustu* + *-an*; *magamãmat* < *mag-* +
 (C)VC + *ãmat*)

‘And since she said that, they said, “Oh, all right then, let’s satisfy them, because it would be shameful.”’ (Agt 1–069)

The “nominalization” account might sound reasonable for sentences like the ones in (74)–(75). However, it might not be applicable to sentences like the ones in (76)–(79). In (76)a–b, the element immediately following *ya* is a directional auxiliary verb. In (77), the element immediately follows *ya* is an existential verb. In (78), the element immediately following *ya* is a negative existential verb. In (79), the element immediately following *ya* is a negative auxiliary verb. Although it might be possible to consider lexical verbs as “zero-derived deverbal nominalizations” when they follow a supposed determiner, it is UNLIKELY that existential verbs and auxiliary verbs are nominalizations. The existence of sentences like examples (76)–(79) makes the “determiner” analysis particularly hard to sustain.

(76) *ya* followed by a verbal clause headed by a directional auxiliary verb:

- a. *ya ange hapa naggāsa* ig Munit ni Litdag, ay Apaw hapa,....
 NOM go also beat.gong NOM.PL Munit GEN Litdag INJ Apaw also

‘The ones who went to beat the gongs were Munit with Litdag, and also Apaw,’ (Agt 1–065)

- b. *mamadday=kita ta hunut, te yen ya*
 make=NOM.1D OBL smoke.torch because that NOM

en=tām panglub tekid....
 go=GEN.1PI harvest.honey LCV.3P

‘Let’s make a smoke torch because that is what we (in.) will use to smoke them out....’ (Agt 11–011)

(77) *ya* followed by a clause headed by an existential verb and *ya* followed by a clause headed by a lexical verb:

sangaw ã *ya ittā=kid=en* ta Basao, nagdadātang=kid hapa
 later CONJ NOM EXIST=NOM.3P=that LCV basao arrived=NOM.3P also

ta Sābadu, te yen *ya āmu=da* ta boda, ya Sābadu.
 LCV Saturday because that NOM know=GEN.3P LCV wedding NOM Saturday

‘Later on, the Agtas living in Basao, they all arrived on Saturday, because that was the day they knew for the wedding, Saturday.’ (Agt 1–035)

(78) *ya* followed by a clause headed by a negative existential verb:

...te naggagitta=kitām hamān ya kuman=en
 because same=NOM.1PI however NOM similar=that

ya māmāwanān ta kānan...
 NOM NEG.EXIST LCV food

‘...because after all, we (in.) are all alike in that way, that is, always without enough to eat...’ (Agt 1–095)

(79) *ya* followed by a verbal clause headed by a negative auxiliary:

..*ya awān* kid=en hapa *makaapag* ta kānan=da,....
 NOM NEG PL=that also search LCV food=GEN.3P

‘...those who were not able to find their food,....’ (Agt 5–014)

In addition to the problem that some of the elements introduced by *ya* MIGHT NOT be nouns, the “determiner” analysis is problematic in that the phrases introduced by *ya/i/ig*

can be further specified by a class of enclitic deictic determiners that occur at the righthand edge of the noun phrase.¹⁴ As already shown in (68)–(71), in order to express distinctions of reference with respect to location or time, a deictic determiner (such as =*in* ‘this’, =*ina* ‘that’,...etc.) can be attached to the phrase introduced by *ya/i/ig*. If *ya/i/ig* are determiners, one would have to assume that Central Cagayan Agta noun phrases can be marked by two determiners (with one occurring at the lefthand edge of the phrase and the other occurring at the righthand edge of the phrase) SIMULTANEOUSLY. Such an analysis is not palatable.

Based on the data discussed so far, it seems that *ya/i/ig* CANNOT be determiners.

Now, the question is: “what can they be?”

An answer to this question is offered by Reid (2002b).

Reid (2002b) re-examines the syntactic distribution of the so-called nominative or absolutive “determiners” in some Philippine languages (e.g., Tagalog *ang*, Ilokano *ti*, Guinaang Bontok *nan*, etc.) and claims that these monosyllabic forms do NOT belong, at least in some cases, to the syntactic category of DETERMINERS. Instead, he considers these forms to be “AUXILIARY NOUNS” that carry the feature [+extension], that is, nouns that require a dependent predicate (p.304, 306).

The “auxiliary noun” analysis proposed by Reid (2002b) seems to be applicable to the Central Cagayan Agta forms *ya/i/ig*. The “auxiliary noun” analysis of Central Cagayan Agta *ya/i/ig* is supported by the following pieces of evidence. First, *ya* can occur before

¹⁴ Reid (2002b:299, footnote 6) notes that “There are some Philippine languages such as Ivatan, the Alta and Agta languages on the northeastern coast of Luzon, Isinai, and Kagayanen Manobo, however, that do have what are probably true enclitic determiners occurring at the righthand edge of the noun phrase....”.

words that are themselves UNLIKELY to be the heads of noun phrases, such as existential verbs and auxiliary verbs. Second, phrases introduced by *ya/i/ig* sometimes can be further specified for spatial or temporal information by a class of enclitic deictic determiners. By considering *ya/i/ig* as auxiliary nouns, the typological unusual type of “double determiners” analysis can be avoided. Third, like other Philippine languages, Central Cagayan Agta is strongly RIGHT-BRANCHING, with dependents typically occurring to the RIGHT of their head. However, the supposed case-marking “determiners” are typologically anomalous in that they always occur to the LEFT of their head nouns.

The fact that *ya/i/ig* might be “auxiliary nouns” rather than “determiners” poses the question as to whether all other monosyllabic pronominal elements in Central Cagayan Agta might also be “auxiliary nouns”.

6.3.1.3.2 *na, ni, nig*: Genitive determiners or nouns?

In previous analyses of Central Cagayan Agta, the form *na* has been commonly analyzed as a genitive case-marking particle for nonpersonal nouns, the form *ni* as a genitive case-marking particle for singular personal nouns (including some kinship terms), and the form *nig* as a genitive case-marking particle for plural personal nouns (i.e., a personal noun and his/her associate(s)). From the label “genitive case-marking particles”, it is clear that these forms function as genitive case-marking elements.

However, it is not clear what syntactic category they belong to. A careful analysis of Central Cagayan textual data suggests that *na, ni, and nig* are “AUXILIARY NOUNS” that carry the genitive case marking feature.

Before we decide the categorical status of *na/ni/nig*, let us first consider their syntactic distribution.

First, *na/ni/nig* can introduce possessors in possessive constructions, as in (80)–(82).

(80) *ni* introduces a personal possessor of a possessive construction:

ay, en=da inakkāt ta bali **ni** Homān, yen ya
 CONJ go=GEN.3P lifted LCV house GEN Homan that NOM

nangigafun=da.

source=GEN.3P

(*nangigafun* < *nang-* + *i-* + *gafu* + *-ān*)

‘Rather, they went and lifted her down from Homan’s house; that is where they started from.’ (Agt 1–084)

(81) *na* introduces a nonpersonal possessor of a possessive construction; *ni* introduces a personal (kinship term) possessor of a possessive construction:

ā ināyagān=dāk=na hapa ta talekud **na** bali
 CONJ called=GEN.3P+NOM.1S=already also LCV behind GEN house

ni Aleng.

GEN son

(=dāk ‘GEN.3P + NOM.1S’ < =da ‘GEN.3P’ + =āk ‘NOM.1S’)

‘And they called me behind my son’s house.’ (Agt 1–091)

(82) *na* introduces the agent (a nonpersonal noun) of a dyadic *-an* clause and introduces a nonpersonal possessor of a possessive construction:

en=nāk binolsān **na** kabalay=k=in ta limā pesuk,
 go=GEN.3S+NOM.1S pocketed GEN ASS.house=GEN.1S=this LCV five peso

ā kuman=kami na kwa=en maglelehut ay, te
 CONJ similar=NOM.1PE GEN thing=that circling INJ because

awe=na naapagān ya blosa **na** saping=k=en.
 NEG=GEN.3S find NOM pocket GEN short.pants=GEN.1S=that

‘My *kabalay* came to put five pesos in my pocket, and it is like we (ex.) were what-you-call-it, going around in circles, because he could not find the pocket of my short pants.’ (Agt 1–051)

Second, *na/ni/nig* can introduce the agent of a dyadic *-an* clause, dyadic *-ān* clause, dyadic *i-* clause, and dyadic *i-* *-ān* clause, as in (82)–(85).

- (83) *ni* introduces the agent (a personal noun) of a dyadic *-an* clause:

ara *naggagāsa*=kid=na hā, te *magtatugut*=kid minā,
 INJ beat.gong=NOM.3P=already again because walking=NOM.3P would

ammi kuman=in ya *nabida ni Litdag*.

but similar=this NOM talked GEN Litdag

(*naggagāsa* < *nag-* + *Ca-* + *gāsa*; *magtatugut* < *mag-* + *Ca-* + *tugut*; *nabida* < *na-* + *bida*)

‘So they played the gongs again, because they would have left, but then Litdag spoke like that.’ (Agt 1–070)

- (84) *nig* introduces the agent (a personal noun and his/her associate) of a dyadic *-an* clause:

tekid *nakalutu*, ay en=na=kid=na *pinakān nig Litdag*,
 LCV.3P cooked INJ go=GEN.3=NOM.3P=already fed GEN.PL Litdag

Munit,...

Munit

‘When they finished cooking the viand, Litdag and Munit went and fed them,....’ (Agt 1–077)

- (85) *na* introduces the agent (a nonpersonal noun) of a dyadic *-ān* clause:

nagazāzigit petta atākkun=āk *umange* unek am
 go.along.edge so.that near=NOM.IS go climb if

gavwātān=nāk na ānwāng=en....
 attack=GEN.3S+NOM.IS GEN water.buffalo=that

‘I will continue on along close to the edge, so I will be close to go climb (a tree) if the water buffalo attacks me.’ (Agt 8–088)

Third, *na/ni/nig* can introduce a comitative NP, as in (86)–(87).

- (86) *na* introduces a nonpersonal comitative NP:

ayagām=kid mantu sin ya atu *ikid na ugta ikid*
 call+GEN.2S=NOM.3P then here NOM dog and GEN deer and

na taggam.

GEN ant

‘Then call them all here, the dog, the deer, and the ant.’ (Agt 4–015)

(87) *ni* introduces a personal comitative NP:

...*pinagtoli*=k i Leting *ikid ni Odel*.
 CAUS.returned=GEN.IS NOM Leting and GEN Odel
 (*pinagtoli* < *pa-* + *-in-* + *pagtoli*)

‘...I had Leting and Odel return to them.’ (Agt 1–004)

Like the phrases introduced by *ya/i/ig*, the phrases introduced by *na/ni/nig* sometimes can also be further specified for spatial or temporal information by a class of enclitic deictic determiners, as in (82) and (85). The fact that these forms can occur with enclitic determiners suggests that they are less likely to be “determiners”. Instead, like the forms *yalilig*, they are more likely to be “auxiliary nouns”.

6.3.1.3.3 *ta, te, teg*: Locative/Oblique determiners or nouns???

In previous analyses of Central Cagayan Agta, the form *ta* has been commonly analyzed as an oblique case-marking particle for nonpersonal nouns, the form *te* as an oblique case-marking particle for singular personal nouns (including some kinship terms), and the form *teg* as an oblique case-marking particle for plural personal nouns (i.e., a personal noun and his/her associate(s)). However, a thorough examination of Central Cagayan Agta textual data suggest that there are two different types of *ta*: (i) an oblique *ta*, and (ii) a locative *ta*. It is important to recognize the existence of two different types of *ta* in that the oblique *ta*-marked phrases do NOT have corresponding personal pronouns or demonstrative pronouns, but the locative *ta*-marked phrases do.¹⁵

Let us first consider the distribution of the oblique *ta*.

¹⁵ The oblique *ta* is similar to Tagalog *ng* (that marks an indefinite theme phrase) in a number of respects. For example, neither the phrase introduced by *ta* nor the phrase introduced by *ng* has a personal pronominal equivalent. Moreover, neither the phrase introduced by *ta* nor the phrase introduced by *ng* has a corresponding personal noun phrase.

The oblique *ta* can be used to introduce an indefinite theme phrase of a dyadic *-um-*, *ma-*, *mag-*, or *maN-* clause, as in (88)–(89).

(88) *ta* introduces an indefinite nonpersonal theme phrase:

a. *mamadday=kita ta hunut....*
 make=NOM.1D OBL smoke.torch
 ‘Let’s make a smoke torch....’ (Agt 11–011)

b. *mamadday=kitām ta balok hapa....*
 make=NOM.1PI OBL leaf.bag also
 ‘Let’s also make a leaf bag....’ (Agt 11–014)

(89) *ta* introduces an indefinite nonpersonal theme phrase and a nonpersonal location phrase:

ã negāsa yen na, ya katotolay na ange mangisāgpaw
 CONJ gonging that already NOM people LIG go place.on

ta gā-gāmit ta ulu=na=en.
 OBL clothing LCV head=GEN.3S=that

‘And that was accompanied by gonging, that is, the crowd going to place clothing on her head.’ (Agt 1–085)

Now, let us consider the distribution of the locative *ta*.

A locative *ta* (or *te/teg*) can introduce a location phrase (including place name), as in (89)–(91).

(90) *te* introduces a personal location noun:

ã ume=yāk hapa te Kāmbong makibidān, magbabida=kami
 CONJ go=NOM.1S also LCV Kambong SOCIAL.talk talk=NOM.1PE

lã ten ta bali=da=ina.
 just there/that LCV house=GEN.3P=that

(*makibidān* < *maki-* ‘social’ + *bida* ‘talk’ + *-ān*; *magbabida* < *mag-* + *Ca-* + *bida* ‘talk’)

‘I also went to talk with Kambong; we (ex.) just talked together there at their house.’ (Agt 1–011)

Besides, a locative *ta* can introduce a temporal phrase, as in (91)–(92).

(91) *ta* introduces a place name and a temporal phrase:

sangaw ã ya ittã=kid=en *ta* Basao, nagdadãtang=kid hapa
 later CONJ NOM EXIST=NOM.3P=that LCV basao arrived=NOM.3P also

ta Sãbadu, te yen ya ãmu=da *ta* boda, ya Sãbadu.
 LCV Saturday because that NOM know=GEN.3P LCV wedding NOM Saturday

‘Later on, the Agtas living in Basao, they all arrived on Saturday, because that was the day they knew for the wedding, Saturday.’ (Agt 1–035)

(92) *ta* introduces a temporal phrase:

am awãn=kami *ta* lãlãkwãt na Liggũ ã fuhãb=kami,
 if NEG=NOM.1PE LCV morning GEN Sunday and afternoon=NOM.1PE

te mapãtu ya dalãn.
 because hot NOM trail

‘If we (ex.) are not here Sunday morning, then we (ex.) will be here in the afternoon because the trail will be hot.’ (Agt 1–033)

A locative *ta* (or *te/teg*) can also introduce an instrument phrase (as in (93)) and a reason phrase (as in (94)).

(93) *ta* introduces a nonpersonal instrument phrase:

a inugatãn=ku *ta* gilãt anna gintab.
 CONJ missed=GEN.1S LCV barbed.arrow and bladed.arrow

‘Oh, I missed it with the barbed arrow and the bladed arrow.’ (Agt 8–019)

(94) *ta* introduces a nonpersonal reason phrase:

...te ayagãn=ku i Ipig=en *ta* pana=na kid=en...
 because call=GEN.1S NOM Ipig=that/there LCV arrow=GEN.3S PL=that

‘...because I will call Ipig for those arrows of his.’ (Agt 8–037)

Moreover, a locative *ta/te/teg* can also introduce the topic of a past temporal subordinate clause, as in (95).¹⁶

¹⁶ Please refer to section 6.3.2.4 for discussion of locative pronouns in these types of constructions.

(95) *te* introduces the topics of past temporal subordinate clauses:

a	<i>pagtabnāk=na</i>	<i>piga</i>	<i>la</i>	<i>ammi</i>	<i>te</i>	Ipok	a	<i>hiklam=na</i>
CONJ	alight=already	how.much	just	but	LCV	Ipok	CONJ	night=already
	<i>dumatang,</i>	<i>māgge</i>	<i>tangngān</i>	<i>na</i>		<i>hiklam.</i>		
	arrive	almost	middle	GEN		night		

‘When (we) landed, how quick it had been; but Ipok, he arrived, when it was night, almost midnight.’ (Agt 10–015)

Like the phrases introduced by *ya/i/ig* and the phrases introduced by *na/ni/nig*, phrases introduced by *ta/te/teg* sometimes can also be further specified for spatial or temporal information by a class of enclitic deictic determiners, as in (89) and (94). The fact that these forms can occur with enclitic determiners suggests that they are less likely to be “determiners”. Instead, like the forms *ya/i/ig* and *na/ni/nig*, they are more likely to be “auxiliary nouns” that carry either the oblique or the locative case marking feature.

6.3.1.3.4 Summary

Let me summarize the discussion in this section.

All the prenominal “case-marking particles” are considered to be “AUXILIARY NOUNS” rather than “determiners” in that they can occur with enclitic deictic determiners (and some of the them can also introduce elements that are UNLIKELY to be nouns, such as negative auxiliaries, negative existential verbs, etc.).

Four types of case-marking auxiliary nouns can be distinguished in Central Cagayan Agta (nominative, genitive, locative, and oblique), as shown in table 6.5.

TABLE 6.5 CENTRAL CAGAYAN AGTA CASE-MARKING SYSTEM

	NOMINATIVE	GENITIVE	LOCATIVE	OBLIQUE
NONPERSONAL	ya	na	ta	ta
PERSONAL (SG.)	(y)i	ni	te	--
PERSONAL (PL.)	(y)ig	nig	teg	--

Nominative auxiliary nouns can introduce the sole argument of a monadic intransitive clause. They can introduce the theme or nonagentive argument of a dyadic *-an* clause, a dyadic *-ān* clause, a dyadic *i-* clause, or a dyadic *i- -ān* clause. They can also introduce the predicate nominal and the nonpredicate nominal of a nominal clauses, and the topic of a topicalized construction.

Genitive auxiliary nouns can introduce a possessor in a possessive construction. They can introduce the agent argument of a dyadic *-an* clause, a dyadic *-ān* clause, a dyadic *i-* clause, or a dyadic *i- -ān* clause. They can also introduce a comitative phrase.

Locative auxiliary nouns, which head phrases that have corresponding personal and demonstrative pronominal forms, can be used to introduce a location phrase, a temporal phrase, an instrument, a reason phrase, and the topic of past temporal subordinate clauses, as described in section 6.3.2.4.

The oblique auxiliary noun *ta*, which heads phrases that do not have corresponding personal and demonstrative pronominal forms, can be used to introduce the indefinite or nonspecific theme phrase of a dyadic *-um-*, *ma-*, *mag-*, or *maN-* clause.

6.3.2 The Central Cagayan Agta Personal Pronoun System

Unlike full noun phrases, personal pronouns in Central Cagayan Agta exhibit formal differences depending on their syntactic functions. The forms and functions of Central

Cagayan Agta personal pronouns are summarized in table 6.6. The pronominal forms appearing in the following table are based on Mayfield (1987:117) and P. Healey (1960:89)

TABLE 6.6 PERSONAL PRONOUNS IN CENTRAL CAGAYAN AGTA

	CLITICS		FREE ¹⁷	
	GENITIVE	NOMINATIVE	TOPIC/PREDICATE	LOCATIVE
1S [+SPKR, -ADDR, -PLRL]	=ku/=k	=āk/=yāk	iyāk	teyāk
2S [-SPKR, +ADDR, -PLRL]	=mu/=m	=ka	iko	teko
3S [-SPKR, -ADDR, -PLRL]	=na	---	intu	tentu
1D [+SPKR, +ADDR, -PLRL]	=ta	=kita	ikita	tekita
1PI [+SPKR, +ADDR, +PLRL]	=tām	=kitām	ikitām	tekitām
1PE [+SPKR, -ADDR, +PLRL]	=mī	=kami	ikami	tekami
2P [-SPKR, +ADDR, +PLRL]	=muy	=kām	ikamuy	tekamuy
3P [-SPKR, -ADDR, +PLRL]	=da/(=na) ¹⁸	=kid	ikid	tekid

***SPECIAL COMBINING FORMS (GEN + NOM) (P. Healey 1960:89):

=māk 'GEN.2S + NOM.1S' (< =mu 'GEN.2s' + =āk 'NOM.1S')

=nāk 'GEN.3S + NOM.1S' (< =na 'GEN.3S' + =āk 'NOM.1S')

=dāk 'GEN.3P + NOM.1S' (< =da 'GEN.3P' + =āk 'NOM.1S')

=taka 'GEN.1S + NOM.2S' (< =ta 'GEN.1D' + =ka 'NOM.2S')¹⁹

=takām 'GEN.1S + NOM.2P' (< =ta 'GEN.1D' + =kām 'NOM.2P')

=na (or =ng)=kami 'GEN.2S + NOM.1PE' (< =na 'GEN.3S' + =kami 'NOM.1PE')²⁰

=nakami 'GEN.3S + NOM.1PE' (< =na 'GEN.3S' + =kami 'NOM.1PE')

=dakami 'GEN.2/3P + NOM.1PE' (< =da 'GEN.3P' + =kami 'NOM.1PE')

*** SPECIAL COMBINING FORMS (GEN/NOM + ASPECTUAL ADVERB) (Mayfield 1987:16):

=kānan 'NOM.2P + now' (< =kām 'NOM.2P' + =na 'now/already')

=tānan 'GEN.1PI + now' (< =tām 'GEN.1PI' + =na 'now/already')

=kitānan 'NOM.1PI + now' (< =kitām 'NOM.1PI' + =na 'now/already')

en=tanan 'let's go now' (< en 'go' + =ta 'GEN.1D' + =na 'now')

¹⁷ The "topic/predicate" pronouns and "locative" pronouns are referred to as "emphatic" pronouns and "oblique" pronouns respectively in Mayfield (1987).

¹⁸ The genitive pronoun form =na has been considered to be a 'third person SINGULAR genitive pronoun' (P. Healey 1960 and Mayfield 1987). However, my textual analysis suggests that =na sometimes refers to third person plural agent. See section 6.3.2.5 for more discussion on this form.

¹⁹ Reid (pers. comm.) suggests that the forms =taka and =takām are probably reflexes of the old combining forms for 'GEN.1S + NOM.2S' and 'GEN.1S + NOM.2P' respectively.

²⁰ The meaning of the forms =nakami 'GEN.2/3S + NOM.1PE' and =dakami 'GEN.2/3P + NOM.1PE' matches that of their corresponding forms in Ilokano. They are probably Ilokano borrowings.

Like other Cordilleran languages, Central Cagayan Agta personal pronouns distinguish three persons (first, second, and third) and four grammatical functions (genitive, nominative, locative, and topic/predicate).²¹ As illustrated in table 6.6, first person pronouns distinguish three numbers: singular, dual, and plural. First person dual forms are used when both the speaker and the hearer are included. First person plural pronouns make a further distinction between inclusive and exclusive forms. The use of inclusive or exclusive forms is determined by whether the hearers are included. Inclusive forms are employed when hearers are included, otherwise exclusive forms are employed. Second person and third person pronouns distinguish two numbers (singular and plural).

Central Cagayan Agta personal pronouns consist of four sets: Nominative, Genitive, Topic/predicate, and Locative. Bound nominative pronouns and genitive pronouns are identified as pronominal clitics, which are indicated by the equal sign ‘=’. Topic/predicate pronouns and locative pronouns are free form pronouns.

6.3.2.1 Genitive personal pronouns

Genitive pronouns are the pronominal equivalents of *na-/ni-/nig*-marked full noun phrases. Like their corresponding *na-/ni-/nig*-marked full noun phrases, genitive pronouns can function as the attribute (i.e., the possessor) in a possessive construction, as

²¹ Tharp (1974a:86) states that “The pronoun systems of the NC [Northern Cordilleran] languages indicate a four-way distinction of person, a two-way distinction of number, and a four-way grammatical function distinction. Such a 4 x 2 x 4 system of distinction is characteristic of the Cord [Cordilleran] languages. The four persons distinguished are first person, first-plus-second person (“you (sg or pl) and I”), second person, and third person. Each of those four persons, in turn, distinguishes with a different form, the two numbers, singular and plural. Finally, each of those eight combination of the four persons and two numbers distinguishes with a different form, four grammatical functions: long-form nominative, short-form nominative, genitive, and oblique.”

in (96)–(97). Moreover, they can function as the agent of a dyadic *-an* clause, the agent of a dyadic *-ān* clause, the agent of a dyadic *i-* clause, or the agent of a dyadic *i- -ān* clause, as in (96)–(98). Genitive clitic pronouns sometimes also have a cross-referencing function. As shown in (99)–(100)b, genitive clitic pronouns, such as *=na* ‘GEN.3S’ or *=da* ‘GEN.3P’, can cooccur with the (genitive-marked) agent full NP of a dyadic *-an* clause or a dyadic *-ān* clause (or a dyadic *i-* clause, or a dyadic *i- -ān* clause) and they agree with the (genitive-marked) agent full NPs in person and number features. Notice that the cross-reference genitive pronominal clitic occurs immediately after the main predicate of a sentence, regardless of whether it is a lexical verb (as in (99)–(100)a) or an auxiliary (as in (100)b).

- (96) genitive clitic pronoun as the agent of a dyadic *-an* clause and as the possessor in a possessive construction:

en=ku para *sasiriban* ya *matā=k*.
 go=GEN.1S yet seek NOM eye=GEN.1S

‘I then went to peek my eyes out the little window.’ (Agt 10–014)

- (97) genitive clitic pronoun as the agent of a dyadic *-ān* clause and as the possessor in a possessive construction:

nagtappan=āk, *tinappanān=ku* *matā=k*.
 covered=NOM.1S covered=GEN.1S eye=GEN.1S

‘I covered myself, I covered my eyes.’ (Agt 10–013)

- (98) genitive clitic pronoun as the agent of a dyadic *i-* clause:

a. *ilu-guta=m* ha ta utun pettam ha ay.
 pull.with=GEN.2S again LCV top so.that again INJ

‘You (sg.) pull it up again to the top.’ (Agt 11–037)

- b. *ikarga=m* *yen* *am* *dwagappak=kid*, *kunna* *ten*.
 load.with=GEN.2S that if two.pieces=NOM.3P similar that
 ‘You (sg.) load that up (i.e., into the basket) if there are two pieces, similar to that.’ (Agt 11–038)
- c. *am* *pagikarga=m* *ten*, *ay* *idagut=mu=n* *ha* *ay*,....
 if load.with=GEN.2S there INJ lower.with=GEN.2S=already again INJ
 ‘When you (sg.) have loaded it there, then you (sg.) lower it again,....’ (Agt 11–039)

(99) genitive clitic pronoun agrees with the agent of a dyadic *-an* clause:

- ...*kinagāt=na* *hapa* *na* *taggam* *ya* *huli* *na* *atu*.
 bit=GEN.3S also GEN ant NOM rump GEN dog
 ‘...the ant bit the rump of the dog.’ (Agt 4–022)

(100) genitive clitic pronoun agrees with the agent of a dyadic *-ān* clause:

- a. *nagazāzigit* *petta* *atākkun=āk* *umange* *unek* *am*
 go.along.edge so.that near=NOM.1S go climb if
 gavwātān=nāk *na* *ānwāng=en*....
 attack=GEN.3S+NOM.1S GEN water.buffalo=that
 (=nāk ‘GEN.3S + NOM.1S’ < =na ‘GEN.3S’ + =āk ‘NOM.1S’)
 ‘I will continue on along close to the edge, so I will be close to go climb (a tree) if the water buffalo attacks me.’ (Agt 8–088)
- b. ...*en=da=kami=n* *inaribungbungān* *na* **Merikāno** *kid=en*.
 go=GEN.3P=NOM.1PE=already surrounded GEN American PL=that
 ‘...the Americans came and gathered around us (ex.).’ (Agt 10–016)

Notice that both the first person singular genitive pronoun and the second person singular genitive person have two forms: =*ku*/=*k* and =*mu*/=*m*, respectively.²² The occurrence of the full form clitics (=ku and =mu) and the short form clitics (=k and =m) is

²² Reid (2001:235–236, footnote 2) comments that “The alternation is found in all of the Central and Southern Cordilleran languages, in both Northern and Southern Alta (Reid 1991), in Ilokano (Rubino 1997), and in the Cagayan Valley languages, but not in the Negrito languages of Northeastern Luzon (Headland and Headland 1974; Reid 1983a), nor in Arta, a Negrito language isolate spoken in the Cagayan Valley (Reid 1989). Yogad, one of the Northern Cordilleran languages, has a variant following vowel-final words only for the second singular genitive pronoun (A. Healey 1958).”

phonologically conditioned. That is, the full form genitive pronouns =*ku* and =*mu* occur after a consonant-final stem (as in (101) and (105)), whereas the short form singular genitive pronouns =*k* and =*m* occur after a vowel-final stem (as in (102), (104), and (106)). However, when the second person singular genitive pronoun occurs with a dyadic *-an* verb, a dyadic *-ān* verb, or a dyadic *i-* *-ān* verb, or other forms ending with the alveolar nasal *n* (e.g., *kum* ‘QUOT + GEN.2S’ < *kun* ‘QUOT’ + =*mu* ‘GEN.2S’), irregularities occur. As shown in (102)–(103), when the second person singular genitive pronoun occurs with a dyadic *-ān* verb (or a dyadic *i-* *-ān* verb), the resulting form is either *-ān=m* or *-ām* (or *i-* *-ām*). The morphophonological idiosyncrasies exhibited by the combination of the second person singular genitive pronoun with stems ending with an alveolar nasal poses the question as to whether the second person singular genitive pronominal forms (and possibly the first person singular genitive form as well as other genitive pronominal forms) are clitics or agreement features.²³

(101) full form genitive clitic =*mu* following a consonant:

a intu paha **ibār=ku** teko, Ginyamor, kuman=*na*
 CONJ TOP.3S yet tell=GEN.1S LCV.2S Ginyamor similar=GEN.3S

iwahad=mu minā ya dulay na nonot,....
 throw.with=GEN.2S should NOM bad LIG thoughts

‘And another thing I will tell you (sg.), Ginyamor, it is like this, you (sg.) should throw away any bad ideas,....’ (Agt 2–003)

²³ To simplify the discussion, I tentatively consider both short form and full form genitives as clitics, although in some cases these forms might have been grammaticalized as agreement features on the verb. See section 6.3.2.5 for more discussion on these forms.

(102) short form genitive clitic =*m* following a vowel:

ipaitām hapa ya māppya ta agyān minā
 CAUS.see+GEN.2S also NOM good LCV place would/should
 na babbay anna *ipaitām* ya ngāmin tahabāku=*m*....
 LIG female and CAUS.see+GEN.2S NOM all work=GEN.2S
 (*ipaitām* < *i-* -*ān* + *pa-* + *ita* + =*mu*)

‘You (sg.) show good behavior to the girl’s relatives and you (sg.) show all your (sg.) industry....’ (Agt 2–002)

(103) second person genitive clitics occurring with dyadic –*ān* verbs:

en=*tānan*, unnan*ān*=*māk* te
 go=GEN.1PI=now/already precede=GEN.2S+NOM.1S because
 hilāgām=*āk*, te matuga=*yāk* te hiklam=*na*.
 light+GEN.2S=NOM.1S because splinter=NOM.1S because night=already
 (= *tānan* < =*tām* ‘GEN.1PI’ + =*na* ‘already/now’; =*māk* ‘GEN.2S + NOM.1S’ < =*mu* ‘GEN.2S’ +
 =*āk* ‘NOM.1S’; *hilāgām* < *hilāgān* + =*mu* ‘GEN.2S’)

‘Let’s go, go ahead of me and shine the light for me because I will puncture my feet because it is night already.’ (Agt 8–051)

(104) short form genitive clitic =*k* following a vowel:

gafu ta makakasidug=*āk*=na *pinapāsi*=*k* ya hādyo=en.
 since LCV sleep=NOM.1S=already CAUS.die=GEN.1S NOM radio=that

‘And since I became sleepy, I killed/turn off the radio.’ (Agt 10–026)

(105) full form genitive clitic =*ku* following a consonant:

yen, ya *magbida*=*yāk* tekamuy, anāk=*ku* ikid ni Enut,...
 that NOM talk=NOM.1S LCV.2P child=GEN.1S and GEN Enut

‘The reason that I am talking to you (pl.), my children and Enut....’ (Agt 9–001)

(106) short form genitive clitic =*k* following a vowel and preceding a vowel-initial clitic determiner:

...te *nagtalog* i hinā=*k*=en.
 because craved.meat NOM mother=GEN.1S=that

‘...because my mother was hungry for meat.’ (Agt 8–097)

In addition to the problem raised by the combination of the second person singular genitive pronoun with a stem ending with an alveolar nasal, one more problem is found in

the data presented in (107)–(108). Recall that SHORT FORM genitive clitic pronouns occur after a VOWEL-final stem. However, the SEEMINGLY short form first person genitive clitic pronoun appears to occur after a CONSONANT-final stem in (107)–(108). One might consider these to be exceptions to the statement that short form genitive clitic pronouns occur after a vowel-final stem. However, if we examine the data in (107)–(108) carefully, we find that when the first person singular genitive pronoun is followed by a deictic determiner (beginning with a vowel), regardless of the stem ending with a vowel (as in (106)) or with a consonant (as in (107)–(108)), the form =*k* occurs. It seems that the SEEMINGLY short form first person singular genitive pronoun =*k* in (107)–(108) is probably NOT a TRUE short form genitive pronoun, but a long form genitive pronoun that is reduced to =*k* when it is immediately followed by a deictic determiner.

Such an analysis is supported by the data presented in (105) and (107). In these examples, the first person singular genitive pronoun occurs after a consonant-final stem. However, it appears as either =*ku* (as in *anāk=**ku***) or =*k* (as in *anāk=**k=en***). In the first instance, the long form =*ku* occurs because it is NOT FOLLOWED by a vowel-initial determiner, whereas in the second instance, the SEEMINGLY short form =*k* occurs because it is FOLLOWED by a vowel-initial determiner.

(107) seemingly short form genitive clitic =*k* following a CONSONANT but preceding a vowel-initial clitic determiner:

...*nelubeg* na ugta ya anāk=**k=en** ã nasi=n....
 trod.on GEN deer NOM child=GEN.1S=that CONJ dead=already/now
 (*nelubeg* < *na-* + *i-* + *lubeg*; *C=k=en* < *C=ku* + *=en*)

‘The deer trod on my child and it’s dead now.’ (Agt 4–013)

(108) seemingly short form genitive clitic =*k* following a CONSONANT but preceding a vowel-initial clitic determiner:

- a. ...te ãmu=*muy* hamãn ya zigãt=*k=in*
 because know=GEN.2P SURP NOM hardship=GEN.1S=that
nagtugut tekamuy.
 left LCV.2P
 (C=*k=in* < C=*ku* + =*in*)

‘...because you (pl.) know how hard it is for me to leave you (pl.).’ (Agt 9–012)

- b. *bimilag=ãk=na umange ta bagetay=en nagayãyãg*
 run=NOM.1S=now go LCV hill=that calling
 ta *kadakalãn=k=en.*
 LCV elder=GEN.1S=that
 (C=*k=en* < C=*ku* + =*en*)

‘I ran now, going up on the hill calling to my elder companion.’ (Agt 8–039)

- c. *mãppyã halã ya ãfuk=*k=in*...*
 good FORTUITOUS NOM grandchild=GEN.1S=this
 (C=*k=in* < C=*ku* + =*in*)

‘My grandson is all right.’ (Agt 8–100)

6.3.2.2 Nominative personal pronouns

Nominative pronouns have four different distributions. First, they can be used as the nonpredicate nominal of a nominal clause, as in (109). Second, they can be used as the sole argument of a monadic clause, as in (110)–(113), and (116). Third, they can be used as the agent of a dyadic *-um-*, *ma-*, *mag-*, or *maN-* clause, as in (114)–(115). Fourth, they can be used as the nongenitive noun phrase of a dyadic *-an* clause, a dyadic (or triadic) *-ãn* clause, a dyadic *i-* clause, or a dyadic *i-* *-ãn* clause, as in (116)–(118).

(109) nominative pronoun as the nonpredicate nominal of a nominal clause:

- ikarga=*m* yen am dwagappak=*kid*, kunna ten.*
 load.with=GEN.2S that if two.pieces=NOM.3P similar that

‘You (sg.) load that up (i.e., into the basket) if there are two pieces, like that.’
 (Agt 11–038)

(110) nominative pronoun as the sole argument of a monadic *-um-* clause:

umange=yāk ta pāke huli=na=en...
go=NOM.1S LCV very rump=GEN.3S=that

‘I went to way the rear of it.’ (Agt 10–008)

(111) nominative pronoun as the sole argument of a monadic *ma-* clause:

kunna ten ā... pettam *matolay=kitām*,....
similar that CONJ so.that live=NOM.1PI

‘That’s the way..., so that we (in.) will all live.’ (Agt 8–060)

(112) nominative pronoun as the sole argument of a monadic *mag-* clause:

magidda=yāk bit lā sin.
lie.down=NOM.1S for.a.while just here

‘I will just lie down here for a while.’ (Agt 10–022)

(113) nominative pronoun as the sole argument of a monadic *maN-* clause:

nanganup=kami.
hunted.with.dogs=NOM.1PE

‘We (ex.) hunted with dogs.’ (Agt 8–007)

(114) nominative pronoun as the agent of a dyadic *mag-* clause:

...te *nagsosaw=āk* ta wer=ewan, dalān=ewan, ta uway,
because trimmed=NOM.1S OBL creek=that trail=that OBL rattan

imange=kid.
went=NOM.3P

‘...because I was trimming rattan on the trail at the nearby creek. So they went.’
(Agt 1–005)

(115) nominative pronoun as the agent of a dyadic *maN-* clause:

kwa ay *e=kami* *mamadday* ta hunut.
thing INJ go=NOM.1PE make OBL torch

‘We (ex.) go make a smoke torch.’ (Agt 11–012)

(116) nominative pronoun as the sole argument of an intransitive verb and nominative pronoun as the theme NP of a dyadic *-an* clause:

“*ã ikamuy hapa, te mabannãg=kid naggagãsa, ã*
 CONJ TOP.2P also because tired=NOM.3P beating.gong CONJ
tubbatan=muy=kid hapa,” *kun=ku, ã “on”.*
 relieve=GEN.2P=NOM.3P also QUOT=GEN.1S CONJ yes

“‘You (pl.) also (do it) because they are tired beating the gongs; you (pl.) relieve them sometimes too,’ I said, ‘All right.’” (Agt 1–049)

(117) nominative pronoun as the nonagentive NP (location) of a triadic *-ãn* clause:

ãy atadãn=mi=kid ta baggãt=en.
 INJ give=GEN.1PE=NOM.3P OBL rice=that

‘So we (ex.) supplied them with some of the rice.’ (Agt 1–031)

(118) nominative pronoun as the nonagentive NP (instrument) of a dyadic *i-* clause:

...iãlung=mãk ta pinggãn=ina.
 ...collect=GEN.2S+NOM.1S LCV plate=that
 (=mãk ‘GEN.2S + NOM.1S’ < =mu ‘GEN.2S’ + =ãk ‘NOM.1S’)

‘...gather me into the plate there by you (sg.).’ (Agt 7–029)

6.3.2.3 Topic/predicate personal pronouns

Topic/predicate pronouns are associated with two grammatical functions. First, they can be used as the predicate pronominal in a nonverbal clause, as in (119). Second, they can be used as a topic in a topicalized sentence, as in (120).

(119) topic/predicate pronoun as the predicate nominal of a nominal clause:

mamadday=kita ta hunut, te yen ya en=tãm
 make=NOM.1D OBL smoke.torch because that NOM go=GEN.1PI
panglub tekid, kum hapa ay, kun=ku am
 harvest.honey LCV.3P QUOT+GEN.2S also INJ QUOT=GEN.1S if
iyak ya nakaita.
 PRED.1S NOM see

“‘Let’s make a smoke torch because that’s what we (in.) will use to smoke them out,’ you (sg.) say—I say if I am the one who saw them.’ (Agt 11–011)

(120) topic/predicate pronoun as a topic:

“ã *ikamuy* hapa, te *mabannâg=kid* *naggagâsa*, ã
 CONJ TOP.2P also because tired=NOM.3P beating.gong CONJ
tubbatan=muy=kid hapa,” *kun=ku*, ã “on”.
 relieve=GEN.2P=NOM.3P also QUOT=GEN.1S CONJ yes

“‘You (pl.) also (do it) because they are tired beating the gongs; you (pl.) relieve them sometimes too,’ I said, ‘All right.’” (Agt 1–049)

6.3.2.4 Locative personal pronouns

Locative pronouns are the personal pronominal equivalents of the *ta/te/teg*-marked full noun phrases. Locative pronouns have a number of functions. First, they can be used as a source phrase, as in (121). Second, they can be used as a goal (or recipient) phrase, as in (122)–(124). Third, they can be used as a comitative phrase, as in (125). Fourth, they can be used as a location phrase, as in (126) and (127). Fifth, they can be used as a temporal framer, as in (127)–(128).

(121) locative pronoun as a source phrase:

mamadday=kita ta hunut, te yen ya
 make=NOM.1D OBL smoke.torch because that NOM
 en=tam *panglub* *tekid....*
 go=GEN.1PI harvest.honey LCV.3P

‘Let’s make a smoke torch because that is what we (in.) will use for harvesting honey from them...’ (Agt 11–011)

(122) locative pronoun as a recipient (goal) phrase:

sangaw ange ã *iatad=mu* sangaw *tentu*.
 later go/come CONJ give=GEN.2S later LCV.3S

‘Later he will come, so just give it to him.’ (Agt 8–069)

(123) locative pronoun as a goal phrase:

...ã *magburung=kām teyak.*
 CONJ worry=NOM.2P LCV.1S

‘...and maybe you (pl.) are also worrying about me.’ (Agt 9–003)

(124) locative pronoun as a goal phrase:

...uhohugan=ku hamān yan *tekamuy*...
 speak=GEN.1S surprisingly this LCV.2P

‘...because I tell this to you (pl.).’ (Agt 9–004)

(125) locative pronoun as a comitative phrase:

...ãmu=muy ta itta=yāk para lã *tekamuy magtabarang.*
 know=GEN.2P TA EXIST=NOM.1S yet just LCV.2P advise

‘...you (pl.) will realize I am still with you (pl.) giving my counsel.’ (Agt 9–008)

(126) locative pronoun as a location phrase:

...ammi itta hapa *mangkakagat teko* ay...
 but EXIST also bite LCV.2S INJ

‘...but some of them will bite (on) you (sg.)....’ (Agt 11–023)

(127) locative pronoun as a temporal framer and oblique pronoun as a location phrase:²⁴

sangaw *tekami=en nahulāt nagbabida* ã *imange=kid=na*
 later LCV.1PE=that bored were.talking CONJ went/came=NOM.3P=already

teyāk.
 LCV.1S

‘Later on, when we (ex.) were weary of conversing, they came up to me.’ (Agt 1–016)

²⁴ Mayfield (1987:83) comments that “One of the two ways to express a temporal setting from the past, especially when it involves the action of a pronoun, is to use the oblique pronoun [locative pronoun in my analysis] form plus the remote identifier followed by the verb in the completed tense. The other construction for a past-tense temporal setting is the oblique [locative], nonpersonal case marker followed by a temporal abstract transform of the verb, and the genitive pronoun followed by the remote identifier....”. Not all examples in the texts however in which a locative pronoun constitutes part of a past temporal clause are followed by a “remote identifier”.

(128) locative pronoun as a temporal framer:

tekid *nabalin*=na *mangān*, *nagpedda*=kami ta *umag*=en,
LCV.3P finished=already eat lay.down=NOM.1PE LCV inside=that

umag na *bali*.
inside NA house
(*mangān* < *mang-* + *kān*)

‘When they had finished eating, we (ex.) lay down inside, inside the house.’
(Agt 1–024)

6.3.2.5 Pronominal clitics or agreement features?

In previous sections, I have tentatively considered all genitive and nominative pronominal forms (or probably their related forms) as clitics. However, as noted in section 6.3.2.1, when the second person singular genitive pronoun =*mu* occurs with stems ending with an alveolar nasal, formal irregularities occur. The morphophonological idiosyncrasies exhibited by the combination of the second person singular genitive pronoun with a stem ending with an alveolar nasal poses the question as to whether all assumed “clitic pronouns” are clitics or agreement features. In this section, I reconsider the status of genitive pronouns (or their probably related form) and see whether ALL these forms are clitics.

As discussed in section 6.3.2.1, Central Cagayan Agta exhibits alternation in the forms of the first person singular genitive pronoun and the second person singular genitive pronoun. The alternation is phonologically conditioned: the full forms =*ku* ‘1s’ and =*mu* ‘2s’ occur after a consonant-final stem, whereas the short forms =*k* ‘1s’ and =*m* ‘2s’ occur after a vowel-final stem. A similar kind of alternation is also found in a number of other Austronesian languages, including all but a few of the Cordilleran languages of the Northern Philippines (Dyen 1974; Tharp 1974a; Blust 1977; Reid 1978,

1981, 2001; etc.). The alternation found in other Cordilleran languages, particularly the one reported in Reid (2001), is of special interest for the purpose of comparison.

Reid (2001:235–237) reports that the so-called first and second person singular genitive pronouns in many Cordilleran languages exhibit alternation in their forms, just like the one described above for Central Cagayan Agta. That is, the full forms, typically =*ku* ‘1s’ and =*mu* ‘2s’, occur postconsonantly, whereas the short forms =*k* ‘1s’ and =*m* ‘2s’ occur postvocally. In addition to the above environment, he reports that in the Central Cordilleran languages,²⁵ as well as in Ilokano, the short forms can also occur on transitive verbs containing a reflex of either *-*en* or *-*an*, by replacing the final *-n* of the verb ending (e.g., Guinaang Bontok *dalusám* ‘you (sg.) clean something’ < *dalusán* + =*m*). In each of these languages (but not in Ilokano), the final *-n* of a transitive verb is also replaced when the third person singular form =*ná* occurs.

To provide an explanation for the occurrence of the postvocalic variants on transitive verbs that otherwise would end in a consonant, he first re-examines the status of these forms, that is, whether they are full words, clitics, affixes, or none of the above. Applying the cliticness tests provided by Zwicky and Pullum (1983:503–504), he concludes that the so-called short form first and second person singular “genitive pronouns” as well as the so-called third person singular “genitive pronoun” *-na* that replace the final *-n* of transitive verbs are NOT clitics, but agreement features that have been incorporated as a part of transitive verbs.

²⁵ The Central Cordilleran languages include Bontok, Kankanaey, Balangao, Ifugao (the Nuclear Central Cordilleran languages), Kalinga and Itneg (which together with the Nuclear group constitute North Central Cordilleran) and Isinai (Reid 1974).

Seeing that similar kind of morphophonological irregularities also occur in Central Cagayan Agta (although only for the second person singular form), I apply the same set of cliticness tests to genitive pronouns in Central Cagayan Agta.

Zwicky and Pullum (1983:503–504) provide the following tests for distinguishing clitics from affixes.

- (a) Clitics can exhibit a low degree of selection with respect to their hosts, while affixes exhibit a high degree of selection with respect to their stems.
- (b) Arbitrary gaps in the set of combinations are more characteristic of affixed words than of clitic groups.
- (c) Morphophonological idiosyncrasies are more characteristic of affixed words than of clitic groups.
- (d) Semantic idiosyncrasies are more characteristic of affixed words than of clitic groups.
- (e) Syntactic rules can affect affixed words, but cannot affect clitic groups.
- (f) Clitics can attach to material already containing clitics, but affixes cannot.

Among all the criteria listed above, at least (a), (c), and (d) are applicable to the forms in questions.

With respect to criterion (a), the assumed genitive pronominal forms are more clitic-like than affix-like in that they exhibit a low degree of selection with respect to their hosts. The genitive pronominal forms are phonologically attached to the head of a construction. Specifically, in a possessive construction, they are phonologically attached to the head noun of the construction, as in (131)–(132). In a verbal clause, like the

nominative pronouns, they are phonologically attached to the head of a clause, that is, the main predicate (whether auxiliary or lexical) of a clause, as in (129)–(137). Notice that although the first and second person singular genitive pronominal forms have two phonologically conditioned variants, their syntactic distribution does not differ from that of the other genitive pronominal forms (cf., (129)–(130), and (135) vs. (131)–(137)). That is, they all occur immediately after the possessed noun in a possessive construction or after the main predicate of a clause.

- (129) nominative pronoun following the main predicate (an existential verb) of the first clause; genitive pronoun attached to the main predicate (a lexical verb) of the second clause:

ã sangaw ittã=**kid**=na, nedatdatang=**da**=n
 CONJ later EXIST=NOM.3P=already arrived.with=GEN.3P=already

ya gãsa.
 NOM gong
 (*nedatdatang* < *na-* + *i-* + *CVC-* + *datang*)

‘Later, they were present, and they brought along the gong.’ (Agt 1–045)

- (130) genitive and nominative pronouns following the main predicate (a directional verb) of the clause:

ay en=**da**=**kid** tinubbatãn ay.
 INJ go=GEN.3P=NOM.3P relieved INJ

‘So they went and relieved them.’ (Agt 1–066)

- (131) nominative pronoun following the main predicate (a lexical verb) of the first clause; (first person singular) genitive pronoun attached to the main predicate (a lexical verb) of the second clause; (first person singular) genitive pronoun attached to the head of a possessive construction:

nagtappan=**ãk**, tinappanãn=**ku** matã=**k**.
 covered=NOM.1S covered=GEN.1S eye=GEN.1S

‘I covered myself, I covered my eyes.’ (Agt 10–013)

- (132) (first person singular) genitive pronoun following the main predicate (a directional verb) of the clause; (first person singular) genitive pronoun attached to the head of a possessive construction:

en=**ku** para *sasiriban* ya matã=**k**.
 go=GEN.1S yet seek NOM eye=GEN.1S

‘I then went to peek my eyes out the little window.’ (Agt 10–014)

- (133) (first person singular) genitive pronoun following the main predicate (a negative auxiliary) of the main clause; genitive pronoun and nominative pronoun following the main predicate (a negative auxiliary) of the subordinate clause:

awe=**k** minã *kinagāt* ya huli na atu am
 NEG=GEN.1S would bit NOM rump GEN dog if

awe=**nāk** *inigsilãn*.
 NEG=GEN.3S+NOM.1S lay.on.top

‘I would not have bitten the dog’s rump if he hadn’t lain down on top of me.’
 (Agt 4–024)

- (134) (first person singular) genitive pronoun and nominative pronoun following the main predicate (a negative auxiliary) of the main clause:

ara awe=**k=kid** lã bit *ikaskãsu*.
 INJ NEG=GEN.1S=NOM.3P only/just for.a.moment acknowledge

‘Well, I won’t acknowledge them yet.’ (Agt 1–015)

- (135) genitive pronoun following the main predicate (a negative auxiliary) of the main clause; (first person singular) genitive pronoun following the main predicate (a lexical verb) of the main clause:

...awe=**muy** lã *burungan*, te *uho*hugan=**ku** hamãn
 NEG=GEN.2P just worry because speak=GEN.1S surprisingly

yan tekamuy....
 this LCV.2P

‘Just don’t worry about it because I tell you (pl.) this.’

- (136) (second person singular) genitive pronoun following the main predicate (dyadic -*ān* verb) of a clause:

en=*tānan*, unnan*ān*=*māk* te
 go=GEN.1PI=now/already precede=GEN.2S+NOM.1S because
 hilāgām=*āk*, te matuga=*yāk* te hiklam=*na*.
 light+GEN.2S=NOM.1S because splinter=NOM.1S because night=already
 (= *tānan* < =*tām* 'GEN.1PI' + =*na* 'already/now'; =*māk* 'GEN.2S + NOM.1S' < =*mu* 'GEN.2S' +
 =*āk* 'NOM.1S'; *hilāgām* < *hilāgān* + =*mu* 'GEN.2S')

'Let's go, go ahead of me and shine the light for me because I will puncture my feet because it is night already.' (Agt 8-051)

- (137) (second person singular) genitive pronoun following the main predicate (a directional verb) of a clause:

a *em*=*ina* *alapan* ay, te *maglangan*=*ka=n*,
 CONJ go+GEN.2S=there get INJ because singe=NOM.2S=already/now
 te *mangigup*=*āk*....
 because/so.that eat.meat=NOM.1S
 (*em* 'go + GEN.2S' < *en* + =*mu* 'GEN.2S')

'Well, go and get it and singe the hair, because I want to eat some meat....' (Agt 8-097)

With respect to criterion (c), there are some pieces of evidence that suggest that the assumed second person singular genitive pronominal form exhibits morphophonological idiosyncrasies that make it more affix-like than clitic-like.

Like the Central Cordilleran languages, both the first and second person singular genitive pronouns in Central Cagayan Agta have a postconsonantal variant (= *ku* '1S' and =*mu* '2S') and a postvocalic variant (= *k* '1S' and =*m* '2S'). However, unlike the Central

Cordilleran languages, the postvocalic variant =*m* (but NOT =*k*) can also occur in (verbal as well as nominal) stems ending with an alveolar nasal, by replacing the stem-final *-n*.²⁶

Consider the first and second singular genitive pronominal forms in examples (138)–(143).

First, let us consider the combination of genitive pronouns with a dyadic *-ān* verb. As shown in (138), when the first person singular genitive pronoun occurs with a dyadic *-ān* verb, the postconsonantal variant =*ku* is used, and the resulting form is *-ān=ku*. However, when the second person singular genitive pronoun occurs with a dyadic *-ān* verb, irregularities occur. As shown in (139), when the second person singular genitive pronoun occurs with a dyadic *-ān* verb, the resulting form is either *-ān=*m** or *-ā*m**.

Second, consider the combination of genitive pronouns with a directional verb. As shown in (140), when the first person singular genitive pronoun occurs with the directional verb *en* ‘go’, the postconsonantal variant =*ku* is used, and the resulting form is *en=ku*. However, when the second person singular genitive pronoun occurs with the directional verb *en* ‘go’, the resulting form is *em* (rather than the nonoccurring form ***en=*mu**), as shown in (141).²⁷

²⁶ The distribution of the second person singular genitive pronominal forms in Central Cagayan Agta is somewhat different from that of second person singular genitive pronominal forms in Central Cordilleran languages. Reid (2001:237) states that “In the Central Cordilleran languages, as well as in Ilokano, an innovation has produced an additional environment in which the shortened forms are found. On transitive verbs containing a reflex of either **-en* or **-an*, the short pronominal form replaces the final *-n* of the verb ending.” In Central Cagayan Agta, the short form =*m* ‘2s’ replaces not only the final *-n* of *-an* (a reflex of **-en*) or *-ān* (a reflex of **-an*), but also the final *-n* of any other verbal stem or nominal stem.

²⁷ It seems that *em* might be analyzed as a combination of the directional verb *e* ‘go’ and the second person singular genitive pronominal form =*mu*. However, based on the observation that the form *e* is ALWAYS immediately followed by a nominative pronoun and the form *en* is ALWAYS immediately followed by a genitive pronoun in all the eleven texts that I examined, I consider *em* as a combination of *en* ‘go’ and =*mu*, rather than a combination of *e* and =*mu*.

Third, consider the combination of genitive pronouns with a quotative verb. As shown in (142), when the first person singular genitive pronoun occurs with the quotative verb *kun*, the postconsonantal variant =*ku* is used, and the resulting form is *kun=ku*. However, when the second person singular genitive pronoun occurs with the quotative verb *kun*, again, irregularities occur. As shown in (143), when the second person singular genitive pronoun occurs with the quotative verb *kun*, the resulting form is *kum* (rather than the nonoccurring form ***kun=mu*).

Fourth, consider the combination of genitive pronouns with a possessed noun in a possessive construction. As shown in (142), when the first person singular genitive pronoun occurs with the head noun *kuhulun* ‘companion’, the postconsonantal variant =*ku* is used, and the resulting form is *kuhulun=ku*. However, when the second person singular genitive pronoun occurs with the head noun *kuhulun* ‘companion’, again, irregularities occur. As shown in (143), when the second person singular genitive pronoun occurs with the head noun *kuhulun* ‘companion’, the resulting form is *kahulum* (rather than the nonoccurring form ***kahulun=mu*).

(138) first person singular genitive form occurring with a dyadic *-ãn* verb:

nagtappan=ãk, *tinappanãn=ku* *matã=k*.
 covered=NOM.1S covered=GEN.1S eye=GEN.1S

‘I covered myself, I covered my eyes.’ (Agt 10–013)

(139) second person singular genitive form occurring with dyadic *-ān* verbs:

en=tānan, *unnanān=māk* *te*
 go=GEN.1PI=now/already precede=GEN.2S+NOM.1S because
hilāgām=āk, *te* *matuga=yāk* *te* *hiklam=na.*
 light+GEN.2S=NOM.1S because splinter=NOM.1S because night=already
 (=tānan < tām 'GEN.1PI' + =na 'already/now'; =māk 'GEN.2S + NOM.1S' < =mu 'GEN.2S' +
 =āk 'NOM.1S'; hilāgām < hilāgān + =mu 'GEN.2S')

'Let's go, go ahead of me and shine the light for me because I will puncture my feet because it is night already.' (Agt 8–051)

(140) first person singular genitive form occurring with the directional verb *en* 'go':

en=ku *para sasiriban* *ya* *matā=k.*
 go=GEN.1S yet seek NOM eye=GEN.1S

'I then went to peek my eyes out the little window.' (Agt 10–014)

(141) second person singular genitive form occurring with the directional verb *en* 'go':

a em=ina *alapan* *ay,* *te* *maglangan=ka=n,*
 CONJ go+GEN.2S=there get INJ because singe=NOM.2S=already/now
te *mangigup=āk....*
 because/so.that eat.meat=NOM.1S
 (*em* 'go + GEN.2S' < *en* + =mu 'GEN.2S')

'Well, go and get it and singe the hair, because I want to eat some meat....' (Agt 8–097)

(142) first person singular genitive form occurring with a quotative verb and with a possessed noun:

awan paha o, *kun=ku* *ta* *kuhulun=ku.*
 NEG yet INJ QUOT=GEN.1S LCV companion=GEN.1S

'“Not yet.” I say to my companion.' (Agt 11–028)

(143) second person singular genitive form occurring with a quotative verb and with a possessed noun:

a am matangad=**mu**=kid hapa a, “ye=in yan o,
 CONJ when look.up=GEN.2S=NOM.3P also CONJ here=this this INJ
 bali=da=in,” **kum** hapa am itta ya kahulum.
 house=GEN.3P=this QUOT+GEN.2S also if EXIST NOM companion+GEN.2S
 (*kum* < *kun* + =**mu**; *kahulum* < *kahulun* + =**mu**)

‘And when you (sg.) can look up and see them, you (sg.) say, “Hey, here is their hive,” if you (sg.) have a companion.’ (Agt 11–008)

In addition to the morphophonological idiosyncrasies exhibited by the second person singular genitive pronoun, one might also use the following piece of evidence to argue against the cliticness of genitive pronominal forms.

Recall that P. Healey (1960:89) describes the existence of some special combining pronominal forms, such as =*nāk* and =*dāk*,²⁸ as in (144)–(146). However, this cannot be used as a strong piece of evidence for arguing against the cliticness of genitive pronominal forms because these combining forms can easily be accounted for by the phonotactics of Agta. More specifically, Central Cagayan Agta does NOT allow vowel clusters. In order to satisfy the phonotactics of the language, when a genitive pronoun occurs with a nominative pronoun, the resulting vowel cluster either has to reduce to a simple vowel or an intervocalic glottal stop has to be inserted. In this case, vowel reduction, rather than glottal stop insertion, is chosen.

²⁸ Unlike Ilokano, the Central Cagayan Agta forms =*nāk* and =*dāk* mean ‘GEN.3S + NOM.1S’ and ‘GEN.3P + NOM.1S’, respectively (they do NOT mean ‘GEN.2S + NOM.1S’ and ‘GEN.2P + NOM.1S’, respectively).

(144) special combining pronoun form =*nāk* following a directional verb:

en=nāk *binolsān* na *kabalay=k=in* ta *limā* *pesuk*,
 go=GEN.3S+NOM.1S pocketed GEN ASS.house=GEN.1S=this LCV five peso

ā *kuman=kami* na *kwa=en* *maglelehut* ay, te
 CONJ similar=NOM.1PE GEN thing=that circling INJ because

awe=na *naapagān* ya *blosa* na *saping=k=en*.
 NEG=GEN.3S found NOM pocket GEN short.pants=GEN.1S=that
 (=nāk 'GEN.3S + NOM.1S' < =na 'GEN.3S' + =āk 'NOM.1S')

'My *kabalay* came to put five pesos in my pocket, and it is like we (ex.) were what-you-call-it, going around in circles, because he could not find the pocket of my short pants.' (Agt 1–051)

(145) special combining pronoun form =*nāk* following a dyadic –*ān* clause:

nagazāzigit *petta* *atākkun=āk* *umange* *unek* *am*
 go.along.edge so.that near=NOM.1S go climb if

gavwātān=nāk na *ānwāng=en*....
 attack=GEN.3S+NOM.1S GEN water.buffalo=that
 (=nāk 'GEN.3S + NOM.1S' < =na 'GEN.3S' + =āk 'NOM.1S')

'I will continue on along close to the edge, so I will be close to go climb (a tree) if the water buffalo attacks me.' (Agt 8–088)

(146) special combining pronoun form =*dāk* following a dyadic –*ān* clause:

ā *ināyagān=dāk*=na hapa ta *talekud* na *bali*
 CONJ called=GEN.3P+NOM.1S=already also LCV behind GEN house

ni *Aleng*
 GEN son
 (=dāk 'GEN.3P + NOM.1S' < =da 'GEN.3P' + =āk 'NOM.1S')

'And they called me behind my son's house.' (Agt 1–091)

With respect to criterion (d), there are some pieces of evidence that suggest that some genitive pronominal forms (especially the third person singular genitive form) exhibit semantic idiosyncrasies that make them more affix-like than clitic-like.

Recall that P. Healey (1960:89) reports the existence of the following special combining forms. These combining forms are not particularly relevant to the discussion here because of the following reasons. The first three forms (=māk, =nāk, and =dāk) are

related to morphophonological idiosyncrasies rather than semantic idiosyncrasies. As for the forms =*taka* and =*takām* (as in (147)), as suggested by Reid (pers. comm.), they are probably the old combining forms for ‘GEN.1S + NOM.2S’ and ‘GEN.1S + NOM.2P’, respectively. As for the forms =*nakami* ‘GEN.2/3S + NOM.1PE’ and =*dakami* ‘GEN.2/3P + NOM.1PE’, their meaning matches that of their corresponding forms in Ilokano. They are probably Ilokano borrowings.

=*māk* ‘GEN.2S + NOM.1S’ (<=*mu* ‘GEN.2S’ + =*āk* ‘NOM.1S’)
 =*nāk* ‘GEN.3S + NOM.1S’ (<=*na* ‘GEN.3S’ + =*āk* ‘NOM.1S’)
 =*dāk* ‘GEN.3P + NOM.1S’ (<=*da* ‘GEN.3P’ + =*āk* ‘NOM.1S’)
 =*taka* ‘GEN.1S + NOM.2S’ (<=*ta* ‘GEN.1D’ + =*ka* ‘NOM.2S’)
 =*takām* ‘GEN.1S + NOM.2P’ (<=*ta* ‘GEN.1D’ + =*kām* ‘NOM.2P’)
 =*na* (or =*ng*)=*kami* ‘GEN.2S + NOM.1PE’ (<=*na* ‘GEN.3S’ + =*kami* ‘NOM.1PE’)
 =*nakami* ‘GEN.3S + NOM.1PE’ (<=*na* ‘GEN.3S’ + =*kami* ‘NOM.1PE’)
 =*dakami* ‘GEN.2/3P + NOM.1PE’ (<=*da* ‘GEN.3P’ + =*kami* ‘NOM.1PE’)

(147) special combining form *takām*:

a *pakimällak=takām* hapa *ta intu* minã, i Hesus,
 CONJ pray.for=GEN.1S+NOM.2P also TA TOP.3S should NOM Jesus

ya *makkāmu tekamuy ta adangan=muy*....
 NOM know LCV.2P LCV request=GEN.2P
 (= *takām* ‘GEN.1S + NOM.2P’ <=*ta* ‘GEN.1D’ + =*kām* ‘NOM.2P’)

‘I also pray for you (pl.) that he, Jesus, will be the one responsible to you (pl.) in regard to your (pl.) request....’ (Agt 9–015)

The form that is of special interest here is the third person singular genitive form =*na*. Usually, the third person singular genitive is expressed by the form =*na*, as in (148); the third person plural genitive is expressed by the form =*da*, as in (149). However, in some cases, the form =*na* rather than =*da* is used to express ‘third person PLURAL’, as in (151)–(150). In (150), the form =*na* does not cross-reference with any of the NPs in the sentences, one cannot tell whether it refers to a ‘third person singular’ agent or a ‘third person plural’ agent. However, the contextual cues unambiguously point out that =*na*

refers to a ‘third person PLURAL’ agent, rather than a ‘third person SINGULAR’ agent. In the text, (150) describes an event that subsequently happens after the event described in (149). The form =*na* in (150) refers back to ‘the Americans’ in (149). In (151)–(152), the form =*na* refers to the *nig*-marked personal noun phrase in the sentence. The fact that =*na* can refer to either a third person SINGULAR participant or a third person PLURAL participant, that is, it has lost its plurality feature, makes it more affix-like than clitic-like.

(148) *na* ‘GEN.3S’

...en=***na=kami*** *inalāp* malat,....
 go=GEN.3S=NOM.1PE got certainly

‘...He came and got us (ex.) for sure,....’ (Agt 10–001)

(149) *da* ‘GEN.3P’

...en=***da=kami=n*** *inaribungbungān* na Merikāno kid=en.
 go=GEN.3P=NOM.1PE=already surrounded GEN American PL.=that

‘...the Americans came and gathered around us (ex.).’ (Agt 10–016)

(150) *na* ‘GEN.3’

en=***na*** *tinā-bil* *ig* *aboy* *neuhet* ta *huplāno=en*
 go=GEN.3 held NOM.PL daughter exited LCV airplane=that

‘They went and took the little girl and her brothers in their arms out from the airplane.’ (Agt 10–017)

(151) *na* ‘GEN.3’

kuman=en *hā* ta *pagtugut=**na=n*** ***nig*** ***aboy=en***,
 similar=that again LCV leave=GEN.3=already GEN.PL daughter=that

yen ya *kuga*....
 that NOM truly

‘It was that way again when the children and their mother left; that was really....’ (Agt 10–018)

(152) *na* 'GEN.3'

tekid *nakalutu*, ay en=*na*=*kid*=*na* *pinakān* **nig** **Litdag**,
 LCV.3P cooked INJ go=GEN.3=NOM.3P=already fed GEN.PL Litdag

Munit,...

Munit

'When they had finished cooking, they went, Litdag and Munit, and fed them,....' (Agt 1–077)

Let me sum up the discussion of clitics and agreement features here.

First, the assumed genitive pronominal forms are more clitic-like than affix-like in that they exhibit a relatively low degree of selection with respect to their host. More specifically, they are phonologically attached to the head of a possessive construction and the head of a verbal construction (regardless of whether the head is an auxiliary verb or a lexical verb).

Second, they are more affix-like than clitic like in that some of them (in particular the second person singular form) exhibit morphophonological idiosyncrasies. The fact that the second person singular genitive pronominal form exhibits morphophonological idiosyncrasies suggests that in some cases it might be an agreement feature rather than a clitic.

Third, they are more affix-like than clitic-like in that at least one of them (the third person singular form) exhibits semantic idiosyncrasies. The fact that the form =*na* can refer to either a third person singular agent or a third person plural agent suggests that in some cases =*na* might have become an agreement that can alternate with both =*na* and =*da* as clitics.

The coexistence of some alternate forms, such as $-ān=m$ and $-ām$ and $=na/=da$ ‘GEN.3P’ seems to suggest that the genitive pronominal forms (in particular the singular forms) are in the process of losing their cliticood in Central Cagayan Agta.

6.4 TRANSITIVITY IN CENTRAL CAGAYAN AGTA VERBAL CLAUSES

In this section, I discuss transitivity in Central Cagayan Agta verbal clauses. I first discuss Central Cagayan Agta verbal clause patterns in 6.4.1. Then I discuss three possible analyses concerning Central Cagayan Agta transitivity and actancy structure in 6.4.2. Section 6.4.3 evaluates these three analyses in terms of morphosyntactic and semantic properties that Central Cagayan Agta clauses exhibit. Section 6.4.4 summarizes the discussion in this section.

6.4.1 Central Cagayan Agta Verbal Clause Patterns

Three major verbal clause patterns are found in Central Cagayan Agta: (i) Pattern 1: monadic intransitive clauses, (ii) Pattern 2: dyadic $-um-$, $ma-$, $mag-$, $maN-$ clauses, and (iii) Pattern 3: (a) dyadic $-an$ clauses, (b) dyadic $-ān$ clauses, (c) dyadic $i-$ clauses, and (d) dyadic $i-$ $-ān$ clauses. In pattern 1, the lexical verbs are either morphologically unmarked or have the morphological shape $-um-$, $ma-$, $mag-$, $maN-$. In pattern 2, the dyadic lexical verbs are either morphologically unmarked or have the morphological shape $-um-$, $ma-$, $mag-$, or $maN-$. In patterns 3a–3d, the dyadic lexical verbs have the morphological shape $-an$, $-ān$, $i-$, and $i-$ $-ān$ respectively. These three clause patterns are represented schematically in table 6.7.

TABLE 6.7 VERBAL CLAUSE PATTERNS IN CENTRAL CAGAYAN AGTA

PATTERN 1: <i>-um-/ma-/mag-/maN-V</i> Intr.	<i>ya/i/ig</i> Nom agent/theme	N		
PATTERN 2: <i>-um-/ma-/mag-/maN-V</i> Intr.?Tr.?	<i>ya/i/ig</i> Nom agent	N	<i>ta</i> Obl?/Acc? theme	N
PATTERN 3A: <i>V-an(=Gen)</i> Intr.?Tr.?	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom theme	N
PATTERN 3B: <i>V-ãn(=Gen)</i> Intr.?Tr.?	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom location	N
PATTERN 3C: <i>i-V(=Gen)</i> Intr.?Tr.?	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom instrument	N
PATTERN 3D: <i>i-V-ãn(=Gen)</i> Intr.?Tr.?	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom benefactive	N

In this study, dyadic *-an* clauses, dyadic *-ãn* clauses, dyadic *i-* clauses, and dyadic *i-ãn* clauses are considered to form one major type of dyadic clauses because they share the same case frame. That is, they all expect both an agentive genitive NP and a nonagentive nominative NP. However, they differ from each other in the interpretation of the nominative NP. In dyadic *-an* clauses, the nominative NP is usually interpreted as a directly affected theme. In dyadic *-ãn* clauses, the nominative NP is usually interpreted as a location, or a less directly affected theme. In dyadic *i-* clauses, the nominative NP is usually interpreted as an instrument. In dyadic *i-ãn* clauses, the nominative NP is usually interpreted as a beneficiary.

Pattern 1 typically consists of monadic *-um-/ma-/mag-/maN-* verbs that expect only one nominative NP, as in (153)–(156). In some cases, the monadic verbs may also allow an optional peripheral argument (or adjunct) that is marked by *ta*, as in (157). The monadic verbs in pattern 1 do NOT take any cross-reference pronominal clitic, as shown in (153)–(157).

(153) pattern 1: monadic *ma-* clause:

nasidug hapa ya Mandaripān.
 asleep also NOM Mandaripan

‘Mandaripan also went to sleep.’ (Agt 7–008)

(154) pattern 1: monadic *mag-* clause:

a. ...*nagkakasidug=na de ya ugsin kid=en?...*
 ...asleep=already/now probably NOM Filipino PL=that

‘...Maybe the lowlanders are sleeping now?...’ (Agt 8–063)

b. ...*atsi nagānāk yen.*
 INJ gave.birth that(NOM)

‘...Oh—oh, it has given birth.’ (Agt 8–086)

(155) pattern 1: monadic *maN-* clause:

manganup=kitām, Aleng, te ilāku=tām ta kānan=tām....
 hunt.with.dogs=NOM.1PI son because sell=GEN.1PI LCV food=GEN.1PI

‘Let’s go hunting with dogs, Son, so that we (in.) will have something to sell for our (in.) food. (Agt 8–003)

(156) pattern 1: monadic *-um-* clause:

umange=n ya katuhangān=k=en, en=na inalāp.
 go=already NOM parent.in.law=GEN.1S=that/there go=GEN.3S got

‘My parent-in-law went and got it.’ (Agt 8–072)

(157) pattern 1: monadic *-um-* clause:

ay gafu ta kuman=en *umange=yāk* hã ta bali.
 INJ since LCV similar=that go=NOM.1S again LCV house

‘So, on account of that, I went to the house again.’ (Agt 1–097)

Pattern 2 typically consists of dyadic *-um-*, *ma-*, *mag-*, or *maN-* verbs that expect both a nominative NP and a *ta*-marked full NP, as in (158). In some cases, the dyadic *-um-*, *ma-*, *mag-*, or *maN-* verbs in pattern 2 may also allow an optional peripheral argument (or adjunct) that is marked by *ta*, as in (159). Like the monadic *-um-*, *ma-*, *mag-*, or *maN-* verbs in pattern 1, the dyadic *-um-*, *ma-*, *mag-*, or *maN-* verbs in pattern 2 do NOT take any cross-reference pronominal clitic, as in (158)–(159).

(158) pattern 2: dyadic *maN-* clause:

...*mangalāp=ka* hapa ta hulu=en lipātu....
 get=NOM.2S also OBL bamboo=that soft-dry-stage

‘...you (sg.) get some soft-dry-stage bamboo.’ (Agt 5–005)

(159) pattern 2: dyadic *mag-* clause:

...te *nagsosaw=āk* ta wer=ewan, dalãn=ewan, ta uway,
 because trimmed=NOM.1S LCV creek=that trail=that OBL rattan

imange=kid.
 went=NOM.3P

‘...because I was trimming rattan on the trail at the nearby creek. So they went.’
 (Agt 1–005)

Patterns 3a–d typically consist of dyadic *-an* verbs, dyadic *-ãn* verbs, dyadic *i-* verbs, or dyadic *i-* *-ãn* verbs that expect both an agentive genitive-marked full NP (or other genitive substitute) and a nonagentive nominative full NP (or other nominative substitute), as in (160)–(167). Like the verbs in pattern 1 and pattern 2, the dyadic *-an* verbs, dyadic *-ãn* verbs, dyadic *i-* verbs, or dyadic *i-* *-ãn* verbs in patterns 3a–d may also

allow an optional peripheral argument (or adjunct) that is marked by *ta*, as in (161) and (166). However, the dyadic verbs in patterns 3a–d differ from the monadic and the dyadic verbs in pattern 1 and pattern 2 in that the dyadic verbs in patterns 3a–d can take an optional cross-reference genitive pronominal clitic that agrees with the person and number features of the genitive-marked NP (as in (160)–(163)), whereas the monadic and the dyadic verbs in pattern 1 and pattern 2 do NOT take any cross-reference pronominal clitic. Notice that if a lexical verb functions as the main predicate of a sentence, the cross-reference genitive pronominal clitic occurs immediately after the lexical verb, as in (160)–(162). However, if the main predicate is an auxiliary verb, the cross-reference genitive pronominal clitic is attached to the auxiliary verb rather than the lexical verb, as in (163).

(160) pattern 3a: dyadic *-an* clause (with a cross-reference genitive clitic pronoun):

...*kinagāt=na* hapa *na taggam* ya huli na atu.
bit=GEN.3S also GEN ant NOM rump GEN dog

‘...the ant bit the rump of the dog.’ (Agt 4–022)

(161) pattern 3a: dyadic *-an* clause:

...*dinagdag=nāk*, *dinagdag=nāk* ta gatab=en.
followed=GEN.3S+NOM.1S followed=GEN.3S+NOM.1S LCV cliff=that/there

‘...it chased me to the cliff.’ (Agt 8–032)

(162) pattern 3b: dyadic *-ān* clause (with a cross-reference genitive clitic pronoun):

nagazāzigit petta atākkun=*āk* *umange* unek am
go.along.edge so.that near=NOM.1S go climb if

gavwātān=nāk *na ānwāng=en....*
attack=GEN.3S+NOM.1S GEN water.buffalo=that
(=*nāk* ‘GEN.3S + NOM.1S’ <=*na* ‘GEN.3S’ + =*āk* ‘NOM.1S’)

‘I will continue on along close to the edge, so I will be close to go climb (a tree) if the water buffalo attacks me.’ (Agt 8–088)

(163) pattern 3b: dyadic *-ān* clause (with a cross-reference genitive clitic pronoun attached to the main directional auxiliary predicate):

...en=**da**=*kami*=n *inaribungbungān* **na** *Merikāno* *kid=en*.
 go=GEN.3P=NOM.1PE=already surrounded GEN American PL=that

‘...the Americans came and gathered around us (ex.).’ (Agt 10–016)

(164) pattern 3b: dyadic *-ān* clause:

sinosawān=ku=n *sinosawān* ta talun.
 trimmed=GEN.1S=already trimmed LCV forest

‘I trimmed and trimmed (it) in the forest.’ (Agt 8–075)

(165) pattern 3c: dyadic *i-* clause:

- a. ...*nelubeg* na ugta ya anāk=k=en ā *nasi=n*...
 trod.on GEN deer NOM child=GEN.1S=that CONJ dead=already/now
 (*nelubeg* < *na-* + *i-* + *lubeg*)

‘The deer trod on my child and it’s dead now.’ (Agt 4–013)

- b. ...*itubbak*=ku=n hapa ya talintin=en ta
 pierce=GEN.1S=already also NOM service.line=that LCV
 dang=na=en...
 comb.with.larvae=GEN.3S=that

‘...I stick the service line onto the larva portion of the hive...’ (Agt 11–025)

- c. *ikarga*=m yen am dwagappak=kid, kunna ten.
 load.with=GEN.2S that(NOM) if two.pieces=NOM.3P similar that

‘You (sg.) load that up (i.e., into the basket) if there are two pieces, similar to that.’ (Agt 11–038)

- d. yen ya *ianup=dāk* te e paruba talo am
 that NOM hunt.with=GEN.3P+NOM.1S because go try in.case if
magānāk ya lamān.
 give.birth NOM wild.pig
 (*dāk* ‘GEN.3S + NOM.1S’ < *da* ‘GEN.3S’ + *āk* ‘NOM.1S’)

‘That was their reason for using me in hunting, to go and try in case the wild pigs had given birth.’ (Agt 8–004)

(166) pattern 3c: dyadic *i*- clause:

...*i*älung=*māk* ta pinggān=ina.
 collect=GEN.2S+NOM.1S LCV plate=that
 (= *māk* 'GEN.2S + NOM.1S' < =*mu* 'GEN.2S' + =*āk* 'NOM.1S')

'...gather me into the plate there by you (sg.).' (Agt 7-029)

(167) pattern 3d: dyadic *i*- *-ān* clause:

Mandaripān, Mandaripān, em=āk idu-dutān.
 Mandaripan Mandaripan go+GEN.2S=NOM.1S pluck.for

'Mandaripan, Mandaripan, come and pluck (for) me.' (Agt 7-009)

6.4.2 Three Possible Analyses Concerning Central Cagayan Agta Transitivity and Actancy

As shown in section 6.4.1, there are two distinct dyadic clause patterns that are ambiguous regarding transitivity. Varying in their interpretation of these two patterns, three possible analyses concerning Central Cagayan Agta transitivity and actancy structure can be proposed: a passive analysis, a split-ergative analysis, and an ergative analysis.

In a passive analysis, the *tal/te/teg*-marked theme full NP in pattern 2 would be treated as an “accusative” object of an active transitive construction, but the *na/ni/nig*-marked agent (or other genitive substitute) in patterns 3a–d would be treated as a demoted agent of passive constructions. By treating pattern 1 as intransitive, pattern 2 as canonical transitive, and patterns 3a–d as passives, Central Cagayan Agta can be analyzed as an accusative language. The passive analysis is schematically summarized as in table 6.8.

TABLE 6.8 CENTRAL CAGAYAN AGTA AS AN ACCUSATIVE LANGUAGE

PATTERN 1:	<i>-um-/ma-/mag-/maN-V</i> Intr.	<i>ya/i/ig</i> Nom agent/theme	N		
PATTERN 2:	<i>-um-/ma-/mag-/maN-V</i> Tr.	<i>ya/i/ig</i> Nom agent	N	<i>ta</i> Acc theme	N
PATTERN 3A:	<i>V-an(=Gen)</i> Intr.	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom theme	N
PATTERN 3B:	<i>V-ān(=Gen)</i> Intr.	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom location	N
PATTERN 3C:	<i>i-V(=Gen)</i> Intr.	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom instrument	N
PATTERN 3D:	<i>i-V-ān(=Gen)</i> Intr.	<i>na/ni/nig</i> Gen agent	N	<i>ya/i/ig</i> Nom benefactive	N

In a split-ergative analysis, the *ta*-marked theme NP in pattern 2 would be treated as an “accusative” object of one type of transitive construction, and the *na/ni/nig*-marked NP (or other genitive substitute) in patterns 3a–d would be treated as an agent of the other type of transitive construction. By treating pattern 1 as intransitive and both pattern 2 and patterns 3a–d as canonical transitive, Central Cagayan Agta can be analyzed as a split-ergative language. The split-ergative analysis is summarized schematically in table 6.9.

TABLE 6.9 CENTRAL CAGAYAN AGTA AS A SPLIT-ERGATIVE LANGUAGE

PATTERN 1:	<i>-um-/ma-/mag-/maN-V</i> Intr.	<i>ya/i/ig</i> Nom/Abs agent/theme	N		
PATTERN 2:	<i>-um-/ma-/mag-/maN-V</i> Tr.	<i>ya/i/ig</i> Nom agent	N	<i>ta</i> Acc theme	N
PATTERN 3A:	<i>V-an(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs theme	N
PATTERN 3B:	<i>V-ān(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs location	N
PATTERN 3C:	<i>i-V(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs instrument	N
PATTERN 3D:	<i>i-V-ān(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs benefactive	N

In an ergative analysis, the *ta*-marked theme full NP in pattern 2 would be treated as an oblique-marked extended core argument of an extended intransitive construction but the *na/ni/nig*-marked agent (or other genitive substitute) in patterns 3a–d will be treated as an agent of a transitive construction. By treating pattern 1 as intransitive, pattern 2 as extended intransitive, and patterns 3a–d as transitives, Central Cagayan Agta can be analyzed as a pure ergative language. The ergative analysis is summarized schematically in table 6.10.

TABLE 6.10 CENTRAL CAGAYAN AGTA AS AN ERGATIVE LANGUAGE

PATTERN 1:	<i>-um-/ma-/mag-/maN-V</i> Intr.	<i>ya/i/ig</i> Nom/Abs agent/theme	N		
PATTERN 2:	<i>-um-/ma-/mag-/maN-V</i> Intr.	<i>ya/i/ig</i> Nom/Abs agent	N	<i>ta</i> Obl theme	N
PATTERN 3A:	<i>V-an(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs theme	N
PATTERN 3B:	<i>V-ān(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs location	N
PATTERN 3C:	<i>i-V(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs instrument	N
PATTERN 3D:	<i>i-V-ān(=Gen)</i> Tr.	<i>na/ni/nig</i> Gen/Erg agent	N	<i>ya/i/ig</i> Nom/Abs benefactive	N

As illustrated in tables 6.8–6.10, all three analyses agree in treating pattern 1 as an intransitive structure, but disagree as to whether pattern 2 and/or patterns 3a–d should be treated as transitive structures. Such disagreement exists because both pattern 2 and patterns 3a–d are dyadic structures that might be considered transitive. Because both pattern 2 and patterns 3a–d are possible candidates for transitive constructions, it is crucial to determine which one of the two, or whether both, should count as transitive constructions in Central Cagayan Agta. In the following section, I examine the

morphosyntactic and semantic properties that these clause patterns exhibit in order to decide the matter.

6.4.3 Morphosyntactic and Semantic Properties of Central Cagayan Agta Verbal Clauses

Central Cagayan Agta is a relatively under-described language. Only a few SIL (Summer Institute of Linguistics) linguists have published any phonological, syntactic, or discourse studies on this language (Oates and Oates 1958; P. Healey 1958, 1960; Mayfield 1972, 1983, 1987). In previous analyses of Central Cagayan Agta syntax, it has been described as having a unique “verbal focus” system (P. Healey 1960; Mayfield 1972, 1987). Under the focus analysis, the notion of transitivity is neglected. This leads to the impossibility of determining actancy structures of Central Cagayan Agta; as a result, its typological status is uncertain.

In this study, I depart from the previous analyses in considering transitivity as an important notion in Central Cagayan Agta syntax. By re-examining Central Cagayan Agta verbal clause patterns in terms of the morphosyntactic and semantic properties that they exhibit, I make a clear statement about its typological status. More specifically, Central Cagayan Agta is analyzed as having a pure ergative actancy structure. The following morphosyntactic and semantic evidence can justify this claim.

6.4.3.1 Nominal case-marking

As discussed in 6.4.2, three possible analyses of Central Cagayan Agta verbal clauses can be proposed: a passive analysis, a split-ergative analysis, and an ergative analysis.

In this section, I evaluate these three analyses in terms of the nominal case-marking system.

If we compare the three types of analyses in terms of the nominal case-marking system, we find that the ergative analysis is a better analysis of Central Cagayan Agta transitivity.

If the passive analysis were correct, then the *ta*-marked theme NP in pattern 2 would be an “accusative” NP and the *na/ni/nig*-marked NP (or other genitive substitute) in patterns 3a–d would be a peripheral argument or an adjunct. However, as shown in section 6.3.1.3, my textual analysis suggests that the *ta*-marked NP in pattern 2 should be treated as an OBLIQUE-marked extended core argument E rather than an accusative-marked core argument O. Besides, the analysis that treats the *na/ni/nig*-marked NP (or other genitive substitute) in patterns 3a–d as an adjunct may raise questions such as “If the *na/ni/nig*-marked NP (or other genitive substitute) in patterns 3a–d is an adjunct, why is it almost always present in this type of clause?” or “If the *na/ni/nig*-marked NP (or other genitive substitute) in patterns 3a–d is an adjunct, why can it undergo some syntactic processes?”, and so forth.

If the split-ergative analysis were correct, the *ta*-marked theme NP in pattern 2 would be an “accusative” NP and the *na/ni/nig*-marked NP (or other genitive substitute) in patterns 3a–d would be an “ergative” NP. As just noted, my textual analysis points out

that the *ta*-marked NP in pattern 2 should be treated as an OBLIQUE-marked extended core argument E rather than an accusative-marked core argument O. Moreover, if the split-ergative analysis were the correct characterization of Central Cagayan Agta transitivity, we would run into the following problem in typology.

Typologically speaking, if a language exhibits a split case-marking system, it is commonly conditioned by one or more of the following factors: (1) the semantic nature of the main verb, (2) the semantic nature of the core NPs (e.g., pronominals vs. full noun phrases), (3) the tense/aspect/mood of the clause, and (4) the grammatical status of a clause (i.e., whether it is a main or subordinate clause) (Dixon 1979, 1994). However, none of these factors seems to condition the supposed split case-marking system described in the split-ergative analysis. From a typological perspective, such an analysis would be undesirable because it would make Central Cagayan Agta (as well as many other western Austronesian languages) typologically unusual in that it would show an idiosyncratic type of split case-marking system, one that had none of the usual motivations for such a split.

On the other hand, if the ergative analysis is correct, then all the problems that we encountered for the other two types of analyses are avoided. As already demonstrated in section 6.3.1.3, the textual analysis suggests that the *ta*-marked theme NP in pattern 2 should be an OBLIQUE-marked extended core argument E and the *na/ni/nig*-marked NP (or other genitive substitute) in patterns 3a–d should be an ergative-marked A (genitive-marked A in my analysis). This is exactly what is to be expected in an ergative analysis.

6.4.3.2 Agreement

If we compare the three types of analyses in terms of verbal agreement, we find that the ergative analysis is a better analysis of Central Cagayan Agta transitivity.

Typologically speaking, agreement is a property that is more likely associated with the core arguments S, A, and O than with any other arguments and/or adjuncts (Whaley 1997:153, 164–165; Dixon 1994:45). If a verb agrees with adjuncts or arguments other than the three core arguments S, A, and O in some features, we would expect that it would also agree with S, A, and O in those features, and not vice versa.

If the passive analysis were the correct characterization of Central Cagayan Agta transitivity, then the genitive-marked NP (i.e., the *na/ni/nig*-marked NP or other genitive substitute) in patterns 3a–d would be an adjunct. Typologically speaking, we would expect that the verb would agree with the genitive-marked NP (an adjunct in this type of analysis) if, and only if, it also agrees with the nominative NP (i.e., the *ya/i/ig*-marked NP) and the “accusative” NP (i.e., the *ta*-marked NP in this type of analysis). However, these types of data are not found in Central Cagayan Agta texts.

If the split-ergative analysis were correct, then Central Cagayan Agta would have a split agreement system in which only certain types of transitive clauses would exhibit verbal agreement, but other types of transitive clauses would not. Again, like the supposed split case-marking system, the supposed split agreement system is not conditioned by any of the four factors cited in 6.4.3.1. And again, from a typological point of view, such an analysis would be undesirable because Central Cagayan Agta

would become typologically unusual in that it would show an idiosyncratic type of split-agreement system, one without any of the usual motivations.

If the ergative analysis is correct, then Central Cagayan Agta has a pure ergative agreement system in which the verb of a transitive clause agrees only with the genitive-marked A in person and number features (as in (168)–(170)), but not with the nominative-marked S and O or other core arguments or adjuncts. From a typological point of view, this type of ergative agreement system is typologically plausible, though rare.

(168) pattern 3a: dyadic *-an* clause with a cross-reference genitive clitic pronoun:

longan=**na** hapa **na** Mandaripān ya māmānuk.
shoot=GEN.3S also GEN Mandaripan NOM bird

‘So Mandaripan shoots the bird.’ (Agt 7–007)

(169) pattern 3b: dyadic *-ān* clause with a cross-reference genitive clitic pronoun:

...inibatān=**nāk**=na **na** sibrung=**en**.
released=GEN.3S+NOM.1S=already GEN kidnapper=that
(=**nāk** ‘GEN.3S + NOM.1S’ < =**na** ‘GEN.3S’ + =**āk** ‘NOM.1S’)

‘...the kidnapper released me.’ (Agt 3–004)

(170) pattern 3b: dyadic *-ān* clause with a cross-reference genitive clitic pronoun attached to the main directional auxiliary predicate:

...en=**da**=kami=**n** inaribungbungān **na** Merikāno kid=**en**.
go=GEN.3P=NOM.1PE=already surrounded GEN American PL=that

‘...the Americans came and gathered around us (ex.).’ (Agt 10–016)

6.4.3.3 Semantic transitivity

In the preceding two sections, I have shown that evidence from the nominal case-marking system and the verbal agreement system suggests that an ergative analysis is a better analysis of Central Cagayan Agta transitivity than the other analyses. In this

section, I demonstrate that semantic evidence converges with morphosyntactic evidence in this conclusion.

As discussed in Chapter 4, linguists working on different language families agree with Hopper and Thompson (1980) in the observation that semantic properties often correlate with morphosyntactic transitivity in a systematic way (e.g., Tsunoda 1999; Gibson and Starosta 1990; Dixon 1994; Huang 1994; Starosta 1997, 1998, 1999, 2002b; Lazard 1997; Rau 1997). More specifically, they have shown that if semantic parameters covary with morphosyntactic manifestations of transitivity, clauses exhibiting high semantic transitivity are more likely to be encoded grammatically (morphologically and syntactically) as transitive.

However, they disagree with each other on whether all of the ten semantic parameters that Hopper and Thompson proposed should be considered equally relevant to the morphosyntactic manifestations of transitivity. For instance, Tsunoda (1999:4) suggests that AFFECTEDNESS OF THE PATIENT is the most important and is (almost) always relevant to the morphosyntactic manifestations of transitivity. However, my analysis of Kavalan textual data shows that INDIVIDUATION OF THE THEME is most relevant to the morphosyntactic manifestations of Kavalan transitivity. My analysis of Squliq Atayal, however, suggests three semantic parameters, VOLITIONALITY, INDIVIDUATION OF THE THEME, and AFFECTEDNESS OF THE THEME, as most relevant to the morphosyntactic manifestations of transitivity in Squliq Atayal. In this study, I consider two semantic

parameters, INDIVIDUATION OF THE THEME and AFFECTEDNESS OF THE THEME,²⁹ as most relevant to the morphosyntactic manifestations of transitivity in Central Cagayan Agta.

Let us compare the interpretation of the theme NPs in pattern 2 (i.e., dyadic *-um-*, *ma-*, *mag-*, *maN-* clauses) with the theme NPs (or the nonagentive nominatives) in patterns 3a–d (i.e., dyadic *-an* clauses, dyadic *-ān* clauses, dyadic *i-* clauses, or dyadic *i-* *-ān* clauses) in examples (171)–(180). Consider the examples of dyadic *-um-*, *ma-*, *mag-*, *maN-* clauses in (171)–(174). The theme NPs in these examples can either be something generic or unidentifiable, or something that forms a part of a (particular) entity, or something that is partially affected by an event.

(171) pattern 2: dyadic *maN-* clause with an indefinite theme:

kwa, am mangalap=ka ta tahu a itam am itta
 thing when get=NOM.2S OBL honey CONJ see=GEN.2S if EXIST
 ya barsi na kayu, ya sabong na kayu=en.
 NOM blossom GEN tree NOM blossom GEN tree=that

‘Well, when you (sg.) get honey, look and see if there are tree blossoms, that is, flowers of the particular tree.’ (Agt 11–001)

(172) pattern 2: dyadic *maN-* clause with an indefinite theme:

mamadday=kitām hapa ta kwa, talintin te
 make=NOM.1PI also OBL thing service.line because

pangidagut=tām.
 lowering.instrument=GEN.1PI

‘Let’s also make a what’s it, a service line, for us (in.) to lower with.’ (Agt 11–015)

²⁹ As discussed in Chapter 5, among the ten semantic parameters proposed by Hopper and Thompson, two of them (i.e., Affectedness of theme NPs and Individuation of theme NPs) need to be modified in order to cover dyadic applicative constructions in languages that make extensive use of applicative constructions. These two semantic parameters can be restated as “Affectedness of NONAGENTIVE NPs” and “Individuation of NONAGENTIVE NPs”, in which nonagentive NPs can be theme NPs or beneficiary NPs, instrument NP, etc.

(173) pattern 2: dyadic *mag-* clause with an indefinite theme:

ay, *maghushusat*=kami **ta uway** ay, ata-nang, te itta hapa
 INJ split=NOM.1PE OBL rattan INJ high because EXIST also
 ya appatafulu metru ta kadanuk=*na* ta kayu kata-nang=*na*.
 NOM forty meter LCV length=GEN.3S LCV tree height=GEN.3S

‘So, we (ex.) split and split (some of the) rattan, that is long, because the height of the tree is forty meters.’ (Agt 11–016)

(174) pattern 2: dyadic *maN-* clause with a partially affected theme:

...*mangalāp*=kām **ta uway=ina** te takkal=*muy*...
 get=NOM.2P OBL rattan=that for arm.band=GEN.2P

‘...take some of that rattan for your (pl.) armband...’ (Agt 5–001)

In contrast, consider the theme NPs of dyadic *-an* clauses, dyadic *-ān* clauses, dyadic *i-* clauses, or dyadic *i- -ān* clauses in (175)–(180). We find that the theme NPs (or the nonagentive nominatives) in these examples can be associated with something that is identifiable or something that is totally affected by an event. One thing to be noted is that the nonagentive NP in (177) is a place name, but a dyadic *-an* verb (whose nominative NP is usually interpreted as a theme) rather than a dyadic *-ān* verb (whose nominative NP is usually interpreted as a location) is used. In this case, a dyadic *-an* verb is used because the place *Karāmbat* is totally affected by the action of hunting; therefore, it is interpreted as an affected theme rather than a (noncompletely affected) location.

(175) pattern 3a: dyadic *-an* clause with a definite theme:

dinagdag=mi *dinagdag*=mi=*n* namān **ya ugta=en**.
 followed=GEN.1PE followed=GEN.1PE=already at.last NOM deer=that

‘We (ex.) followed and followed the deer.’ (Agt 8–025)

(176) pattern 3a: dyadic *-an* clause with a definite and completely affected theme:

...ã ginilât=ku=n ya ugta=en.
 CONJ barbed.arrow=GEN.1s=already NOM deer=that

‘...and I hit the deer with the barbed arrow.’ (Agt 8–031)

(177) pattern 3a: dyadic *-an* clause with a fully affected theme:

tâkwân na lamân ya inanup=mi, inanup=mi ya Karâmbat,
 different GEN wild.pig NOM hunted=GEN.1PE hunted=GEN.1PE NOM Karambat

yen ya netubbât=mi ya Karâmbat inanup.
 that NOM substituted=GEN.1PE NOM Karambat hunted

‘Then another place of wild pig we (ex.) hunted; we (ex.) hunted the Karambat area—that’s where we (ex.) turned to, hunting the Karambat area.’ (Agt 8–012)

(178) pattern 3b: dyadic *-ân* clause with a definite nonagentive argument:

indagân=mi bit i aboy=en, te ange gumâtâng
 wait.for=GEN.1PE for.a.moment NOM daughter=that because go buy

ta baggât,te balonan=muy, petta ittâ hapa kânan=muy ta
 OBL rice because travel=GEN.2P so.that EXIST also eat=GEN.2P LCV

bali=muy....
 house=GEN.2P

‘We (ex.) are waiting for the daughter because she went to buy some rice for your (pl.) travel provisions, so you (pl.) will have something to eat at home....’ (Agt 1–025)

(179) pattern 3c: dyadic *-i* clause with a definite nonagentive argument:

yen ya inanup=dâk te e paruba talo am
 that NOM hunt.with=GEN.3P+NOM.1S because go try in.case if

magânâk ya lamân.
 give.birth NOM wild.pig

(=*dâk* ‘GEN.3S + NOM.1S’ <=*da* ‘GEN.3S’ + =*âk* ‘NOM.1S’)

‘That was their reason for using me in hunting, to go and try in case the wild pigs had given birth.’ (Agt 8–004)

(180) pattern 3d: dyadic *i-* *-ân* clause with a definite nonagentive argument:

Mandaripân, Mandaripân, em=âk idu-dutân.
 Mandaripan Mandaripan go+GEN.2S=NOM.1S pluck.for

‘Mandaripan, Mandaripan, come and pluck (for) me.’ (Agt 7–009)

Summing up the discussion in this section, we can state that pattern 2 clauses (i.e., dyadic *-um-*, *ma-*, *mag-*, *maN-* clauses) are associated with nonindividuated and/or nontotally affected nonagentive NPs, whereas patterns 3a–d clauses (i.e., dyadic *-an* clauses, dyadic *-ãñ* clauses, dyadic *i-* clauses, and dyadic *i- -ãñ* clauses) are associated with highly individuated and/or totally affected nonagentive NPs. These semantic properties suggest that pattern 2 clauses (i.e., dyadic *-um-*, *ma-*, *mag-*, *maN-* clauses) are semantically LESS transitive than patterns 3a–d (i.e., dyadic *-an* clauses, dyadic *-ãñ* clauses, dyadic *i-* clauses, and dyadic *i- -ãñ* clauses). If we correlate this semantic property with the morphosyntactic properties that we discussed in the preceding two sections, we find that semantically more transitive patterns 3a–d clauses (i.e., dyadic *-an* clauses, dyadic *-ãñ* clauses, dyadic *i-* clauses, and dyadic *i- -ãñ* clauses) are manifested grammatically as more transitive than semantically less transitive pattern 2 clauses (i.e., dyadic *-um-*, *ma-*, *mag-*, *maN-* clauses).

6.4.4 Summary

In the preceding sections, I have evaluated the three possible analyses concerning Central Cagayan Agta transitivity in terms of morphosyntactic and semantic criteria. Based on the morphosyntactic and semantic properties that Central Cagayan Agta verbal clauses exhibit, we can conclude that the ergative analysis is the best analysis of Central Cagayan Agta transitivity.

6.5 ERGATIVITY

Having determined the transitive constructions in Central Cagayan Agta, it is possible to determine what type of actancy structure Central Cagayan Agta has.

Incorporating the observations in section 6.4, we can characterize Central Cagayan Agta clause structures as in table 6.11. From the table, we can observe that both the S of an intransitive clause and the O of a transitive clause are marked by a nominative auxiliary noun *yalilig* or are expressed by other nominative substitute, while the A of a transitive clause is marked by a genitive auxiliary noun *na/ni/nig* or are expressed by other genitive substitute. This suggests that Central Cagayan Agta has a pure ergative case-marking system rather than an accusative or a split-ergative system.

TABLE 6.11 CENTRAL CAGAYAN AGTA ACTANCY STRUCTURE

PATTERN 1: <i>-um-/ma-/mag-/maN-V</i> Intr.	<i>ya/i/ig</i> N Nom S agent/theme	
PATTERN 2: <i>-um-/ma-/mag-/maN-V</i> Intr.	<i>ya/i/ig</i> N Nom S agent	<i>ta</i> N Obl E theme
PATTERN 3A: <i>V-an(=Gen)</i> Tr.	<i>na/ni/nig</i> N Gen/Erg A agent	<i>ya/i/ig</i> N Nom O theme
PATTERN 3B: <i>V-ān(=Gen)</i> Tr.	<i>na/ni/nig</i> N Gen/Erg A agent	<i>ya/i/ig</i> N Nom O location
PATTERN 3C: <i>i-V(=Gen)</i> Tr.	<i>na/ni/nig</i> N Gen/Erg A agent	<i>ya/i/ig</i> N Nom O instrument
PATTERN 3D: <i>i-V-ān(=Gen)</i> Tr.	<i>na/ni/nig</i> N Gen/Erg A agent	<i>ya/i/ig</i> N Nom O benefactive

In addition to an ergative case-marking system, Central Cagayan Agta also exhibits an ergative agreement system. Based on the discussion in 6.4.3.2, we find that in Central Cagayan Agta, verbs can carry an optional genitive pronominal clitic that agrees with the A of a transitive clause in person and number, but not with the S of an intransitive verb

nor with the O of a transitive verb. This suggests that Central Cagayan Agta has an ergative agreement system.

Because Central Cagayan Agta shows ergativity in both its nominal case-marking system and in its verbal agreement system, we can conclude that Central Cagayan Agta has a pure ergative actancy structure.

6.6 CONCLUSION

In this chapter, I have re-examined Central Cagayan Agta clause structures in terms of morphosyntactic and semantic criteria. Three questions have been answered.

First, are the prenominal monosyllabic forms determiners or nouns in Central Cagayan Agta?

Based on the discussion in 6.3.1.3, we can conclude that all the prenominal monosyllabic forms are “AUXILIARY NOUNS” that carry the feature [+extension], that is, nouns that require a dependent predicate.

Second, what constitutes the transitive construction in Central Cagayan Agta?

As shown in 6.4.3, based on the morphosyntactic and semantic properties that Central Cagayan Agta clauses exhibit, we can conclude that patterns 3a–d clauses (that is, dyadic *-an* clauses, dyadic *-ān* clauses, dyadic *i-* clauses, and dyadic *i- -ān* clauses) are transitive constructions, whereas pattern 2 clauses (i.e., dyadic *-um-*, *ma-*, *mag-*, *maN-* clauses) are extended intransitives or pseudo-transitives, a type of intransitive clause.

Third, what kind of actancy structure does Central Cagayan Agta have (accusative, ergative, or split ergative)?

Based on the discussion in sections 6.3.1.3 and 6.4, we can observe that the S of an intransitive clause and the O of a transitive clause have the same morphological marking, whereas the A of a transitive clause has a distinct morphological marking. This suggests that Central Cagayan Agta has a pure ergative case-marking system. Moreover, in sections 6.3.2 and 6.4.3.2, I have demonstrated that in Central Cagayan Agta, verbs can carry an optional genitive clitic pronoun that agrees with the A of a transitive clause in person and number, but not with the S of an intransitive verb nor with the O of a transitive verb. This suggests that Central Cagayan has an ergative agreement system.

Because Central Cagayan Agta shows ergativity in both its nominal case-marking system and in its verbal agreement system, we can conclude that Central Cagayan Agta has a pure ergative actancy system.

CHAPTER 7

TRANSITIVITY AND ERGATIVITY IN DIBABAWON MANOBO

7.1 INTRODUCTION

Dibabawon Manobo is an Austronesian language spoken by some 10,000 Manobos living in the Province of Davao del Norte, between the Libuganon River and the Diwata Mountains, Mindanao, the Philippines (Forster and Barnard 1987; <http://www.ethnologue.com>). It is known as Mandayan in the Agusan River Valley. It has been classified as a member of the Eastern branch of the Central Manobo subgroup of Southern Philippine languages (<http://www.ethnologue.com>).

This chapter re-examines Dibabawon Manobo clause structures from a broad typological perspective and determines the canonical transitive construction and actancy structure of Dibabawon Manobo based on morphosyntactic and semantic criteria. Four major questions will be answered here. First, what are the constraints that condition the relative order of pronouns? Second, are the prenominal monosyllabic forms determiners or nouns in Dibabawon Manobo? Third, what constitutes the transitive construction in Dibabawon Manobo? Fourth, what kind of actancy structure does Dibabawon Manobo have (accusative, ergative, or split ergative)? In order to answer these questions, some basic linguistic facts about Dibabawon Manobo will be provided.

This chapter is organized as follows. Section 7.2 discusses word order in Dibabawon Manobo. Section 7.3 deals with construction markers and the case-marking system in Dibabawon Manobo. Section 7.4 discusses transitivity in Dibabawon Manobo clause

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(1) nominal clause: NP (Predicate) NP (Nominative)²

si Samuk=dà kan *manganup* nokani no moy pad idù
 NOM Samuk=just KAN hunter formerly LIG EXIST yet dog
 no tumawan.³
 LIG hunting.dog

‘Samuk was the only hunter before who still had a hunting dog.’ (MBD 3–001)

Verbal clauses can be headed by either an auxiliary verb or a lexical verb. In a pragmatically unmarked verbal clause, the main verbal predicate precedes ALL other elements (e.g., noun phrases, dependent verbs, adverbs, etc.), as in (2)–(4).

(2) verbal clause headed by an existential verb: **Exist NP ...**

moy manuk-manuk no *mig-andu-on* to tanomanan=din.
 EXIST bird LIG go.there TO plant.place=GEN.3S

‘There was a bird that went to his garden.’ (MBD 9–004)

(3) verbal clause headed by a negative existential verb: **Neg.Exist NP...**

wadà la-in manigo-on no *nakasakoy* to ariplanu, kandin=dà
 NEG.EXIST other old.person LIG ride TO airplane 3S=only

‘No other old man has ridden in a plane, only him.’ (MBD 6–017)

(4) verbal clause headed by a negative auxiliary verb: **Neg Adv pig-V Adv ... NP**

wadà *kaugoylugoy* *pig-usab* mandà *pigboklas* to lubid.
 NEG long.time again again jerked TO rope

‘In just a little while the rope was jerked again.’ (MBD 9–133)

Three major verbal clause patterns are found in Dibabawon Manobo: (i) Pattern 1: monadic intransitive clauses, (ii) Pattern 2: dyadic *-um-/og-*, or *maN-* clauses, and (iii)

² Unless otherwise indicated, all Dibabawon Manobo data used in this study are taken from the eleven texts in Forster and Barnard (1987). The example reference numbers following the free translation are organized according to the order that they appeared in Forster and Barnard’s monograph. For example, MBD 3–001 means that the example is the first sentence of Dibabawon Manobo Text 3.

³ The Dibabawon Manobo orthography used here is the same as that used by Forster and Barnard (1987). The symbol *o* stands for a high back open unrounded vowel (i.e., the “pepet”) (represented as *e* in other publications on this language); *ng* stands for velar nasal; – stands for an intervocalic glottal stop, ‘ stands for a syllable final glottal stop. However, when glottal stop occurs word initially preceding a vowel, it is not written.

Pattern 3: (a) dyadic *-on* clauses, (b) dyadic *-an* clauses, and (c) dyadic *i-* clauses.⁴ In pattern 1, the lexical verbs are either morphologically unmarked or have the morphological shape *-um-/og-*, *ma-*, *maN-*. In pattern 2, the dyadic lexical verbs are either morphologically unmarked or have the morphological shape *-um-/og-*, or *maN-*. In patterns 3a–3c, the dyadic lexical verbs have the morphological shape *-on*, *-an*, and *i-*, respectively.

In pattern 1 (a monadic intransitive clause), if a monadic intransitive verb functions as the main verbal predicate, it will occur clause initially and is followed by a nominative full NP or a nominative substitute, as in (5)–(6).

(5) monadic *-um-/og-* clause with one full NP: ***nig-V* NP (Nominative)**

- a. ...*niglogdog* sikan mata ni Mandabon.
 flamed that eye GEN Mandabon

‘The eyes of Mandabon became red.’ (MBD 8–052)

- b. *pagkaso-uma=on nigpangiyak* si Mandabon.
 one.farm=already yelled NOM Mandabon

‘After they had gone a kilometer, Mandabon yelled.’ (MBD 8–061)

⁴ The Dibabawon Manobo reflexes of PAN **-um-*, PMP **maR-*, PMP **maN-*, PAN **-en*, PAN **-an*, PAN **Si-* (or PMP **hi-*) are *-um-*, *og-*, *maN-*, *-on*, *-an*, and *i-*, respectively. Unlike Tagalog *-um-* and *mag-*, Dibabawon Manobo *-um-* and *og-* are used to form different aspectual forms of the same verb (rather than being used to form verbs with slightly semantic difference and/or verbs belonging to different verb classes). The *-um-* form in Dibabawon Manobo is the DEPENDENT REMOTE form of the so-called “Actor Focus” verbs, i.e., verb form that is used to refer to general, customary, or indefinite actions or actions which may or may not have been begun and have not been completed. The *og-* form is THE INDEPENDENT REMOTE form of the so-called “Actor Focus” verbs, i.e., verb form that is used to refer to conditions, both actual and potential, and to certain mitigated commands. Strictly speaking, the formative *og-* CANNOT be considered to be a formative for deriving “Actor Focus” verbs. Instead, it should be considered to be a formative for deriving all the INDEPENDENT REMOTE aspect verb forms because it can occur not only with the so-called “Actor Focus” verbs, but also with the “NonActor Focus” verbs.

(6) monadic *maN*- clause with one full NP: *mang-V NP (Nominative)*

...ko *mang-uli=on* si Haldo, asta si Asaw, aw si Edad,
 when return=now NOM Haldo and NOM Asaw and NOM Edad
alidyahon=nu=d gobay *umabut=a* di *ogkangkamongà=on* to angkow.
 assign=GEN.2S=now so.that arrive=NOM.1S and complete=now TO altar
 ‘When Haldo and Asaw and Edad came home, you (sg.) give them their
 assignments so that whenever I arrive, the altars can be completed.’ (MBD 6–
 156)

In pattern 2 clauses (dyadic *-um-/og-*, or *maN*- clauses) that contain a full NP and a pronominal clitic, regardless of being headed by an auxiliary verb or by a lexical verb, the only full NP in the clause always occurs after the dyadic—*um-/og-*, or *maN*- verb, as in (7).⁵

(7) dyadic *-um-/og-* clause with one full NP and one clitic pronominal NP: *og-V=Nom NP (Obl)*

ko *oghimu=koy to galingan*, *ogpili-on=noy* kan kayu no *madoyow*
 when make=NOM.1PE TO corn.mill select=GEN.1PE KAN wood LIG good
 su so-idi mungo kayu, *mahan-ing* to kalasi.
 because this PL wood many TO class
 ‘When we (ex.) make a corn mill, we (ex.) will select the right tree, because as
 for these trees, there are many classes.’ (MBD 1–003)

In patterns 3a–3c clauses (dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses) that contain two or more full NPs, the preferred word order is the agent preceding the theme (or location, instrument, or beneficiary), regardless of their grammatical relations, as in (8)–(10).

⁵ I was unable to find a single occurrence of pattern 2 clauses with two full NPs in any of the eleven texts in Forster and Barnard (1987); they are, therefore, excluded from the discussion here.

- (8) dyadic *-on* clause with two full NPs: *pig-V NP (Gen) NP (Nom)*

pagkali-us ni Edu pigsugù=on ni Amoy si Inoy...
gone GEN Fred commanded=now GEN Father NOM Mother

‘When Fred had left, Father instructed Mother....’ (MBD 6–135)

- (9) dyadic *-an* clause with two full NPs: *V-an NP (Gen) NP (Nom)*

- a. *dayun to pighulidan ni Edu si Amoy, nalipodong ubag*
then TO lay.beside GEN Fred NOM Father sleep mere
si Amoy su migtu-u man kandin to nahulidan ni Edu.
NOM father because believed really 3S TO lie.beside GEN Fred

‘So then Fred lay down beside Father; Father slept a little because he had faith in Fred lying beside him.’ (MBD 6–129)

- b. *...ko oghimatayan to amoy to batà=din no daga[HL1] to konà=din*
if kill TO father TO child=GEN.3S LIG lady TO NEG=GEN.3S
no gustu sikan lukos no impagsabut to batà=din.
LIG like that man LIG understood TO child=GEN.3S

‘The father will kill his daughter if the man his child has made an agreement with is not to his liking.’ (MBD 7–002)

- (10) dyadic *i-* clause with two full NPs: *i-V NP (Gen) NP (Lcv) NP (Nom)*

...su iyan imbuyù to bantoy ita to pitu no bu-uk su
because it.is requested TO guard 1D TO seven LIG piece because

si Elena nakasaà.
NOM Elena sinned

‘...that the spirit requested seven pigs from us (dl.) because Elena sinned.’
(MBD 6–147)

In patterns 3a–c (dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses) that contain a full NP and a pronominal clitic, regardless of being headed by an auxiliary verb or by a lexical verb, the only full NP in the clause always occurs after (but not necessarily immediately after) the dyadic *-on* verb, dyadic *-an* verb, dyadic *i-* verb, as in (11)–(13).

- (11) dyadic *-on* clause with one full NP and one clitic pronominal NP: **V-*on*=Gen NP (Nom)**

kaling man ko oghimu=a to galingan, iyan=dà oghimu-*on*=*ku*
 therefore really when make=NOM.1S TO corn.mill it.is=just make=GEN.1S

kan malibatu no kayu, su lagboy *ogpakaligis* to batad.
 KAN malibatu LIG wood because really grind TO corn

‘Therefore, whenever I make a corn mill, the only one that I will make it from is *malibatu* wood, because it can really grind corn.’ (MBD 1–008)

- (12) dyadic *-an* clause with one full NP and one clitic pronominal NP: **V-*an*=Gen NP (Nom)**

dayun to *pig-andiya-an=din kan babuy* no *migpabaogbaog* aw
 then TO went.there=GEN.3S KAN pig LIG CAUS.facing and

kilap kan babuy to *moy=on otow*.
 recognize KAN pig TO EXIST=now person

‘Then he approached the pig that stood facing and the pig realized it was a person.’ (MBD 3–026)

- (13) dyadic *i-* clause with one full NP and one clitic pronominal NP: ***i*-V=Gen NP (Nom)**

pagdinog=ku sikan no kagi, *puli=a=d* *mighipanow* aw
 heard=GEN.1S that LIG word just=NOM.1S=now walked and

ipanimbag=ku kan bagon aw kan salidingan.
 discarded.with=GEN.1S KAN rattan and KAN decoration

‘When I heard that word, I just went on and I threw away the rattan and the decorative leaves.’ (MBD 6–170)

7.2.2 The Order of Pronouns

Like Squaliq Atayal and Central Cagayan Agta, pronouns in Dibabawon Manobo can also be divided into two types: clitic pronouns and free form pronouns. These two types of pronouns differ in their syntactic distribution. Clitic pronouns are phonologically attached to the main predicate of a clause, whereas free form pronouns occur after, but not necessarily immediately after, a lexical verb (cf. (14)–(16) vs. (17)). Notice that

pronominal clitics occur BEFORE aspectual adverbial clitics (as in (14) and (15)), whereas free form pronouns occur AFTER aspectual clitics (as in (17)).

When the main predicate of a clause is a lexical verb, a clitic pronoun is attached to the lexical predicate, as in (14)–(16). When the main predicate of a clause is an auxiliary verb, a clitic pronoun is attached to the main auxiliary predicate, rather than the lexical verb, as in (18)–(19).

- (14) clitic pronoun immediately following the main predicate (a lexical verb) of a clause: **og-V=Nom=Adv**

og-uli=a=d.
return=NOM.1S=now

‘I will be going now.’ (MBD 8–021)

- (15) clitic pronoun immediately following the main predicate (a lexical verb) of a clause: **V-an=Gen=Adv**

paminogan=dan=pa to kayu no ogkangkatu-ad.
listened.to=GEN.3P=yet TO tree LIG fall

‘They listened to the tree crashing down.’ (MBD 9–097)

- (16) clitic pronoun immediately following the main predicate (a lexical verb) of a clause: **og-V-hon=Gen ...**

dì basta og-unahon=ta oglugi-an kan babow.
but if first=GEN.1D make.hole KAN upper

‘But first we (dl.) will make a hole in the top one.’ (MBD 1–013)

- (17) free form pronoun not immediately following a lexical verb: **og-V=Adv
Pronoun (Neutral)**

...nigba-id=on kan bantoy diya to mongo duma=ku to
announced=now KAN guard there TO PL companion=GEN.1S TO

oggawang=on kandin.
depart=now 3S

‘...the spirit had announced to my companions its intention that it would go away.’ (MBD 11–012)

- (18) clitic pronoun immediately following the main predicate (a negative auxiliary) of a clause: **Neg=Gen i-V ...**

...di wadà=**ku** ibogoy su ogpakabusung=on no galingan sikan.
 but NEG=GEN.IS give.with because punish=now LIG corn.mill that

‘...but I will never give it because that is a mill that can bring supernatural punishment.’ (MBD 1–029)

- (19) clitic pronoun immediately following the main predicate (a negative auxiliary) of a clause: **Neg=Nom=Adv=Adv og-V ...**

konà=**ki**=d=on ogpakahinalin to og-ugpa-an su ko
 NEG=NOM.ID=now=now transfer TO dwell because if

humalin=ki pad, og-agawan=ki=d to pasak=ta.
 transfer=NOM.ID yet snatch=NOM.ID=now TO land=GEN.ID

‘We (dl.) cannot continually transfer occupancy now because if we (dl.) transfer, our (dl.) land will be grabbed from us (dl.)’ (MBD 2–010)

In addition to negative auxiliaries, clitic pronouns can also be attracted to forms that are translated as adverbs in English. One might analyze these forms as adverbs; however, I prefer to analyze them as auxiliary verbs rather than adverbs in that they can be immediately followed by a “ligature”, which in turn is followed by a verbal clause that is headed by a lexical verb.⁶ In western Austronesian languages (including Dibabawon Manobo), the position immediately preceding the ligature is typically occupied by a head noun or a head verb. The fact that these forms can occur immediately before the ligature seems to suggest that syntactically they are HEADS (AUXILIARY VERBS in this case) that take the verbal clause introduced by the ligature as their clausal dependent.

- (20) pronominal clitic following a clause-initial temporal auxiliary verb:

...**dayun**=a ogkaboù ki Laureano.
 then=NOM.IS angry LCV Laureano

‘...I would immediately become furious with Laureano’ (MBD 11–019)

⁶ Please refer to section 7.3.1.1 for detailed discussion of ligatures.

- (21) pronominal clitic and adverbial clitic following a clause-initial temporal auxiliary verb:

...*singaman*=noy=on *ogkalingawan*....
 sometimes=GEN.1PE=now forget

‘...sometimes we (ex.) forget about them....’ (MBD 5–024)

- (22) pronominal clitic following a clause-initial locative auxiliary verb:

sikan apugan, *dini*=ku *igbilin* ki *Siaman*...
 that lime.place here=GEN.1S leave.with LCV Siaman

‘As for the house altar, I will leave it here with Siaman....’ (MBD 10–021)

- (23) pronominal clitic and adverbial clitic following a manner auxiliary verb:

ogkahimù man, di *madaas*=nu=dà *igbu-us* *dini* to *Makgum*....
 able really but quick=GEN.2S=just escort here TO Makgum

‘It can be, but you (sg.) must bring him back to Makgum quickly....’ (MBD 4–031)

- (24) pronominal clitic and adverbial clitic following a clause-initial manner auxiliary verb:

labi=nu=d *gayod* no *dakoo* to *pagpasalamat*=noy aw
 especially=GEN.2S=now also LIG much TO thank=GEN.1PE and

ki *Maam* *Mike* aw *Maam* *Jan*....
 LCV Ma’am Mike and Ma’am Jan

‘Especially we (ex.) are very thankful to Mike and Jan....’ (MBD 11–031)

Furthermore, clitic pronouns can also be attracted to clausal conjunctions, as in (25).

The fact that clitics can attach to clausal conjunctions can be interpreted in two different ways. First, it suggests that the form *awos* ‘so that’ in (25) might be an auxiliary verb.

Second, it suggest that clitics are less selective as to their host. Whether the first interpretation or the second interpretation is the more accurate characterization of the data is a question that requires further research.

(25) pronominal clitics attached to a clausal conjunction:

miglogwà=a awos=a=now matabangan.
 emerged=NOM.1S so.that=NOM.1S=GEN.2P help.to

‘I appeared, so that you (pl.) might be able to help me.’ (MBD 9–110)

Having discussed the relative order between predicates and pronouns, I turn to the discussion of the relative order between pronouns.

In previous studies, Dibabawon Manobo has been described as having the similar pronominal ordering constraints as those found in Agusan Manobo (Forster 1964:48, note 20). According to Weaver and Weaver (1964:162–5, 169), Agusan Manobo observes the following pronominal ordering constraints.

- Rule 1. The Topic Set outranks the Source Set, which in turn outranks the Oblique Set. The Topic Set occurs immediately following the predicate in nonnegated clauses. [i.e., NOMINATIVE > GENITIVE > NEUTRAL]
- Rule 2. When clitic pronouns, Topic and Source Sets, cooccur, the Speaker form outranks the Hearer, and both outrank any form of Other. [i.e., FIRST PERSON > SECOND PERSON > THIRD PERSON]
- Rule 3a. When conflict develops between Rules 1 and 2 (the Source Set is the Speaker and the Topic Set is the Hearer), the Source Set pronoun can be deleted. [i.e., ONLY the NOMINATIVE pronoun is expressed.]
- Rule 3b. The Source Set pronoun continues to function as the Speaker while the Hearer is manifested by the Oblique Set pronoun. [i.e., Use the first person genitive pronoun and the second person NEUTRAL PRONOUN.]

- Rule 4. Clitic pronouns become enclitic to the negative particle; free pronouns remain postpredicate. [i.e., Clitic pronouns occur immediately after a negative auxiliary, whereas free form pronouns occur after a lexical verb.]

The pronominal order constraints that Weaver and Weaver (1964) described for Agusan Manobo is generally true for Dibabawon Manobo, but it requires slight modification.

In this study, I consider the order of pronominals in Dibabawon Manobo to be determined by the following rules.

- **Rule 1:** Clitic pronouns always precede free form pronouns [CLITIC > NONCLITIC].
- **Rule 2a:** Nominative pronouns precede genitive pronouns [NOMINATIVE > GENITIVE].
- **Rule 2b:** First person pronouns precede second person pronouns and third person pronouns; second person pronouns precede third person pronouns [1 > 2 > 3].
- **Rule 3a:** If a nominative pronoun is LOWER than a genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then ONLY the NOMINATIVE PRONOUN is expressed.
- **Rule 3b:** If a nominative pronoun is LOWER than a genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then substitute the nominative pronominal clitic with a free form pronoun. That is, use a genitive pronoun and a free form pronoun.

Rules 2a–b and Rules 3a–b are restricted to verbal clause patterns 3a–c only because pattern 2 clauses do NOT take a genitive-marked agentive phrase. When there is a conflict between Rule 2a and Rule 2b (i.e., when the case hierarchy and the person hierarchy are in conflict), Rules 3a–b are used to resolve the conflict.

First, let us consider Rule 1: clitic pronouns always precede free form pronouns.

This rule is predictable because of the basic syntactic difference between clitic pronouns and free form pronouns. As previously discussed, clitic pronouns are phonologically attached to the main predicate (either an auxiliary or a lexical verb) of a clause, whereas free form pronouns occur after (but not necessarily immediately after) a lexical verb. As shown in (26)–(27), the clitic pronouns =*kow* ‘NOM.2P’ and =*ku* ‘GEN.1S’ precede the free form pronouns *kanak* ‘1S’ and *ikow* ‘2S’, respectively.

(26) a clitic pronoun precedes a free form pronoun:

masubali ko maydu-on ogkupasùpasù puli=*kow* sugba *kanak*,
better if EXIST feverish only=NOM.2P call 1S

aw gayod konà=*kow* ogpakawadà to sinugbahan no babuy.
and also NEG=NOM.2P NEG TO dedicated LIG pig

‘It is better if there is someone who has a fever that you (pl.) call on me, and also be sure that you (pl.) don’t get rid of the pig that is dedicated.’ (MBD 10–023)

(27) a clitic pronoun precedes a free form pronoun:

kaling di pigpaduguk=*ku*=d *ikow*....
therefore approached=GEN.1S=now 2S

‘That’s why I had you (sg.) come over....’ (MBD 7–016)

Second, let us consider Rule 2a and Rule 2b. Rule 2a states that nominative pronouns precede genitive pronouns. Rule 2b states that first person pronouns precede second person pronouns and third person pronouns; second person pronouns precede third person

pronouns. These two rules have to be used jointly rather than separately. As shown in (28)–(30), when the nominative pronoun is HIGHER than the genitive pronoun in terms of the person hierarchy, BOTH nominative and genitive pronouns can appear as pronominal clitics.

- (28) a first person nominative pronoun precedes a second person genitive pronoun

eh, *ogduma=a=dà* su *og-oyowan=a=nu* buwa.
 eh companion=NOM.1S=just because abandon=NOM.1S=GEN.2S maybe

‘Eh, I will just go with you (sg.), because maybe you (sg.) will leave me behind.’ (MBD 4–024)

- (29) a first person nominative pronoun precedes a third person genitive pronoun

nawà no malituk=on ni Amoy to *ogdokaton=a=din*,....
 as LIG utter=now GEN Father TO fetch=NOM.1S=GEN.3S

‘The moment Father said that he would fetch me....’ (MBD 4–020)

- (30) a second person nominative pronoun precedes a third person genitive pronoun

dagow masa-aban=ka, ko-onon=ka=din giyud.
 might overtaken=NOM.2S eat=NOM.2S=GEN.3S surely

‘He will probably come upon you (sg.), he will surely eat you (sg.).’ (MBD 9–094)

However, the case hierarchy and the person hierarchy do NOT ALWAYS interact with each other in an expected way (i.e., elements that are higher in the case hierarchy are NOT ALWAYS elements that are higher in the person hierarchy). When they do not interact with each other in the expected way, either Rule 3a or Rule 3b can be employed to avoid the conflict.

Now, let us consider Rule 3a and Rule 3b. Rule 3a: If a nominative pronoun is LOWER than a genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then only the nominative pronoun is expressed. Rule 3b: If a nominative pronoun is LOWER than a

genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then substitute the nominative pronominal clitic with a free form pronoun. That is, use a genitive pronoun and a free form pronoun.

As shown in (31), when the nominative pronoun is LOWER than the genitive pronoun in the person hierarchy, then only the nominative pronominal clitic is used.

(31) Rule 3a: only nominative pronominal clitic is used

tutuwanan=*kow* to datu no moy pongot no buwawan.
 tell=NOM.2P TO chief LIG EXIST beard LIG gold

'I will tell you (pl.) about a chief who had a golden beard.' (MBD 9-001)

In addition to the above solution, one can also solve the same problem by changing the nominative clitic to a free form pronoun. As shown in (32), when the nominative pronoun is LOWER than the genitive pronoun in the person hierarchy, then one can replace the nominative pronoun by a free form pronoun.

(32) Rule 3b: substitute the nominative pronominal clitic with a free form pronoun

a. ...ogdaahon=*noy ikow* diyà to duktul.
 carry=GEN.1PE 2S there TO doctor

'...we (ex.) will take you (sg.) to a doctor.' (MBD 6-114)

b. iyan=dà ingkadokat=*ku ikow* su oghihinang=kinow.
 it.is=just fetched.for=GEN.IS 2S because do=NOM.1PI

'I came for you (sg.) because we (in.) will have a ceremony' (MBD 4-046)

c. ...su tahan in-udas=*ku iyu* to sakit no likat no
 because already excused=GEN.IS 2P TO sickness LIG from LIG

oghingadanan to botang no likat=dà to otow.
 named TO magic LIG from=just TO person

'...because I already excused myself before to you (pl.) concerning the sickness that is called black magic that originates with a person.' (MBD 6-102)

- d. su dakoo iyan podom no *pigka-atan=now kandin* sikan
 because large it.is fain LIG pity.toward=GEN.2P 3S that
 no sakit=din no pada ma-uli-an podom kandin.
 LIG sickness=GEN.3S so that recover fain 3S
 ‘Because you (pl.) showed great sympathy toward him in his infirmity, so that
 he might recover.’ (MBD 6–013)

7.2.3 The Order of Elements in Possessive Constructions

Having discussed the order of full NPs and pronominal NPs in unmarked sentence structures, I now turn to the discussion of the relative order of elements of noun phrases. In this section, I focus my discussion on the order between possessors and possessed nouns in possessive constructions.

In Dibabawon Manobo, possessive constructions resemble unmarked main clause structures in having the head noun occur before its attribute. In a single possessive construction, the head noun (i.e., the possessed noun) precedes the dependent noun (i.e., the possessor), as in (33)–(37). In a multiple possessive construction, the possessed noun phrase precedes the dependent noun phrases, and each dependent noun phrase can be further divided into a possessed noun followed by a possessor, as in (38).

(33) single possessive construction: N [*ni* N]

...*miglagà=on* man kan *asawa [ni Samuk]*.
 ...boiled=already really KAN wife GEN Samuk

‘...The wife of Samuk had already cooked.’ (MBD 3–007)

(34) single possessive construction: N [*nig* N]

dayun to *mig-uli=koy=on* diyà to **baoy** [*oni* **Anakon**]
 then TO returned=NOM.1PE=now there TO house GEN.PL Niece
 no *pig-ugpa-an=noy*.
 LIG resided=GEN.1PE

‘Then we (ex.) went home to Nieces’ house where we (ex.) were living.’ (MBD 6-044)

(35) single possessive construction: N [*to* N]

dayun to *pigdinog=on* to *tagilunsud* no *mongo* otow
 then TO heard=now TO from.town LIG PL person
 to **akwag** [*to idù*].
 TO bark TO dog

‘Right away the townspeople heard the bark of the dog.’ (MBD 3-013)

(36) single possessive construction: N [*sikan* N]

unuga=dan to **kobong** [*sikan mongo batà*] dow ando-i pu-un.
 trace=GEN.3P TO foot that PL child if where origin

‘They traced the footprints of the children to see where they had come from.’ (MBD 8-032)

(37) single possessive construction: N[=Gen]

sikan=dà to **tutuwanon**[=*ku*] bahin to pasak.
 that=just to narrative=GEN.1S about to land

‘That’s all my narrative about land.’ (MBD 2-024)

(38) multiple possessive construction: N [*to* N [*ni* N]]

“wa!” kagi ni Amoy, “angod to **akwag** [*to idù* [*ni Samuk*]] tadu-on.”
 hey word GEN Father like TO bark TO dog GEN Samuk that

“‘Hey!’, said Father, “that sounds like the bark of Samuk’s dog.’ (MBD 3-020)

7.2.4 Word Order in Topicalized Sentences

Having discussed the word order of elements in unmarked sentence structures and in possessive constructions, I now turn to the discussion of marked sentence structures.

While the basic word order in clauses is predicate-initial, Dibabawon Manobo, like Kavalan, Atayal, and Central Cagayan Agta, also allows an alternate sentence pattern in which a topic, usually a noun phrase, or a locative or a temporal phrase, precedes the predicate. A topic is indicated by its prepredicate position (and intervening pause), as in (39)–(43). Like Central Cagayan Agta, there seems to be NO (obligatory or optional) topic linker occurring between a topic and the rest of the sentence in Dibabawon Manobo. Notice that when a nominative NP or a genitive NP is topicalized, the sentential topic is expressed by either a free form neutral pronoun or a full form nominative pronoun and the main clause can take a resumptive nominative pronoun that is coreferential with the topic, as in (41)–(42).

- (39) full noun phrase (personal noun phrase) as a topic:

si Samuk gayod no tag-idù, nakaponhik=on gayod diyà to kayu.
 NOM Samuk also LIG own.dog climbed=already also there TO tree
 ‘As for Samuk too, the owner of the dog, he also climbed a tree there.’ (MBD 3–017)

- (40) full noun phrase (nonpersonal noun phrase) as a topic:

sikan baow, madoyow, di madaas=dà og-agkap.
 that baow good but quickly=just lightweight
 ‘As for that *baow*, it is good, but it just becomes light quickly.’ (MBD 1–006)

- (41) free form neutral pronoun (with a personal noun phrase) as a topic:

kanami si Amoy, miglalabun=koy to humoy.
 IPE NOM Father weeding=NOM.IPE TO rice
 ‘As for father and me, we (ex.) were weeding rice.’ (MBD 3–019)

(42) full form nominative pronoun as a topic:

- a. *sikita*, *ogkaya=ki=d=on* to *mongo batik*, *sengewag....*
 NOM.ID hunt=NOM.ID=now=now TO PL trap pale
 ‘As for us (dl.), let’s go hunt with the spring trap and the sharpened stakes,....’
 (MBD 5–016)
- b. *si-akon* no *una* no *batà=din*, *nama-anan=ku* kan *pilimidu*
 NOM.IS LIG first LIG child=GEN.3S know.about=GEN.1S KAN first
 no *migdokot* *kandin* no *sakit*.
 LIG stick 3S LIG sickness.
 ‘As for me, his first child, I know about the original sickness that afflicted him.’
 (MBD 6–002)

(43) full noun phrase (temporal expression) as a topic:

- nokani no timpu Ispanyul pad*, *wadà mig-angkon* *kun*
 formerly LIG time Spanish yet NEG.EXIST claim REPORT.SP
 to *pasak*.
 TO land
 ‘Formerly while it was yet Spanish times, there was none who claimed land,
 they said.’ (MBD 2–001)

7.2.5 Summary

Let me summarize the discussion of Dibabawon Manobo word order in the previous sections.

First, Dibabawon Manobo is basically a right-branching, predicate-initial language.

Second, main predicates (verbal or nonverbal; auxiliary or nonauxiliary) exhibit the following features: (a) they occur clause initially; (b) they attract clitic pronouns.

Third, clitic pronouns differ from free form pronouns (as well as full NPs) in their syntactic distribution. In verbal clauses headed by an auxiliary verb, clitic pronouns occur IMMEDIATELY AFTER the AUXILIARY in the clause, whereas free form pronouns (as well as full NPs) occur after (but NOT NECESSARILY immediately after) the LEXICAL VERB.

Fourth, in clauses that involve (at least) two full noun phrases, an agentive full noun phrase must precede a nonagentive full noun phrase, regardless of their grammatical relations.

Fifth, in clauses that involve one pronominal clitic and one full noun phrase (or demonstrative pronoun), the pronominal clitic always precedes the full noun phrase (or demonstrative pronoun).

Sixth, the order of pronominals in Dibabawon Manobo is conditioned by the interaction of the following rules.

- Rule 1: Clitic pronouns always precede free form pronouns [CLITIC > NONCLITIC].
- Rule 2a: Nominative pronouns precede genitive pronouns [NOMINATIVE > GENITIVE].
- Rule 2b: First person pronouns precede second person pronouns and third person pronouns; second person pronouns precede third person pronouns [1 > 2 > 3].
- Rule 3a: If a nominative pronoun is LOWER than a genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then ONLY the NOMINATIVE pronominal clitic is used.
- Rule 3b: If a nominative pronoun is LOWER than a genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then substitute the nominative pronominal clitic with a free form pronoun. That is, use a genitive pronoun and a free form pronoun.

7.3 CONSTRUCTION MARKERS, CASE-MARKING SYSTEM, AND AGREEMENT SYSTEM

In this section, I discuss construction markers and the case-marking system in Dibabawon Manobo. Section 7.3.1 discusses the syntactic distribution of the ligature. Section 7.3.2 deals with the Dibabawon Manobo pronominal system.

7.3.1 Construction Markers

Like Kavalan, Squaliq Atayal, Central Cagayan Agta, and many other western Austronesian languages, Dibabawon Manobo also has a form that can be identified as a “ligature”, and also a class of forms that are the equivalents of so-called “determiners” in other western Austronesian languages. Like Central Cagayan Agta, in a topicalized construction, Dibabawon Manobo does NOT seem to use any element, that is, a topic linker, to link a topicalized NP with the rest of the sentence.

7.3.1.1 Ligatures

The first type of construction marker to be introduced is ligatures.

Like Kavalan, Squaliq Atayal, Central Cagayan Agta, and many other western Austronesian languages, Dibabawon Manobo also makes use of a special type of construction marker, commonly referred to as a “ligature” or “linker”, to link a head (usually a noun or a verb) with its following attribute (e.g., a noun, a possessor, a relative clause, or a complement clause). As already discussed in Chapters 4 and 5, the

categorical status of “ligatures” is not uncontroversial (see Chapter 5, section 5.3.1.2 for discussion).

In Dibabawon Manobo, one ligature, *no*, is found. Like ligatures in other western Austronesian languages, the form *no* is used to link a head with its dependent, as in (44)–(49). As shown in (44)–(47), the form *no* can be used to link a head noun (e.g., a demonstrative, a quantifier, a numeral, etc.) with its dependent noun or relative clause. Moreover, the form *no* can also be used to link a head verb (an auxiliary verb) with its dependent verb or complement clause, as in (48)–(49).

(44) *no* links a head noun (a demonstrative) with a dependent noun:

su wadà man mig-abin *sikan* *no* *pasak*.
because NEG.EXIST really claim that LIG land

‘Because no one claimed that land.’ (MBD 2–007)

(45) *no* links a head noun (a quantifier) with a dependent noun:

su *tanan* *no* *otow*, pasak=dà to pinangita.
because all LIG person land=just TO searched

‘Because all the people, land is what they were looking for.’ (MBD 2–011)

(46) *no* links a head noun (a numeral) with a dependent noun:

tibò moy palidok, sikan *daduwa* *no* *ka-otow*.
both EXIST spear that two LIG people

‘Both had a spear, the two men.’ (MBD 2–019)

(47) *no* links a head noun with a dependent relative clause:

sikan lasù-lasù, kan iyan kan *ogpakaluglug* du-on
that peg KAN it.is KAN fit.into there

kan *lugi* *no* *wadà* *oglagbas*.
KAN hole LIG NEG penetrate

‘As for that peg, that is what fits into the hole that does not go all the way through.’ (MBD 1–019)

(48) *no* links a head (an auxiliary verb) with a complement clause:

nokoy man no batà, ando-i=ka man i-anak, *konà no*
 what really LIG child where=NOM.2S really offspring NEG LIG

dini to Makgum.

here TO Makgum

‘Why, boy, where were you (sg.) born if not here in Makgum?’ (MBD 4–011)

(49) *no* links a head (a degree auxiliary verb) with a dependent (a lexical verb):

nawà no una no pagbu-us ni Amoy kanak, *lagboy no*
 as.for LIG first LIG escort GEN Father 1S very LIG

naliyag=a su na-intobo-ot=ku to modyow ko og-iskuyla=ki.
 pleased=NOM.1S because supposed=GEN.1S to good if school=NOM.1D

‘As for the first time Father escorted me, I was very pleased because I supposed it would be great if we (dl.) would go to school.’ (MBD 4–001)

7.3.1.2 Case-marking system for full nouns

The second type of construction marker to be introduced is prenominal elements that are equivalents of so-called case-marking “determiners” in other western Austronesian languages.

Full noun phrases in Dibabawon Manobo do NOT exhibit formal differences to reflect their grammatical functions. Their grammatical functions are manifested by word order and/or a class of prenominal monosyllabic forms.

In previous analyses of the Dibabawon Manobo case-marking system for full nouns, Dibabawon Manobo is commonly described as having a system similar to the one in table 7.1 (based on Forster 1964:36, 46).

TABLE 7.1 PREVIOUS ANALYSES OF DIBABAWON MANOBO CASE-MARKING SYSTEM

	NOMINATIVE	GENITIVE	LOCATIVE
NONPERSONAL	te (to)/kan??	te (to)??	te (to)??
PERSONAL	si	ni	ki

As shown in table 7.1, personal nouns are case-marked by prenominal elements (such as *si*, *ni*, and *ki*); however, nonpersonal nouns are not. The grammatical functions of nonpersonal nouns are mainly manifested by word order.⁷ Based on table 7.1, it seems to suggest that Dibabawon Manobo does not distinguish plurality in its nominal case-marking system. However, a thorough examination of the textual data suggests that personal nouns do distinguish plurality. That is, the forms *si*, *ni*, and *ki* are used to introduce singular personal nouns. As for plurality of personal nouns (personal nouns plus his/her associates), they are introduced by *osi*, *oni*, and *ongki*.

In what follows, I will discuss the syntactic distribution of prenominal elements and discuss their categorial status.

7.3.1.2.1 *kan*: Determiner or auxiliary noun??

Two monosyllabic forms, *kan* and *to*, are commonly found preceding nonpersonal nouns. Superficially, they look like some kind of case-marking determiners in that they occur at the outer edge of noun phrases. However, a careful examination of their distribution in textual data suggests that they are “AUXILIARY NOUNS” that carry the

⁷ Forster (1964:46, note 15) comments that “nonpersonal nominal phrases in Dibabawon do not have distributional distinction parallel to the personal nominal”. She also comments that “*te* is noncontrastively used to introduce a topic tagmeme when that tagmeme is manifested by a nonpersonal nominal phrase, whereas *si* unambiguously introduces a topic tagmeme filled by a personal nominal phrase.” (Forster 1964:48, note 19)

feature [+extension], that is, nouns that require a dependent predicate or relative clause.⁸

In this section, I discuss the syntactic functions and categorical status of the form *kan*. As for the functions and categorical status of *to*, it will be discussed in 7.3.1.2.2.

Before we decide the categorical status of *kan*, let us first consider their syntactic distribution.

First, *kan* can introduce the sole argument of a monadic intransitive clause, as in (50).

Second, *kan* can introduce a nonagentive (a location) phrase of a dyadic *-on* clause, dyadic *-an* clause, or dyadic *i-* clause, as in (50).

(50) *kan* introduces a nonagentive (a location) phrase of a dyadic *-an* clause; *kan* introduces the sole argument (a possessive noun phrase) of a monadic *-um-/og-* clause:

mano *pig-agawan kan pasak=din, nigsupra kan kandin kabuut*,...
 since snatched.from KAN land=GEN.3S increased KAN 3S bravery

‘Since his land had been grabbed from him, his courage became excessive,....’
 (MBD 2–015)

Third, *kan* can introduce the nonpredicate nominal (an absolute possessive) of a nominal clause, as in (51).

(51) *kan* introduces the nonpredicate nominal (an absolute possessive) of a nominal clause:

sikan=on *kan kanay!*
 that=now KAN IS

‘That one will be mine.’ (MBD 9–138)

Fourth, *kan* can introduce an adjunct location phrase, as in (52).

⁸ Please refer to Reid (2002b) for detailed discussion of prenominal elements in other Philippine languages.

(52) *kan* introduces an adjunct location phrase:

ko nasokò=ka, ogtatagbu=ki du-on *kan* lindiru=ta ko mabuut=ka
 if angry=NOM.2S meet=NOM.1D there KAN boundary=GEN.1D if brave=NOM.2S
 ‘If you (sg.) are angry, we (dl.) will meet there at our (dl.) boundary, if you (sg.)
 are courageous.’ (MBD 2–014)

The fact that the elements introduced by *kan* in (50)–(52) are all clearly nouns might suggest that these forms are DETERMINERS in that they occur at the outside edge of a noun phrase and might be interpreted as dependents of head nouns. However, a thorough examination of Dibabawon Manobo texts points out that sometimes the elements introduced by *kan* are UNLIKELY to be considered as NOUNS. Let us examine the elements that introduced by *kan* in examples (53)–(56).

In (53), the element that immediately follows *kan* carries affixation (the formative *nig-* is often assumed to be “verbal affix”) that identifies it as a verb. That is, in this case, *kan* introduces a verbal clause headed by a lexical verb. This example might not be a big problem for the “determiner” analysis because one can assume that the form *nig-agow*, is actually a zero-derived deverbal NOMINALIZATION, similar to the effect of *-er* nominalization in English, hence it might actually mean ‘the one who snatched’ in this example. Alternatively, one could assume that this form is a verb, as it appears to be, but is the predicate of a headless relative clause, so that, in effect, the noun phrase in which it appears is—on the surface at least—headless (see Kroeger 1998:2, 11).

The “nominalization” account might sound reasonable for sentences like the one in (53). However, it might not be applicable to sentences like the ones in (54)–(56). In (54), the element immediately following *kan* is an existential verb. In (55), the element immediately following *kan* is a temporal auxiliary verb. Although it might be possible to

consider lexical verbs as “zero-derived deverbal nominalizations” when they follow a supposed determiner, it is UNLIKELY that existential verbs and auxiliary verbs are nominalizations. The existence of sentences like examples (54)–(55) makes the “determiner” analysis particularly hard to sustain.

An even more problematic case for the “determiner” analysis is found in patterns like the one in example (56). In (56), the element immediately follows *kan* is a relative clause introduced by a ligature. As already discussed in section 7.3.1.1, the element immediately preceding the ligature is typically a head noun or a head verb. The fact that *kan* can be immediately followed by a relative clause introduced by a ligature strongly suggests that it is NOT a determiner, but a noun.

(53) *kan* followed by a clause headed by a lexical verb:

pag-ugtu to sogá, nigtagbu=on gayod kan nig-agow to pasak.
 noon TO sun met=already also KAN snatched TO land

‘When the sun was overheated, the one who had grabbed (the) land also joined him.’ (MBD 2–018)

(54) *kan* followed by a clause headed by an existential verb:

wadà kakalabusu sikan nakamatoy su sayop=din man,
 NEG imprison that killed because fault=GEN.3S really
kan moydu-on=dà man kandin pasak, migiagow pad
 KAN EXIST=just really 3S land snatched yet
kan moy=on tog-iyag.
 KAN EXIST=already owner

‘The one who had to kill was not put in prison because it was the other one’s fault; the one who had his own land, he had still grabbed that which already had an owner.’ (MBD 2–023)

(55) *kan* followed by a clause headed by a temporal auxiliary verb:

sikan **kan kadoog**=noy ogbantayan ko ogpanguma=koy.
 that KAN always=GEN.1PE watch when farm=NOM.1PE

‘That is what we (ex.) always watch for when we (ex.) make a farm’ (MBD 4–003)

(56) *kan* immediately followed by a relative clause introduced by a ligature:

konà=ka ogtalis **kan no uras**.
 NEG=NOM.2S fail KAN LIG hour

‘Don’t fail to show up at that time.’ (MBD 2–016)

7.3.1.2.2 *to*: Determiner or auxiliary noun??

Now, let us consider the categorical status of the form *to*. Before deciding its categorical status, let us first consider its syntactic distribution.

First, *to* can introduce the possessor in a possessive construction, as in (57).

(57) *to* introduces the possessor in a possessive construction:

...dugmà to pigtamuk=on man to panganup to atuk=on
 charge TO caught=now really TO spear TO happen=now

man ma-igù du-on to uu **to babuy**.
 really strike there TO head TO pig

‘...it charged, intercepting the spear which happened to strike directly on the head of the pig.’ (MBD 3–028)

Second, *to* can introduce the agentive phrase of a dyadic *-on* clause, dyadic *-an* clause, or dyadic *i-* clause, as in (58)–(60).

(58) *to* introduces the agentive noun phrase of a dyadic *-on* clause:

...pigkita=on **to idù** kan sangkodan no babuy no
 spotted=now TO dog KAN enormous LIG pig LIG

angod=on to nanangà to taklubù.
 like=now TO carry.in.mouth TO bracelet

‘...the dog sighted an enormous pig that looked as if it were carrying pearl bracelets in its mouth.’ (MBD 3–010)

(59) *to* introduces the agentive noun phrase of a dyadic *-an* clause:

...su *pi*gbanganan=ki *to* **mongo** **Ata no katlu-an no ka-otow.**
 because ambushed=NOM.ID TO PL Ata LIG thirty LIG person

‘...because thirty Atas are lying in wait for us (dl.)’ (MBD 8–055)

(60) *to* introduces the agent noun phrase of a dyadic *i-* clause:

...su *in*-ampù=a=d *to* **mongo sakup ni Jesus dini**
 because prayed.for=NOM.IS=already TO PL subject GEN Jesus here

to Nasuli....
 TO Nasuli

‘...because the subjects of Jesus at Nasuli had prayed for me....’ (MBD 11–004)

The distribution of the form *to* in examples (57)–(60) makes them look like a genitive case marker. However, the following examples suggest that *to* does not have a case-marking function.

Third, *to* can introduce the sole argument of a monadic *-um-/og-* clause, as in (61).

(61) *to* introduces the sole argument of a monadic *-um-/og-* clause:

...aw tinakin *to* *niglonà* *to* **bantoy=din.**
 and same.time entered TO guard=GEN.3S

‘...and at the same time her familiar spirit entered.’ (MBD 10–017)

Fourth, *to* can introduce the indefinite theme phrase of a dyadic *-um-/og-* clause, as in (62).

(62) *to* introduces the indefinite theme phrase of a dyadic *-um-/og-* clause:

...makaka-on=koy *to* **humoy.**
 eat=NOM.IPE TO rice

‘...we (ex.) would be able to eat rice.’ (MBD 4–008)

Fifth, *to* can introduce the definite theme phrase of a dyadic *-on* clause, dyadic *-an* clause, or dyadic *i-* clause, as in (63).

(63) *to* introduces the definite theme phrase of a dyadic *-on* clause:

...dayun=dan *pigtigbas to pisi* di *na-uug si* Bagaram.
 then=GEN.3P slashed TO string and fell NOM Bagaram

‘...they immediately slashed the cord and Bagaram fell.’ (MBD 9–142)

Sixth, *to* can introduce a temporal phrase, as in (64).

(64) *to* introduces a temporal phrase:

...su si Amoy, *nakadudumuk to solod to tatou no minutus*
 because NOM Father bowed TO space TO three LIG minute

kayan pad *nakalinggoka...*
 before yet looked.up

‘...because as for Father, he bowed his head for about three minutes before he could look up....’ (MBD 10–009)

Seventh, *to* can introduce a locative expression, as in (65) and (66).

(65) *to* introduces a locative expression (a place name):

asta pad tibò so-i mongo *duma=ku kani to Magsumpow,*
 and yet all this PL companion=GEN.IS here TO Magsompao

tibò=koy=on *nabuhì so-i no galingan.*
 all=NOM.1PE=already/now live this LIG corn.mill

‘And besides, all these my companions here in Magsompao, this corn mill supports all of us (ex.).’ (MBD 1–027)

(66) *to* introduces a locative expression (a common location noun phrase):

pigtiyuk=dan to bagon no pigbausan...
 strung.on=GEN.3P TO rattan LIG scraped

‘They strung it on rattan that had been scraped....’ (MBD 3–033)

Eighth, *to* can introduce a goal phrase, as in (67).

(67) *to* introduces a goal phrase:

dayun to *pigbaba=dan=on diyà to baoy* aw *sisinadabi=dan.*
 then TO packed=GEN.3P=now there TO house and singed=GEN.3P

‘Then they packed it on their backs to the house and they singed it.’ (MBD 3–031)

The fact that the elements introduced by *to* in (57)–(67) are all clearly nouns might suggest that these forms are DETERMINERS in that they occur at the outer edge of a noun phrase and might be interpreted as dependents of head nouns. However, a thorough examination of Dibabawon Manobo texts points out that sometimes the elements introduced by *to* are UNLIKELY to be considered as NOUNS. Let us examine the elements that are introduced by *to* in examples (68)–(70).

In (68), the element that immediately follows *to* carries affixation (the formative *ig-* is often assumed to be “verbal affix”) that identifies it as a verb. That is, in this case, *to* introduces a verbal clause headed by a lexical verb. One might assume that the form *igbayà*, is actually a zero-derived deverbal NOMINALIZATION, hence it might actually mean ‘passage’ in this example. Alternatively, one could assume that this form is a verb, as it appears to be, but is the predicate of a headless relative clause, so that, in effect, the noun phrase in which it appears is—on the surface at least—headless (see Kroeger 1998:2, 11).

Although the “nominalization” account might sound reasonable for sentences like the one in (68), it might not be applicable to sentences like the ones in (69)–(70). In (69), the element immediately following *to* is an existential verb. In (70), the element immediately following *to* is a negative auxiliary verb. Although it might be possible to consider lexical verbs as “zero-derived deverbal nominalizations” when they follow a supposed determiner, it is UNLIKELY that existential verbs and auxiliary verbs are nominalizations. The existence of sentences like examples (69)–(70) makes the “auxiliary noun” analysis more favorable than the “determiner” analysis.

(68) *to* followed by a clause headed by a lexical verb:

sikan *oglagbas* no lugì, sikan *to igbayà* to batad.
 that penetrate LIG hole that TO pass TO corn

‘The hole that goes through, that is the way the corn passes.’ (MBD 1–016)

(69) *to* followed by a clause headed by an existential verb:

...su *migdinog* man kandan *to moydu-on* galingan kani.
 because hear really NOM.3P TO EXIST corn.mill here

‘...because they have heard that there is a corn mill here.’ (MBD 1–028)

(70) *to* followed by a clause headed by a negative auxiliary verb:

asta iyan *ig-udlin=ku* iyu *to konà=kow* *ogpandugukduguk* ko
 and it.is advice=GEN.1S 2P TO NEG=NOM.2P approach if
moydu-on *ogpatutuus* su agad pad buwa mabogbog no bantoy...
 EXIST CAUS.immortal because even yet maybe strong LIG guard

‘And what my advice to you (pl.) is, is that you (pl.) are not to go near if there is one who would give immortality, because even if it is a powerful spirit....’
 (MBD 10–022)

The fact that *kan* and *to* might be “auxiliary nouns” rather than “determiners” poses the question as to whether all other monosyllabic prenominal elements in Dibabawon Manobo might also be “auxiliary nouns”.

7.3.1.2.3 *si* and *osi*: Nominative Determiners or auxiliary nouns??

Two forms, *si* and *osi*, can be identified as nominative case markers in Dibabawon Manobo. Although the status of these two forms as “determiners” might be questionable, their status as some kind of “case-marking” elements is justifiable. In the Dibabawon Manobo textual data that I examined, there is no single instance of *si* or *osi* (or other elements that introduced a personal noun) that is followed by an element that is unlikely to be a noun. Therefore, I will not discuss the categorical status of these two forms here.

For convenience, I refer to *si* and *osi* as nominative case markers. The form *si* is a nominative case-marker for singular personal nouns (including kinship terms), and the form *osi* is a nominative case-marker for plural personal nouns (i.e., a personal noun and his/her associate(s)). The forms *si* and *osi* can be associated with a number of syntactic distributions.

First, they can be used to introduce the sole argument of a monadic *-um-/og-* clause, as in (71).

(71) *si* introduces the sole argument of a monadic *-um-/og-* clause:

pagkautù to *linagà*, *migko-on* ***si*** **Samuk...**
 cook TO boiled ate NOM Samuk

‘After what was boiled was cooked, Samuk ate....’ (MBD 3–008)

Second, they can introduce the nonagentive argument (e.g., theme, location, benefactive, etc.) of a dyadic *-on* clause, a dyadic *-an* clause, or a dyadic *i-* clause, as in (72)–(76).

(72) *si* introduces the (totally affected) theme argument of a dyadic *-on* clause:

og-a-agawon=dan ***si*** **Gononglida.**
 snatched=GEN.3P NOM Gononglida

‘They both made a grab for Gononglida.’ (MBD 9–139)

(73) *si* introduces the nonagentive argument (a location) of a dyadic *-an* clause:

pignangonan=ku ***si*** **Laureano** to *niggawang=on* to *bantoy dini kanay.*
 reported.to=GEN.1S NOM Laureano TO departed=now TO guard here 1S

‘I told Laureano that the spirit had gone away from me.’ (MBD 11–011)

(74) *si* introduces the nonagentive argument (a benefactive) of a dyadic *-an* clause:

...awos *ogpa-ampu-an=dan* ***si*** **Laureano** no *moydu-on* sakit.
 so.that CAUS.pray.for=GEN.3P NOM Laureano LIG EXIST sickness

‘...so that they will pray for Laureano, who was sick.’ (MBD 11–006)

- (75) *osi* introduces the nonagentive argument (a personal noun and his/her associates) of a dyadic *-an* clause:

di iyan nandà *nalimuutan=ku* *osi* **Edu asta asawa=din**
 but it.is only concerned=GEN.IS NOM.PL Fred and wife=GEN.3S
aw si Anakon no *pigdumahan=noy* kan no panow.
 and NOM Niece LIG accompanied=GEN.IPE KAN LIG trip

‘But then what I was concerned about was Fred and his wife and Niece whom we (ex.) had accompanied on that trip.’ (MBD 6–026)

- (76) *si* introduces the nonagentive argument (a personal noun) of a dyadic *i-* clause:

...kaling di *in-uli=noy=dà* si Amoy.
 therefore returned.with=GEN.IPE=just NOM Father

‘...therefore, we (ex.) just brought Father back home.’ (MBD 6–122)

Third, they can introduce the predicate nominal of a nominal clause, as in (77).

- (77) *si* introduces the predicate nominal of a nominal clause:

natodu-on *si Samuk* dà kan *migbuhì* to idù
 before NOM Samuk just KAN raised TO dog
 no *pighingadanan* ki Ligkod no tumawan.
 LIG named LCV Ligkod LIG hunting.dog

‘Previously Samuk was the only one who raised a dog, which was named Ligkod, a hunting dog.’ (MBD 3–003)

Fourth, they can introduce the nonpredicate nominal of a nominal clause, as in (78).

- (78) *si* introduces the nonpredicate nominal of a nominal clause:

ton buyag no iyan ngadan *si Si-ay* no *pig-abut* gayod to bantoy
 TON woman LIG it.is name NOM Si-ay LIG arrived also TO guard
 no mabogbog, *nig-ugpà* kandin dini to Abun-abun no banwa.
 LIG strong resided 3S here TO Abun-abun LIG place

‘The woman whose name was Si-ay, who had a powerful familiar spirit, lived here in Abun-abun.’ (MBD 10–001)

Fifth, they can introduce a topic in a topicalized construction, as in (79)

(79) *si* introduces a topic:

<i>si</i>	Samuk,	<i>nigbuhì</i>	ki	Ligkod	no	tumawan
NOM	Samuk	raise	LCV	Ligkod	LIG	hunting.dog
	<i>di</i>	<i>ogkahadok</i>	to	babuy.		
	but	fear	TO	pig		

‘As for Samuk, he raised Ligkod, which is a hunting dog, but it was afraid of pigs.’ (MBD 3–004)

7.3.1.2.4 *ni* and *oni*: Genitive determiners or auxiliary nouns??

Two forms, *ni* and *oni*, can be identified as genitive case markers in Dibabawon Manobo. Although the status of these two forms as “determiners” might be questionable, their status as some kind of “case-marking” elements is justifiable. In the Dibabawon Manobo textual data that I examined, there is no single instance of *ni* or *oni* that is followed by an element that is unlikely to be a noun. Therefore, I will not discuss the categorical status of these two forms here. For convenience, I refer to *ni* and *oni* as genitive case markers. The form *ni* is a genitive case-marker for singular personal nouns (including kinship terms), and the form *oni* is a genitive case-marker for plural personal nouns (i.e., a personal noun and his/her associate(s)). The forms *ni* and *oni* can be associated with the following syntactic functions.

First, they can introduce a possessor of a possessive construction, as in (80)–(82).

(80) *ni* introduces a possessor (a personal noun) of a possessive construction:

...kan	bantoy	no	<i>niglonà</i>	diyà	to	inoy	<i>ni</i>	Laureano.
KAN	guard	LIG	enter	there	TO	mother	GEN	Laureano

‘...the familiar spirit that used to enter Laureano’s mother.’ (MBD 11–008)

- (81) *oni* introduces a plural personal (a personal noun and his/her associates) possessor of a possessive construction:

na skian Utù iyan sabut **oni** **Anakon** aw si **Mr. Bill**
 now that Utù it.is agreement GEN.PL Niece and NOM Mr. Bill
 to *ogilupugon=dà* ni Mr. Bill no paylut to ariplanu no
 TO pursue=only GEN Mr. Bill LIG pilot TO airplane LIG
 kanami *pigsakayan*
 IPE rode.in

‘Now, Utù, that was the agreement of Niece and Mr. Bill, that Mr. Bill who was the pilot of the plane we (ex.) had ridden in would go after them.’ (MBD 6–031)

- (82) *ni* introduces a possessor (a personal noun) of a possessive construction; *ni* introduces the agent (a personal noun) of a dyadic *-on* clause:

pagkadoyow=noy=on to asawa **ni** **Edu**, *pigdaa=koy=on*
 good=GEN.IPE=now TO wife GEN Fred carried=NOM.IPE=now
 mandà **ni** **Anakon** diyà to Nasuli no *pig-ugpa-an=dan*.
 again GEN Niece there TO Nasuli LIG resided=GEN.3P

‘When we (ex.), Fred’s wife and me, were already well, Niece took us (ex.) back to Nasuli where they lived.’ (MBD 6–062)

Second, they can introduce the agent of a dyadic *-on* clause, a dyadic *-an* clause, or a dyadic *i-* clause, as in (82)–(86).

- (83) *ni* introduces the agent (a personal noun and his/her associates) of a dyadic *-on* clause:

...no langguyon=koy **oni** **Anakon** diyà ki Mr. Cottle
 when escorted=NOM.IPE GEN.PL Niece there LCV Mr. Cottle
 no *migburdi*...
 LIG birthday

‘...when Nieces escorted us (ex.) to Mr. Cottle’s who was having a birthday party.’ (MBD 6–042)

- (84) *ni* introduces the agent (a kinship term) of a dyadic *-an* clause:

dayun to *pig-abisuhan=koy* **ni** **Amoy**.
 then TO advised.to=NOM.IPE GEN Father

‘Then Father advised us (ex.) of his plan.’ (MBD 6–088)

- (85) *oni* introduces the agent (a personal noun and his/her associates) of a dyadic *-an* clause:

migdinog=koy=on to tanug to ariplanu no *pigsakayan*
 heard=NOM.1PE=now TO sound TO airplane LIG rode.in

oni **Anakon** **aw** **si** **Edu** **asta** **asawa=din.**
 GEN.PL Niece and NOM Fred and wife=GEN.3S

‘We (ex.) heard the sound of the airplane that Niece and Fred and his wife were riding in.’ (MBD 6–028)

- (86) *ni* introduces the agent (a kinship term) of a dyadic *i-* clause:

dayun to *intu-us=a* ***ni*** **Amoy** du-on to ampu-an.
 then TO concealed=NOM.1S GEN Father there TO pray.place

‘Then father concealed me in the shelter for the altar.’ (MBD 3–021)

7.3.1.2.5 *ki* and *ongki*: Oblique determiners or auxiliary nouns??

Two forms, *ki* and *ongki*, can be identified as oblique case markers in Dibabawon Manobo. Although the status of these two forms as “determiners” might be questionable, their status as some kind of “case-marking” elements is justifiable. In the Dibabawon Manobo textual data that I examined, there is no single instance of *ki* or *ongki* that is followed by an element that is unlikely to be a noun. Therefore, I will not discuss the categorical status of these two forms here. For convenience, I refer to *ki* and *ongki* as oblique case markers. The form *ki* is an oblique case-marker for singular personal nouns (including kinship terms), and the form *ongki* is an oblique case-marker for plural personal nouns (i.e., a personal noun and his/her associate(s)). The forms *ki* and *ongki* can be associated with a wide range of syntactic functions.

First, they can introduce a personal location noun, as in (87).

(87) *ki* introduces a personal location noun:

dayun to *mig-abut=koy=on* diyà *ki Amoy*.
 Then TO arrived=NOM.1PE=now/already there LCV Father

‘Then we (ex.) arrived at Father’s.’ (MBD 6–143)

Second, they can introduce a comitative phrase, as in (88).

(88) *ki* introduces a personal comitative phrase:

...su *ogpanganup=a ki Ligkod* diyà to Kambautu no pasak.
 because hunt=NOM.IS LCV Ligkod there TO Kambautu LIG land

‘...because I will hunt with Ligkod in Kambautu.’ (MBD 3–005)

Third, they can introduce a source phrase, as in (89).

(89) *ongki* introduces a plural personal (a personal name and his/her associates) source phrase:

...to sikita *og-utang=ki du-on ongki Maam*,...
 TO TOP.1D credit=NOM.1D there OBL.PL Ma’am

‘...as for us (dl.), we (dl.) will get credit from Ma’am...’ (MBD 3–116)

Fourth, they can introduce a reason phrase, as in (90).

(90) *ki* introduces a reason phrase:

lagboy=a=d *nasampot ki Amoy aw ki Inoy*, asta
 very=NOM.IS=now lonely OBL Father and OBL Mother and

banwa=ku *gayod no Abun-abun, tibò=ku ogkasampotan*.
 place=GEN.IS also LIG Abun-abun all=GEN.IS lonely.for

‘I was very lonely for Father and Mother and also my place of Abun-abun; for all of them I was lonely.’ (MBD 4–006)

Fifth, they can introduce a (less or nonaffected) theme phrase of a dyadic *-um-/og-* clause, as in (91)–(92).

- (91) *ki* introduces a (less or nonaffected) personal theme phrase of a dyadic *-um-/og-* clause:

pagka-ubus=ku to migko-on kan manatad, mig-usip=a ki Amoy....
 finish=GEN.1S TO ate KAN dove asked=NOM.1S OBL Father

‘When I finished eating the dove, I asked Father....’ (MBD 4–045)

- (92) *ongki* introduces a (less or nonaffected) plural personal theme phrase (a personal noun and his/her associates) of a dyadic *-um-/og-* clause:

...migba-id=koy ongki Anakon to og-uli=koy=on diyà
 requested=NOM.1PE OBL.PL Niece TO return=NOM.1PE=now there

to Magsumpow....

to Magsompao

‘We (ex.) requested of Nieces that we (ex.) return to Magsompao....’

Based on the fact that *ki* or *ongki* can introduce not only locative expressions, but also the theme phrase of a dyadic *-um-/og-* clause, it seems more appropriate to refer to them as oblique (rather than as locative) case markers.

7.3.1.2.6 Summary

Let me summarize the discussion in this section.

At least two of the monosyllabic prenominal forms, *kan* and *to*, are considered to be “AUXILIARY NOUNS” rather than “determiners” in that they can introduce elements that are UNLIKELY to be nouns, such as negative auxiliaries, negative existential verbs, etc., and also *kan* can occur in a position typically occupied by a head.

Three types of case-markers can be distinguished in Dibabawon Manobo (nominative, genitive, and oblique), as illustrated in table 7.2. The grammatical functions of personal nouns are manifested by prenominal monosyllabic forms, but the grammatical functions of nonpersonal nouns are not. The plurality features of personal nouns can be

expressed by the prenominal monosyllabic forms: *si*, *ni*, and *ki* for singular, but *osi*, *oni*, and *ongki* for plural (i.e., a personal noun and his/her associates).

TABLE 7.2 DIBABAWON MANOBO CASE-MARKING SYSTEM

	NOMINATIVE	GENITIVE	OBLIQUE
NONPERSONAL	---	---	---
PERSONAL (SG.)	<i>si</i>	<i>ni</i>	<i>ki</i>
PERSONAL (PL.)	<i>osi</i>	<i>oni</i>	<i>ongki</i>

Nominative case markers, *si* and *osi*, can introduce the sole argument of a monadic intransitive clause. They can introduce the theme or nonagentive argument of a dyadic *-on* clause, a dyadic *-an* clause, or a dyadic *i-* clause. They can also introduce the predicate nominal and the nonpredicate nominal of a nominal clauses, and the topic of a topicalized construction.

Genitive case markers, *ni* and *oni*, can introduce a possessor in a possessive construction. They can introduce the agent argument of a dyadic *-on* clause, a dyadic *-an* clause, or a dyadic *i-* clause.

The oblique case markers, *ki* and *ongki*, can be used to introduce a location phrase, a source phrase, a comitative phrase, a reason phrase, and the less (or nonaffected) theme phrase of a dyadic *-um-/og-* clause.

7.3.2 The Dibabawon Manobo Personal Pronoun System

Unlike full noun phrases, most (but not all) personal pronouns in Central Cagayan Agta exhibit formal differences depending on their syntactic functions.

In previous analyses of the Dibabawon Manobo personal pronoun system, Dibabawon Manobo is commonly described as having a system similar to the one in table 7.3 (based on Barnard and Forster 1954:227; Forster 1964).

TABLE 7.3 PREVIOUS ANALYSES OF PERSONAL PRONOUNS IN DIBABAWON MANOBO

	CLITICS		FREE
	GENITIVE	NOMINATIVE	LOCATIVE
1S [+SPKR, -ADDR, -PLRL]	=ku	=?a	kanak
2S [-SPKR, +ADDR, -PLRL]	=nu	=ka	ikew
3S [-SPKR, -ADDR, -PLRL]	=din	---/=kandin	kandin
1D [+SPKR, +ADDR, -PLRL]	=ta	=ki	ita
1PI [+SPKR, +ADDR, +PLRL]	=tanew	=kinew	itanew
1PE [+SPKR, -ADDR, +PLRL]	=ney	=key	kanami
2P [-SPKR, +ADDR, +PLRL]	=new	=kew	iyu
3P [-SPKR, -ADDR, +PLRL]	=dan	=kandan	kandan

Like Central Cagayan Agta and many other Philippine languages, Dibabawon Manobo personal pronouns distinguish three persons (first, second, and third). As illustrated in table 7.3, first person pronouns distinguish three numbers: singular, dual, and plural. First person dual forms are used when both the speaker and the hearer are included. First person plural pronouns make a further distinction between inclusive and exclusive forms. The use of inclusive or exclusive forms is determined by whether the hearers are included. Inclusive forms are employed when hearers are included, otherwise exclusive forms are employed. Second person and third person pronouns distinguish two numbers (singular and plural).

As shown in table 7.3, Dibabawon Manobo is generally considered to have three formally distinct sets of personal pronouns: Nominative, Genitive, and Locative. Although, the existence of a fourth set of pronouns, full form Nominative pronouns, is

briefly mentioned in Forster (1964: 46, note 15), no actual forms of this set of pronouns is provided.⁹ In my textual analysis, I was able to find the occurrence of some of the full form Nominative pronouns. I will discuss the form and the function of the full form Nominative pronouns in section 7.3.2.4.

In this study, bound nominative pronouns and genitive pronouns are identified as pronominal clitics, which are indicated by the equal sign '='. Neutral pronouns (Barnard and Forster's (1954) "Locative pronouns") and full form Nominative pronouns are identified as free form pronouns.

7.3.2.1 Genitive pronouns

Genitive pronouns are the pronominal equivalents of *ni-/oni*-marked personal noun phrases. Like their corresponding *ni-/oni*-marked personal noun phrases, genitive pronouns can function as the attribute (i.e., the possessor) in a possessive construction, as in (93)–(94). Moreover, they can function as the agent of a dyadic *-on* clause, the agent of a dyadic *-an* clause, or the agent of a dyadic *i-* clause, as in (93) and (95)–(97).

- (93) genitive clitic pronoun as the theme argument (a personal noun) of a dyadic *-on* clause; genitive clitic pronoun as the possessor in a possessive construction:

...tataha=**din** si Ligkod no idù=**din** no tumawan.
 called=GEN.3S NOM Ligkod LIG dog=GEN.3S LIG hunting.dog

'...he called Ligkod, which is his dog, which is a hunting dog.' (MBD 3–009)

⁹ Forster (1964:46, note 15) comments that "There are three formally distinct sets of personal pronouns in Dibabawon Manobo.... A fourth set, represented by <siqak> 'I', is not complete in the dialect of Dibabawon which we have studied...." [*q* stands for glottal stop.]

- (94) genitive clitic pronoun as a possessor in a possessive construction:

migluya=on to lawa=ku.
 weak=already TO body=GEN.1S

‘My body was already weak.’ (MBD 6–081)

- (95) genitive clitic pronoun as the agent of a dyadic *-on* clause:

iyan man lagboy a-agawon=dan si Gononglida su iyan man
 it.is really very grabbing=GEN.3P NOM Gononglida because it.is really
lagboy madoyow.
 very good

‘The one they kept grabbing for was Gononglida because she was very beautiful.’ (MBD 9–148)

- (96) genitive clitic pronoun as the agent of a dyadic *-an* clause:

pigpabaya-an=dan=on si Bagaram miglanguylanguy to dagat.
 CAUS.passed.over=GEN.3P=now NOM Bagaram was.swimming TO sea

‘They went right past Bagaram swimming around in the sea.’ (MBD 9–144)

- (97) genitive clitic pronoun as the agent of a dyadic *i-* clause:

...ipakasal=ta usab kandan ki Intantiyaya aw si Rasagadang.
 CAUS.marry=GEN.1D also 3P OBL Intantiyaya and NOM Rasagadang

‘...we (dl.) will let them marry Intantiyaya and Rasagadang.’ (MBD 9–154)

7.3.2.2 Nominative clitic pronouns

Nominative clitic pronouns have three different distributions. First, they can be used as the sole argument of a monadic clause, as in (98). Second, they can be used as the agent of a dyadic *-um-/og-*, or *maN-* clause, as in (99). Third, they can be used as the nonagentive noun phrase of a dyadic *-on* clause, a dyadic *-an* clause, or a dyadic *i-* clause, as in (100)–(103).

(98) nominative clitic pronoun as the sole argument of a monadic *-um-/og-* clause:

- a. ...*mig-abut=koy=on* du-on to Sàsà.
arrived=NOM.1PE=now there TO Sàsà

‘...when we (ex.) arrived at Sàsà.’ (MBD 6–068)

- b. *umahà=a=d* iyan no sikan=on, *pigkilaa=ku* kan
looked=NOM.1S=now it.is LIG that=now recognized=GEN.1S KAN

pigsakayan=noy no ariplanu.
rode=GEN.1PE LIG airplane

‘As I looked; that’s what it was; I recognized the plane we (ex.) had ridden in.’
(MBD 6–038)

(99) nominative clitic pronoun as the agent of a monadic *-um-/og-* clause:

pag-abut=ku diyà *nigpudut=a=d* to salidingan no pada
arrive=GEN.1S there got=NOM.1S=now TO decoration LIG for

oggamiton ko *oglonà=on* to bantoy.
use when enter=now TO guard

‘When I arrived, where I got decoration (shredded leaves) to be used when the familiar spirit would come.’ (MBD 6–163)

(100) nominative clitic pronoun as the theme phrase of a dyadic *-on* clause:

...no *langguyon=koy* oni Anakon diyà ki Mr. Cottle
when escorted=NOM.1PE GEN.PL Niece there OBL Mr. Cottle

no *migburdi*....
LIG birthday

‘...when Nieces escorted us (ex.) to Mr. Cottle’s who was having a birthday party.’ (MBD 6–042)

(101) nominative clitic pronoun as the nonagentive phrase (a location) of a dyadic *-an* clause:

pigtabangan=koy=nu su pada podom ma-uli-an si Amoy
helped.to=NOM.1PE=GEN.2S so that fain recover NOM Father

kan no sakit=din
KAN LIG sickness=GEN.3S

‘You (sg.) helped us (ex.) out in order that hopefully Father could recover from that sickness of his.’ (MBD 6–119)

(102) nominative clitic pronoun as the nonagentive phrase (a beneficiary) of a dyadic *-an* clause:

dayun.to *pig-andinihan=a* ni Inoy.
 then came.here.for=NOM.1S GEN Mother

‘So then Mother came here for me.’ (MBD 6–0136)

(103) nominative clitic pronoun as the nonagentive phrase of a dyadic *i-* clause:

dayun to *intu-us=a* ni Amoy du-on to ampu-an.
 then TO concealed=NOM.1S GEN Father there TO pray.place

‘Then father concealed me in the shelter for the altar.’ (MBD 3–021)

In previous analyses of Dibabawon Manobo personal pronouns, the third person singular nominative clitic pronoun is considered to be either phonologically null or have the form =*kandin*, and the third personal plural nominative clitic pronoun is considered to have the form =*kandan*. However, my textual analysis suggests that the third person singular nominative pronoun is either phonologically null or has the form =*din* (rather than =*kandin*), and the third person plural nominative pronoun is either phonologically null or has the form =*dan* (rather than =*kandan*).

In what follows, I provide evidence to support the claim that the forms =*din* ‘GEN/NOM.3S’ and =*dan* ‘GEN/NOM.3P’ can function not only as genitive clitic pronouns, but also as nominative clitic pronouns. Moreover, I demonstrate that the forms *kandin* ‘3S’ and *kandan* ‘3P’ are free form pronouns rather than clitic pronouns.

Let us consider evidence that supports the claim that the forms =*din* ‘GEN/NOM.3S’ and =*dan* ‘GEN/NOM.3P’ can function not only as genitive clitic pronouns, but also as nominative clitic pronouns. The status of the forms =*din* ‘GEN/NOM.3S’ and =*dan* ‘GEN/NOM.3P’ as genitive clitic pronouns is also discussed in most of the previous

analyses. I will not repeat the discussion here. However, their status as nominative pronominal clitics is never considered in the literature, it requires some justification.

The distribution of the forms *=din* ‘GEN/NOM.3S’ and *=dan* ‘GEN/NOM.3P’ are similar to that of other nominative pronominal clitics in the following respects. First, they can be used as the sole argument of a monadic clause, as in (104) and (106). Second, they can be used as the agent of a dyadic *-um-/og-*, or *maN-* clause, as in (107). Third, they can be used as the nonagentive noun phrase of a dyadic *-on* clause, a dyadic *-an* clause, or a dyadic *i-* clause, as in (105).

Based on the fact that *=din* ‘GEN/NOM.3S’ and *=dan* ‘GEN/NOM.3P’ can have the same syntactic distribution as nominative pronominal clitics, we can conclude that they are also third personal singular and third personal plural nominative pronominal clitics.

(104) *=din* as the sole argument of a monadic clause:

madiyù=din=pad, pigkawasan=on to mongo otow no mangka-aslag.
 far=NOM.3S=yet descended.onto=now TO PL person LIG large

‘While he was still at some distance, some large men jumped down on him.’
 (MBD 9–069)

(105) *=din* as the theme argument of a dyadic *-an* clause:

madiyù=pad kandin no pigkawasan=din=on to mongo idù
 far=yet 3S when descended.onto=NOM.3S=now TO PL dog

no tag daduwa to uu.
 LIG each two TO head

‘While he was still quite far, some two-headed dogs jumped down on him.’
 (MBD 9–054)

(106) *=dan* as the sole argument of a monadic clause:

sigi=dan nigbogsay no oglupug.
 continue=NOM.3P paddled LIG chase

‘They kept rowing after (it).’ (MBD 9–027)

(107) =*dan* as the agent of a dyadic *-um-/og-* clause:

- a. *pagkahapun* to banwa, *nigimatoy=dan* to babuy.
 evening TO place killed=NOM.3P TO pig

‘In the evening, they killed a pig.’ (MBD 8–016)

- b. *umaà=dan* kan *nakaogwà* ay! *doydoyawan* no daaga.
 look=NOM.3P KAN emerged wow good LIG lady

‘When they looked at the one who appeared, wow! It was an exceedingly beautiful lady.’ (MBD 9–136)

Now, let us consider the claim that the forms *kandin* ‘3S’ and *kandan* ‘3P’ are free form pronouns rather than clitic pronouns. The following piece of evidence can justify the claim.

Nominative pronominal clitics (including =*din* and =*dan*), whether monosyllabic or disyllabic, occur BEFORE adverbial clitics (e.g., =*on* ‘now’, =*d* ‘now’, =*pad* ‘yet’, etc.), as in (108)–(111). However, *kandin* ‘3S’ and *kandan* ‘3P’ occur AFTER (rather than BEFORE) adverbial clitics, as in (112) and (113). If *kandin* ‘3S’ and *kandan* ‘3P’ are really nominative clitics, we expect them to appear BEFORE adverbial clitics (rather than AFTER) adverbial clitics. However, that is not what we found in the data.

Based on the fact that *kandin* ‘3S’ and *kandan* ‘3P’ do NOT have the same syntactic distribution as nominative pronominal clitics, we can conclude that they are NOT nominative pronominal clitics.

(108) monosyllabic nominative pronominal clitic occurs BEFORE an adverbial clitic:

- dayun to *mihungow=on* to *ginhawa=ku*, Utù, no
 then TO released=now TO breath=GEN.IS Utù when
umabut=koy=on diyà to Nasuli.
 arrived=NOM.1PE=now there TO Nasuli

‘Then I relaxed, Utù, when we (ex.) were already at Nasuli.’ (MBD 6–025)

- (109) monosyllabic and disyllabic nominative pronominal clitics occur BEFORE an adverbial clitic:

kuwà=**ka**=d, ogduduma=**kinow**=on.
 come=NOM.2S=now accompany=NOM.1PE=now

‘Come on now, we (ex.) will go together.’ (MBD 9–114)

- (110) =*din* occurs BEFORE an adverbial clitic:

madiyù=**din**=pad, pigkawasan=on to mongo otow no mangka-aslag.
 far=NOM.3S=yet descended.onto=now TO PL person LIG large

‘While he was still at some distance, some large men jumped down on him.’
 (MBD 9–069)

- (111) *kandin* occurs AFTER an adverbial clitic; =*din* occurs BEFORE an adverbial clitic:

madiyù=pad **kandin** no pigkawasan=**din**=on to mongo idù
 far=yet 3S when descended.onto=NOM.3S=now TO PL dog

no tag daduwa to uu.
 LIG each two TO head

‘While he was still quite far, some two-headed dogs jumped down on him.’
 (MBD 9–054)

- (112) *kandin* occurs AFTER (rather than BEFORE) an adverbial clitic:

...dì ko ogka-uli-an=on ogpakahipanow=on **kandin**.
 but when returned=now walk=now 3S

‘When they (his legs) recovered, he was able to walk.’ (MBD 6–005)

- (113) *kandan* occurs AFTER (rather than BEFORE) an adverbial clitic:

...su ko pagastuhon=ku=d lagboy to batà=ku basi dà
 because if charge=GEN.1S=now very TO child=GEN.1S maybe just

lumisodlisod=on ko maminyò=on **kandan**.
 difficult=now when marry=now 3P

‘...because if I make him pay heavily for my daughter, maybe it will be hard for them when they are married.’ (MBD 7–043)

7.3.2.3 Free form neutral pronouns

Free form neutral pronouns (referred to as locative pronouns in previous analyses) have a number of functions. First, they can be used as the sole argument of a monadic

clause, as in (114) and (115). Second, they can be used as the nonagentive argument of a dyadic *-on* clause, or the nonagentive argument of a dyadic *-an* clause, or the nonagentive argument of a dyadic *i-* clause, as in (116)–(117). Third, they can be used as the predicate nominal of a nominal clause, as in (118). Fourth, they can be used as the nonpredicate nominal of a nominal clause, as in (119). Fifth, they can be used as a topic, as in (120). Sixth, they can be used as a source phrase, as in (118). Seventh, they can be used as a recipient (goal) phrase, as in (121). Eighth, they can be used as an absolute possessive, as in (122).

Based on the fact that they can function not only as adjuncts, but also as core arguments, I consider that they are NOT case-marked. Therefore, the label “neutral pronouns”, rather than “locative pronouns”, is used.

(114) free form neutral pronoun as the sole argument of a monadic (*-um-*) clause:

...pilak ubag *kandan* bali
 spear barely 3P finally

‘Finally they managed to spear (it).’ (MBD 3–030)

(115) free form neutral pronoun as the sole argument of a monadic *maN-* clause:

pagkakita to mungo su-un no mig-abut=on si Bagaram,
 seeing TO PL sibling LIG arrived=now NOM Bagaram

namanlaguy kandan.
 ran.away 3P

‘When the brothers saw that Bagaram had arrived, they both ran away.’ (MBD 9–151)

- (116) free form neutral pronoun as the nonagentive argument of a dyadic *-on* clause:

di kunto-on iyan *ogpadayunon*=tanow to *ogdaahon*=noy ikow
 but now it.is CAUS.proceed=GEN.1PI TO carry=GEN.1PE 2S
 diyà to duktul.
 there TO doctor

‘But now is the time for us (in.) to proceed, so we (ex.) can take you (sg.) to a doctor.’ (MBD 6–114)

- (117) free form neutral pronoun as the nonagentive argument of a dyadic *i-* clause:

...*ipakasal*=ta usab *kandan* ki Intantiyaya aw si Rasagadang.
 CAUS.marry=GEN.ID also 3P OBL Intantiyaya and NOM Rasagadang

‘...we (dl.) will let them marry Intantiyaya and Rasagadang.’ (MBD 9–154)

- (118) free form neutral pronoun as the predicate nominal of a nominal clause and as a source phrase:

...di *ikow* kan *bimilang* kay *ikow* man kan *mig-agow* *kanak*.
 but 2S KAN count because 2S really KAN snatched 2S

‘...but you (sg.) must be the one to count because you (sg.) are the one who grabbed from me.’ (MBD 2–020)

- (119) free form neutral pronoun as the nonpredicate nominal of a nominal clause:

...su panganoy=ku *ikow* no batà....
 because firstborn=GEN.IS 2S LIG child

‘Because you (sg.) are my firstborn child....’ (MBD 6–092)

- (120) free form neutral pronoun as a topic:

kanami no hingadan no mingo Dibabawon no mong-otow,
 IPE LIG name LIG PL Dibabawon LIG people

no timpu=pad ni Amoy,....
 when time=yet GEN Father

‘As for us (ex.), who are named the Dibabawon people, when it was still Father’s time....’ (MBD 5–001)

- (121) free form neutral pronoun as a recipient (goal) phrase:

su si-akon iyan no modyu-on galingan, dakoo no tabang *kanak*.
 because TOP.IS it.is LIG EXIST corn.mill great LIG help IS

‘Because as for myself who am the one who has a corn mill, it is great help to me.’ (MBD 2–026)

(122) free form neutral pronoun as an absolute possessive:

mano *pig-agawan* kan pasak=din, *nigsubra* kan *kandin* *kabuut*,...
 since snatched.from KAN land=GEN.3S increased KAN 3S bravery

‘Since his land had been grabbed from him, his courage became excessive,....’
 (MBD 2–015)

7.3.2.4 Full form nominative pronouns

In addition to the above three sets of pronouns, my textual analysis also suggests the existence of another (incomplete) set of pronouns, full form nominative pronouns. In principle, full form nominative pronouns are the pronominal equivalents of *si*-marked phrases. However, in practice, the pronominal equivalents of *si*-marked phrases seem to be either full form nominative pronouns or free form neutral pronouns. More accurately, free form neutral pronouns more often function as the pronominal equivalents of *si*-marked phrases than their corresponding full form nominative pronouns. It seems that the grammatical function which was originally associated with the full form nominative pronouns has been gradually taken over by free form neutral pronouns.

Although full form nominative pronouns do not occur frequently in the texts, I was able to find some data that suggest that they are associated with at least the following three syntactic distributions.¹⁰ First, they can function as the nonagentive argument of a dyadic *-an* clause (or a dyadic *-on* clause, or a dyadic *i-* clause), as in (123). Second, they can function as the predicate nominal of a nominal clause, as in (124). Third, they can function as a topic, as in (125).

¹⁰ The syntactic distribution of full form nominative pronouns is precisely the same as those of the equivalent pronouns in Central Cordilleran languages (Reid pers. comm.).

(123) full form nominative pronoun as the nonagentive argument of a dyadic *-an* clause:

dumaan=ku=dà *sikiyu* diyà to Hijo.
 accompany=GEN.IS=just NOM.2P there TO Hijo

‘I will just accompany you (pl.) there to Hijo.’ (MBD 8–022)

(124) full form nominative pronoun as the predicate nominal of a nominal clause:

eh, konà Utù, su *sikuna*=dà man iyan to tu-ud=ku.
 eh no Utù because NOM.2S=just really it.is TO purpose=GEN.IS

‘Eh no, Utù, because you (sg.) are my only purpose for coming.’ (MBD 4–025)

(125) full form nominative pronoun as a topic:

a. ...*sikita*, konà=*ki* *og-abutan*.
 NOM.1D NEG=NOM.1D arrive

‘...as for us (dl.), we (dl.) will not have a harvest.’ (Lit., ‘...as for us (dl.), it will not come to us (dl.).’) (MBD 5–009)

b. ...*si-ak*, *ogbangan*=*a* diyà to pasak.
 NOM.1S ambush=NOM.1S there TO ground

‘...as for me, I will lie in wait on the ground.’ (MBD 8–036)

c. *si-akon* no una no batà=din, nama-anan=*ku* kan pilimidu
 NOM.1S LIG first LIG child=GEN.3S know.about=GEN.1S KAN first

no *migdokot* kandin no sakit.
 LIG stick 3S LIG sickness.

‘As for me, his first child, I know about the original sickness that afflicted him.’ (MBD 6–002)

d. *sikatanow* tibò no songo gurup moydu-on iyan sabut no
 NOM.1PI all LIG one group EXIST it.is understand LIG

ogpahinangon=kinow to pitu no bu-uk to babuy,....
 ceremony=NOM.1PI TO seven LIG piece TO pig

‘As for all of us (in.) in the family circle, we (in.) have an understanding that we will have a ceremony with seven pigs....’ (MBD 6–147)

7.3.2.5 Summary

Let me sum up the discussion in this section.

As summarized in table 7.4, four sets of personal pronouns are distinguished in Dibabawon Manobo: (i) genitive clitic pronouns, (ii) nominative clitic pronouns, (iii) neutral clitic pronouns, (iv) nominative clitic pronouns.

TABLE 7.4 PERSONAL PRONOUNS IN DIBABAWON MANOBO

	CLITICS		FREE	
	GENITIVE	NOMINATIVE	NEUTRAL	NOMINATIVE
1S [+SPKR, -ADDR, -PLRL]	=ku	=ʔa	kanak	si-ak si-akon
2S [-SPKR, +ADDR, -PLRL]	=nu	=ka	ikow	sikuna
3S [-SPKR, -ADDR, -PLRL]	=din	---/=din	kandin	
1D [+SPKR, +ADDR, -PLRL]	=ta	=ki	ita	sikita
1PI [+SPKR, +ADDR, +PLRL]	=tanow	=kinow	itanow	sikitanow
1PE [+SPKR, -ADDR, +PLRL]	=noy	=koy	kanami	
2P [-SPKR, +ADDR, +PLRL]	=now	=kow	iyu	sikiyu
3P [-SPKR, -ADDR, +PLRL]	=dan	---/=dan	kandan	

Genitive clitic pronouns can be associated with two functions. First, they can function as the attribute (i.e., the possessor) in a possessive construction. Second, they can function as the agent of a dyadic *-on* clause, the agent of a dyadic *-an* clause, or the agent of a dyadic *i-* clause.

Nominative clitic pronouns have three different distributions. First, they can be used as the sole argument of a monadic clause. Second, they can be used as the agent of a dyadic *-um/-og-*, or *maN-* clause. Third, they can be used as the nonagentive noun phrase of a dyadic *-on* clause, a dyadic *-an* clause, or a dyadic *i-* clause.

Free form neutral pronouns (referred to as locative pronouns in previous analyses) are associated with a number of functions. First, they can be used as the sole argument of a monadic clause. Second, they can be used as the nonagentive argument of a dyadic *-on*

clause, or the nonagentive argument of a dyadic *-an* clause, or the nonagentive argument of a dyadic *i-* clause. Third, they can be used as the predicate nominal of a nominal clause. Fourth, they can be used as the nonpredicate nominal of a nominal clause. Fifth, they can be used as a topic. Sixth, they can be used as a source phrase. Seventh, they can be used as a recipient (goal) phrase. Eighth, they can be used as an absolute possessive.

Full form nominative pronouns are associated with at least the following three syntactic distributions. First, they can function as the nonagentive argument of a dyadic *-an* clause (or a dyadic *-on* clause, or a dyadic *i-* clause). Second, they can function as the predicate nominal of a nominal clause. Third, they can function as a topic.

In this section, I also reconsider the syntactic status of the form *=din* and *=dan*, which were formerly analyzed as genitive pronominal clitics. Based on the fact that *=din* ‘GEN/NOM.3S’ and *=dan* ‘GEN/NOM.3P’ can have the same syntactic distribution as nominative pronominal clitics, I conclude that they are not only third person genitive pronominal clitics, but also third person nominative pronominal clitics.

Furthermore, I reconsider the status of the forms *kandin* ‘3S’ and *kandan* ‘3P’. Based on the fact that clitic pronouns occur before adverbial clitics, but *kandin* ‘3S’ and *kandan* ‘3P’ occur AFTER (rather than BEFORE) adverbial clitics, I conclude that they are free form pronouns rather than clitic pronouns.

7.4 TRANSITIVITY IN DIBABAWON MANOBO VERBAL CLAUSES

In this section, I discuss transitivity in Dibabawon Manobo verbal clauses. I first discuss Dibabawon Manobo verbal clause patterns in 7.4.1. Then I discuss three possible

analyses concerning Dibabawon Manobo transitivity and actancy structure in 7.4.2.

Section 7.4.3 evaluates these three analyses in terms of morphosyntactic and semantic properties that Dibabawon Manobo clauses exhibit. Section 7.4.4 summarizes the discussion in this section.

7.4.1 Dibabawon Manobo Verbal Clause Patterns

Three major verbal clause patterns are found in Dibabawon Manobo: (i) Pattern 1: monadic intransitive clauses, (ii) Pattern 2: dyadic *-um-/og-*, or *maN-* clauses, and (iii) Pattern 3: (a) dyadic *-on* clauses, (b) dyadic *-an* clauses, and (c) dyadic *i-* clauses. In pattern 1, the lexical verbs are either morphologically unmarked or have the morphological shape *ma-*, *-um-/og-*, or *maN-*. In pattern 2, the dyadic lexical verbs are either morphologically unmarked or have the morphological shape *-um-/og-*, or *maN-*. In patterns 3a–3c, the dyadic lexical verbs have the morphological shape *-on*, *-an*, and *i-*, respectively. These three clause patterns are represented schematically in table 7.5.

In this study, dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses are considered to form one major type of dyadic clauses because they share the same case frame. That is, they all expect both an agentive genitive NP and a nonagentive nominative NP. However, they differ from each other in the interpretation of the nominative NP. In dyadic *-on* clauses, the nominative NP is usually interpreted as a directly affected theme. In dyadic *-an* clauses, the nominative NP is usually interpreted as a location, or a less directly affected theme, or as a benefactive/beneficiary. In dyadic

i- clauses, the nominative NP is usually interpreted as an instrument, or as a benefactive/beneficiary.

TABLE 7.5 VERBAL CLAUSE PATTERNS IN DIBABAWON MANOBO

PATTERN 1:	<i>-um-/og-/ma-/maN-V</i> Intr.	<i>si/osi</i> Nom agent/theme	N		
PATTERN 2:	<i>-um-/og-/maN-V</i> Intr.?Tr.?	<i>si/osi</i> Nom agent	N	<i>ki/ongki</i> Obl?/Acc? theme	N
PATTERN 3A:	<i>V-on</i> Intr.?Tr.?	<i>ni/oni</i> Gen agent	N	<i>si/osi</i> Nom theme	N
PATTERN 3B:	<i>V-an</i> Intr.?Tr.?	<i>ni/oni</i> Gen agent	N	<i>si/osi</i> Nom location/benefactive	N
PATTERN 3C:	<i>i-V</i> Intr.?Tr.?	<i>ni/oni</i> Gen Agent	N	<i>si/osi</i> Nom instrument/benefactive	N

Pattern 1 typically consists of monadic *ma-/um-* or *og-/maN-* verbs that expect only one nominative NP, as in (126)–(127). In some cases, the monadic verbs may also allow an optional peripheral argument (or adjunct), as in (128).

(126) pattern 1: monadic *-um-/og-* clause:

- a. wadà kaugoy no lalislalis=dan mig-abut si Bagaram.
NEG long.time LIG arguing=NOM.3P arrived NOM Bagaram

‘They hadn’t been arguing long when Bagaram arrived.’(MBD 9–150)

- b. *miglogwà*=a su awos *mamatoy* so-i no busow.
 emerged=NOM.1S because so.that die this LIG demon
 ‘I appeared so that this demon might die.’ (MBD 9–111)

(127) pattern 1: monadic *maN*- clause:

pagkakita to mungo su-un no *mig-abut*=on si Bagaram,
 seeing TO PL sibling LIG arrived=now NOM Bagaram
namanlaguy kandan.
 ran.away 3P

‘When the brothers saw that Bagaram had arrived, they both ran away.’ (MBD 9–151)

(128) pattern 1: dyadic *-um-/og-* clause:

wadà pad ugtu, *mig-andiya*=d kan tag-iyà to pasak du-on kan lindiru.
 NEG yet noon went.there=now KAN owner TO land there KAN boundary
 ‘Before it was noon yet, the owner of the land went there to the boundary.’
 (MBD 2–017)

Pattern 2 typically consists of dyadic *-um-/og-*, or *maN*- verbs that expect both a nominative NP and a *ki/ongki*-marked personal NP (or its substitute), as in (129) and (130). In some cases, the dyadic *-um-/og-*, or *maN*- verbs in pattern 2 may also allow an optional peripheral argument (or adjunct).

(129) pattern 2: dyadic *-um-/og-* clause:

*nig*lambag=a *ki* Laureano to *pagdatong*=din likat to Nasuli.
 went.see=NOM.1S OBL Laureano TO arrive=GEN.3S from TO Nasuli
 ‘I went to see Laureano when he arrived from Nasuli.’ (MBD 11–013)

(130) pattern 2: dyadic *-um-/og-* clause:

og-imatoy=ki=d to *babuy* kunto-on su andiyà=ki=d to Hijo.
 kill=NOM.ID=now TO pig today because go.there=NOM.ID=now TO Hijo
 ‘Let’s kill a pig now, because we (dl.) will go to Hijo.’ (MBD 8–014)

Patterns 3a–c typically consist of dyadic *-on* verbs, dyadic *-an* verbs, and dyadic *i-* verbs that expect both an agentive genitive-marked full NP (or other genitive substitute)

and a nonagentive nominative full NP (or other nominative substitute), as in (131)–(136). Like the verbs in pattern 1 and pattern 2, the dyadic *-on* verbs, dyadic *-an* verbs, and dyadic *i-* verbs in patterns 3a–c may also allow an optional peripheral argument (or adjunct). Notice that the nominative NP in dyadic *-an* clauses can be interpreted as either a location or less directly affected theme (as in (133)), or as a beneficiary (as in (134)). The nominative NPs in a dyadic *i-* clause can be interpreted as either an instrument (including a theme which moves through space or time) (as in (135)), or as a beneficiary (as in (136)).

(131) pattern 3a: dyadic *-on* clause:

- a. pispisa usab ni Bagaram kan kampilan=din aw panigbasa=din
 pulled again GEN Bagaram KAN sword=GEN.3S and slashed=GEN
 kan mungo otow.
 KAN PL person

‘Bagaram again drew his sword and he slashed the men.’ (MBD 9–070)

- b. pagkali-us ni Edu pigsugù=on ni Amoy si Inoy....
 gone GEN Fred commanded=now GEN Father NOM Mother

‘When Fred had left, Father instructed Mother....’ (MBD 6–135)

(132) pattern 3a: dyadic *-on* clause:

dagow masa-aban=ka, ko-onon=ka=din giyud.
 might overtaken=NOM.2S eat=NOM.2S=GEN.3S surely

‘He will probably come upon you (sg.), he will surely eat you (sg.).’ (MBD 9–094)

(133) pattern 3b: dyadic *-an* clause:

- a. dayun to pighulidan ni Edu si Amoy, nalipodong ubag
 then TO lay.beside GEN Fred NOM Father sleep mere
 si Amoy su migtu-u man kandin to nahulidan ni Edu.
 NOM father because believed really 3S TO lie.beside GEN Fred

‘So then Fred lay down beside Father; Father slept a little because he had faith in Fred lying beside him.’ (MBD 6–129)

- b. ...ko *oghimatayan* to amoy to batà=din no daga to konà=din
 if kill TO father TO child=GEN.3S LIG lady TO NEG=GEN.3S
 no gustu sikan lukos no *impagsabut* to batà=din.
 LIG like that man LIG understood TO child=GEN.3S
 ‘The father will kill his daughter if the man his child has made an agreement
 with is not to his liking.’ (MBD 7–002)

(134) pattern 3b: dyadic *-an* clause:

- nahiman* kandan du-on to baoy aw ampu-*i*=dan si Laureano.¹¹
 gathered 3P there TO house and prayed.for=GEN.3P NOM Laureano
 ‘They gathered in the house and they prayed for Laureano.’ (MBD 11–007)

(135) pattern 3c: dyadic *i-* clause:

- ...su iyan *imbuyù* to bantoy ita to pitu no bu-uk su
 because it.is requested TO guard 1D TO seven LIG piece because
 si Elena *nakasaà*.
 NOM Elena sinned
 ‘...that the spirit requested seven pigs from us (dl.) because Elena sinned.’
 (MBD 6–147)

(136) pattern 3c: dyadic *i-* clause:

- ...su *igba-id=ku=pad ikow* diyà to maistudu.
 because request.for=GEN.1S=yet 2S there TO teacher
 ‘...because first I will request permission for you (sg.) from your teacher.’
 (MBD 4–023)

7.4.2 Three Possible Analyses Concerning Dibabawon Manobo Transitivity and Actancy

As shown in section 7.4.1, there are two distinct dyadic clause patterns that are ambiguous regarding transitivity. Varying in their interpretation of these two patterns, three possible analyses concerning Dibabawon Manobo transitivity and actancy structure can be proposed: a passive analysis, a split-ergative analysis, and an ergative analysis.

¹¹ The form *-i* is the dependent immediate aspectual form of a dyadic *-an* verb.

In a passive analysis, the *ki/ongki*-marked theme NP (or its substitute) in pattern 2 would be treated as an “accusative” object of an active transitive construction, but the *ni/oni*-marked agent (or other genitive substitute) in patterns 3a–c would be treated as a demoted agent of passive constructions. By treating pattern 1 as intransitive, pattern 2 as canonical transitive, and patterns 3a–c as passives, Dibabawon Manobo can be analyzed as an accusative language. The passive analysis is schematically summarized as in table 7.6.

TABLE 7.6 DIBABAWON MANOBO AS AN ACCUSATIVE LANGUAGE

PATTERN 1:	<i>-um-/og-/ma-/maN-V</i> Intr.	<i>si/osi</i> Nom agent/theme	N		
PATTERN 2:	<i>-um-/og-/maN-V</i> Tr.	<i>si/osi</i> Nom agent	N	<i>ki/ongki</i> Acc theme	N
PATTERN 3A:	<i>V-on</i> Intr.	<i>ni/oni</i> Gen agent	N	<i>si/osi</i> Nom theme	N
PATTERN 3B:	<i>V-an</i> Intr.	<i>ni/oni</i> Gen agent	N	<i>si/osi</i> Nom location/benefactive	N
PATTERN 3C:	<i>i-V</i> Intr.	<i>ni/oni</i> Gen agent	N	<i>si/osi</i> Nom instrument/benefactive	N

In a split-ergative analysis, the *ki/ongki*-marked theme NP (or its substitute) in pattern 2 would be treated as an “accusative” object of one type of transitive construction, and the *ni/oni*-marked personal NP (or other genitive substitute) in patterns 3a–c would be

treated as an agent of the other type of transitive construction. By treating pattern 1 as intransitive and both pattern 2 and patterns 3a–c as canonical transitive, Dibabawon Manobo can be analyzed as a split-ergative language. The split-ergative analysis is summarized schematically in table 7.7.

TABLE 7.7 DIBABAWON MANOBO AS A SPLIT-ERGATIVE LANGUAGE

PATTERN 1: <i>-um-/og-/ma-/maN-V</i> Intr.	<i>si/osi</i> Nom/Abs agent/theme	N		
PATTERN 2: <i>-um-/og-/maN-V</i> Tr.	<i>si/osi</i> Nom agent	N	<i>ki/ongki</i> Acc theme	N
PATTERN 3A: <i>V-on</i> Tr.	<i>ni/oni</i> Gen/Erg agent	N	<i>si/osi</i> Nom/Abs theme	N
PATTERN 3B: <i>V-an</i> Tr.	<i>ni/oni</i> Gen/Erg agent	N	<i>si/osi</i> Nom/Abs location/benefactive	N
PATTERN 3C: <i>i-V</i> Tr.	<i>ni/oni</i> Gen/Erg agent	N	<i>si/osi</i> Nom/Abs instrument/benefactive	N

In an ergative analysis, the *ki/ongki*-marked theme NP (or its substitute) in pattern 2 would be treated as an oblique-marked extended core argument of an extended intransitive construction but the *ni/oni*-marked agent personal NP (or other genitive substitute) in patterns 3a–c would be treated as an agent of a transitive construction. By treating pattern 1 as intransitive, pattern 2 as extended intransitive, and patterns 3a–c as

transitives, Dibabawon Manobo can be analyzed as a pure ergative language. The ergative analysis is summarized schematically in table 7.8.

TABLE 7.8 DIBABAWON MANOBO AS AN ERGATIVE LANGUAGE

PATTERN 1:	<i>-um-/og-/ma-/maN-V</i> Intr.	<i>si/osi</i> Nom/Abs agent/theme	N		
PATTERN 2:	<i>-um-/og-/maN-V</i> Intr.	<i>si/osi</i> Nom/Abs agent	N	<i>ki/ongki</i> Obl theme	N
PATTERN 3A:	<i>V-on</i> Tr.	<i>ni/oni</i> Gen/Erg agent	N	<i>si/osi</i> Nom/Abs theme	N
PATTERN 3B:	<i>V-an</i> Tr.	<i>ni/oni</i> Gen/Erg agent	N	<i>si/osi</i> Nom/Abs location/benefactive	N
PATTERN 3C:	<i>i-V</i> Tr.	<i>ni/oni</i> Gen/Erg Agent	N	<i>si/osi</i> Nom/Abs instrument/benefactive	N

As illustrated in tables 7.6–7.8, all three analyses agree in treating pattern 1 as an intransitive structure, but disagree as to whether pattern 2 and/or patterns 3a–c should be treated as transitive structures. Such disagreement exists because both pattern 2 and patterns 3a–c are dyadic structures that might be considered transitive. Because both pattern 2 and patterns 3a–c are possible candidates for transitive constructions, it is crucial to determine which one of the two, or whether both, should count as transitive constructions in Dibabawon Manobo. In the following section, I examine the

morphosyntactic and semantic properties that these clause patterns exhibit in order to decide the matter.

7.4.3 Morphosyntactic and Semantic Properties of Dibabawon Manobo Verbal Clauses

Dibabawon Manobo is a relatively under-described language. Only a few SIL (Summer Institute of Linguistics) linguists have published any phonological, syntactic, or discourse studies on this language (Barnard 1967; Barnard and Forster 1954, 1969; Barnard and Longacre 1968; Forster 1954, 1958, 1963, 1964, 1970, 1983; Forster and Barnard 1968, 1987). In previous analyses of Dibabawon Manobo syntax, it has been described as having a unique “verbal focus” system (Forster 1964; Forster and Barnard 1987; etc.). Under the focus analysis, the notion of transitivity is neglected. This leads to the impossibility of determining actancy structures of Dibabawon Manobo; as a result, its typological status is uncertain.

In this study, I depart from the previous analyses in considering transitivity as an important notion in Dibabawon Manobo syntax. By re-examining Dibabawon Manobo verbal clause patterns in terms of the morphosyntactic and semantic properties that they exhibit, I make a clear statement about its typological status. More specifically, Dibabawon Manobo is analyzed as having a pure ergative actancy structure. The following morphosyntactic and semantic evidence can justify this claim.

7.4.3.1 Nominal case-marking

As discussed in 7.4.2, three possible analyses of Dibabawon Manobo verbal clauses can be proposed: a passive analysis, a split-ergative analysis, and an ergative analysis.

In this section, I evaluate these three analyses in terms of the nominal case-marking system.

If we compare the three types of analyses in terms of the nominal case-marking system, we find that the ergative analysis is a better analysis of Dibabawon Manobo transitivity.

If the passive analysis were correct, then the *ki/ongki*-marked theme NP (or its substitute) in pattern 2 would be an “accusative” NP and the *ni/oni*-marked NP (or other genitive substitute) in patterns 3a–c would be a peripheral argument or an adjunct. However, as shown in section 7.3.1.2, my textual analysis suggests that the *ki/ongki*-marked NP (or its substitute) in pattern 2 should be treated as an OBLIQUE-marked extended core argument E rather than an accusative-marked core argument O. Besides, the analysis that treats the *ni/oni*-marked NP (or other genitive substitute) in patterns 3a–c as an adjunct may raise questions such as “If the *ni/oni*-marked NP (or other genitive substitute) in patterns 3a–c is an adjunct, why is it almost always present in this type of clause?” or “If the *ni/oni*-marked NP (or other genitive substitute) in patterns 3a–c is an adjunct, why can it undergo some syntactic processes (such as relativization, *wh*-clefting, etc.)?”, and so forth.

If the split-ergative analysis were correct, the *ki/ongki*-marked theme NP (or its substitute) in pattern 2 would be an “accusative” NP and the *ni/oni*-marked NP (or other

genitive substitute) in patterns 3a–c would be an “ergative” NP. As just noted, my textual analysis points out that the *ki/ongki*-marked personal NP (or its substitute) in pattern 2 should be treated as an OBLIQUE-marked extended core argument E rather than an accusative-marked core argument O. Moreover, if the split-ergative analysis were the correct characterization of Dibabawon Manobo transitivity, we would run into the following problem in typology.

Typologically speaking, if a language exhibits a split case-marking system, it is commonly conditioned by one or more of the following factors: (1) the semantic nature of the main verb, (2) the semantic nature of the core NPs (e.g., pronominals vs. full noun phrases), (3) the tense/aspect/mood of the clause, and (4) the grammatical status of a clause (i.e., whether it is a main or subordinate clause) (Dixon 1979, 1994). However, none of these factors seems to condition the supposed split case-marking system described in the split-ergative analysis. From a typological perspective, such an analysis would be undesirable because it would make Dibabawon Manobo (as well as many other western Austronesian languages) typologically unusual in that it would show an idiosyncratic type of split case-marking system, one that had none of the usual motivations for such a split.

On the other hand, if the ergative analysis is correct, then all the problems that we encountered for the other two types of analyses are avoided. As already demonstrated in section 7.3.1.2, the textual analysis suggests that the *ki/ongki*-marked theme NP (or its substitute) in pattern 2 should be an OBLIQUE-marked extended core argument E and the *ni/oni*-marked NP (or other genitive substitute) in patterns 3a–c should be an ergative-

marked A (genitive-marked A in my analysis). This is exactly what is to be expected in an ergative analysis.

7.4.3.2 Semantic transitivity

In the preceding section, I have shown that evidence from the nominal case-marking system suggests that an ergative analysis is a better analysis of Dibabawon Manobo transitivity than the other analyses. In this section, I demonstrate that semantic evidence converges with morphosyntactic evidence in this conclusion.

As discussed in Chapter 4, linguists working on different language families agree with Hopper and Thompson (1980) in the observation that semantic properties often correlate with morphosyntactic transitivity in a systematic way (e.g., Tsunoda 1999; Gibson and Starosta 1990; Dixon 1994; Huang 1994; Starosta 1997, 1998, 1999, 2002b; Lazard 1997; Rau 1997). More specifically, they have shown that if semantic parameters covary with morphosyntactic manifestations of transitivity, clauses exhibiting high semantic transitivity are more likely to be encoded grammatically (morphologically and syntactically) as transitive.

However, they disagree with each other on whether all of the ten semantic parameters that Hopper and Thompson proposed should be considered equally relevant to the morphosyntactic manifestations of transitivity. For instance, Tsunoda (1999:4) suggests that AFFECTEDNESS OF THE PATIENT is the most important and is (almost) always relevant to the morphosyntactic manifestations of transitivity. However, my analysis of Kavalan textual data shows that INDIVIDUATION OF THE THEME is most relevant to the

morphosyntactic manifestations of Kavalan transitivity. My analysis of Squaliq Atayal, however, suggests three semantic parameters, VOLITIONALITY, INDIVIDUATION OF THE THEME, and AFFECTEDNESS OF THE THEME, as most relevant to the morphosyntactic manifestations of transitivity in Squaliq Atayal. My study of Central Cagayan Agta, however, suggests two semantic parameters, INDIVIDUATION OF THE THEME and AFFECTEDNESS OF THE THEME,¹² as most relevant to the morphosyntactic manifestations of transitivity in Central Cagayan Agta. In this study, I consider three semantic parameters, PUNCTUALITY, INDIVIDUATION OF THE THEME, and AFFECTEDNESS OF THE THEME, as most relevant to the morphosyntactic manifestations of transitivity in Dibabawon Manobo.

Let us compare pattern 2 (i.e., dyadic *-um-/og-* or *maN-* clauses) with patterns 3a-c (i.e., dyadic *-on* clauses, dyadic *-an* clauses, or dyadic *i-* clauses) in terms of punctuality, individuation of the theme, and affectedness of the theme.

First, let us consider punctuality in examples (137)–(138). Although both sentences involve verbs of ‘seeing’, they differ in their semantic interpretation. Example (137) refers to a nonpunctual action, whereas (138) refers to a punctual or instantaneous

¹² As discussed in Chapter 5, among the ten semantic parameters proposed by Hopper and Thompson, two of them (i.e., Affectedness of theme NPs and Individuation of theme NPs) need to be modified in order to cover dyadic applicative constructions in languages that make extensive use of applicative constructions. These two semantic parameters can be restated as “Affectedness of NONAGENTIVE NPs” and “Individuation of NONAGENTIVE NPs”, in which nonagentive NPs can be theme NPs or beneficiary NPs, instrument NP, etc.

action.¹³ This pair of sentences suggest that dyadic *-um-/og-* or *maN-* clauses are semantically less transitive than dyadic *-on* clauses.

(137) pattern 2: dyadic *-um-/og-* clause with a nonpunctual interpretation:

...su konà=a ogka-amu og-ikagi ko ogkita=a ki Amoy
 because NEG=NOM.IS know.how speak when see=NOM.IS OBL Father

no oglisod ko oghinhawa.
 LIG difficult when breathe

‘...because I don’t know how to speak when I look at Father having a hard time to breathe.’ (MBD 6–140)

(138) pattern 3a: dyadic *-on* clause with a punctual or instantaneous interpretation:

...pigkita=on to idù kan sangkodan no babuy no
 spotted=now TO dog KAN enormous LIG pig LIG

angod=on to nanangà to taklubù.
 like=now TO carry.in.mouth TO bracelet

‘...the dog sighted an enormous pig that looked as if it were carrying pearl bracelets in its mouth.’ (MBD 3–010)

Second, let us consider individuation of the theme NPs/nonagentive NPs and/or affectedness of the theme NPs/nonagentive NPs in examples (139)–(140). Example (139) is used when one warrior asked his warrior friend to kill a pig. In this situation, *babuy* ‘pig’ is simply a generic concept; therefore, it is a nonindividuated theme. However, in (140), the warrior *Dago-oy* stabbed at a particular pig. In this situation, *babuy* ‘pig’ is no longer a generic concept; instead, it is a individuated entity. Because the pig is affected by the action of stabbing, it is also considered to be an affected

¹³ O’Grady (2003:57–58) observes that verbs of ‘seeing’ in Samoan, an ergative Polynesian language, also show similar kind of semantic contrast. The form *va’ai* ‘looked.at’, occurring in the so-called “middle” construction (a dyadic intransitive construction), is associated with a nonpunctual action, whereas the form *va’aia* ‘spotted’, occurring in the canonical transitive construction, is associated with a punctual or instantaneous action.

nonagentive arguments. This pair of sentences suggest that dyadic *-um-/og-* or *maN-* clauses are semantically less transitive than dyadic *-an* clauses.

(139) pattern 2: dyadic *-um-/og-* clause with an indefinite theme argument:

imatoy=kow to babuy aw ogko-onon=ku to langosa.
kill=NOM.2P TO pig and eat=GEN.IS TO blood

‘You (pl.) kill a pig and I will eat the blood.’ (MBD 8–019)

(140) pattern 3b: dyadic *-an* clause with a definite and affected nonagentive argument:

piggùgu-an ni Dago-oy sikan babuy *na-ubas pagnaknak*
stabbed GEN Dago-oy that pig finish slurp

sikan langosa diyà to ka-à.
that blood there TO pan

‘Dago-oy stabbed the pig and the blood was completely slurped up from the pan.’ (MBD 8–020)

Third, let us consider individuation of the theme NPs/nonagentive NPs in examples(141)–(142). Example (141) is talking about the fact that the demon was carrying seven people. This is the first time that the entity ‘seven people’ is introduced in the discourse. The identity of the entity ‘seven people’ is not clear; therefore, it is considered to be a nonindividuated theme. In contrast, in (142), the identity of the entity ‘seven people’ is already established by the sentence in (141). Therefore, it is considered to be individuated. This pair of sentences suggest that dyadic *-um-/og-* or *maN-* clauses are semantically less transitive than dyadic *i-* clauses.

(141) pattern 2: dyadic *-um-/og-* clause with an indefinite theme argument:

wadà kaugoylugoy *migtugpà=on* kan busow, *migti-angti-ang*
NEG long.time alighted=now KAN demon was.carrying

to pitu no otow no na-isù to pasak.
TO seven LIG person LIG jarred TO ground

‘Before long the demon landed, carrying seven people and jarred the earth.’ (MBD 9–098)

(142) pattern 3c: dyadic *i*- clause with a definite nonagentive argument:

dayun itimbag *kan pitu no otow* no *na-isù* to pasak.
 then threw KAN seven LIG person LIG jarred TO ground

‘Then he threw the seven people down, jarring the earth.’ (MBD 9–099)

Summing up the discussion in this section, we can state that pattern 2 clauses (i.e., dyadic *-um-/og-*, or *maN-* clauses) are associated with nonpunctual action, nonindividuated nonagentive arguments, and nontotally affected nonagentive arguments, whereas patterns 3a–c clauses (i.e., dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses) are associated with punctual action, highly individuated nonagentive arguments, and totally affected nonagentive NPs. These semantic properties suggest that pattern 2 clauses (i.e., dyadic *-um-/og-*, or *maN-* clauses) are semantically LESS transitive than patterns 3a–c (i.e., dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses). If we correlate this semantic property with the morphosyntactic properties that we discussed in the preceding two sections, we find that semantically more transitive patterns 3a–c clauses (i.e., dyadic *-on* clauses, dyadic *-an* clauses, or dyadic *i-* clauses) are manifested grammatically as more transitive than semantically less transitive pattern 2 clauses (i.e., dyadic *-um-/og-*, or *maN-* clauses).

7.4.4 Summary

In the preceding sections, I have evaluated the three possible analyses concerning Dibabawon Manobo transitivity in terms of morphosyntactic and semantic criteria. Based on the morphosyntactic and semantic properties that Dibabawon Manobo verbal

clauses exhibit, we can conclude that the ergative analysis is the best analysis of Dibabawon Manobo transitivity.

7.5 ERGATIVITY

Having determined the transitive constructions in Dibabawon Manobo, it is possible to determine what type of actancy structure Dibabawon Manobo has.

Incorporating the observations in section 7.4, we can characterize Dibabawon Manobo clause structures as in table 7.9. From the table, we can observe that both the S of an intransitive clause and the O of a transitive clause are marked by a nominative case-marker *si/osi* or are expressed by other nominative substitute, while the A of a transitive clause is marked by a genitive case marker *ni/oni* or are expressed by other genitive substitute. This suggests that Dibabawon Manobo has a pure ergative case-marking system rather than an accusative or a split-ergative system. Unlike Kavalan and Central Cagayan Agta, Dibabawon Manobo does not have a verbal agreement system. Therefore, based on the case-marking system alone, we can conclude that Dibabawon Manobo has a pure ergative actancy structure.

TABLE 7.9 DIBABAWON MANOBO ACTANCY STRUCTURE

PATTERN 1: <i>-um-/og-/ma-/maN-V</i> Intr.	<i>si/osi</i> N Nom agent/theme	
PATTERN 2: <i>-um-/og-/maN-V</i> Intr.	<i>si/osi</i> N Nom agent	<i>ki/ongki</i> N Obl theme
PATTERN 3A: <i>V-on</i> Tr.	<i>ni/oni</i> N Gen/Erg agent	<i>si/osi</i> N Nom theme
PATTERN 3B: <i>V-an</i> Tr.	<i>ni/oni</i> N Gen/Erg agent	<i>si/osi</i> N Nom location/benefactive
PATTERN 3C: <i>i-V</i> Tr.	<i>ni/oni</i> N Gen/Erg agent	<i>si/osi</i> N Nom instrument/benefactive

7.6 CONCLUSION

In this chapter, I have re-examined Dibabawon Manobo clause structures in terms of morphosyntactic and semantic criteria. Four questions have been answered.

First, what are the constraints that condition the relative order of pronouns?

As discussed in section 7.2.2, the order of pronominals in Dibabawon Manobo is conditioned by the interaction of the following rules.

- Rule 1: Clitic pronouns always precede free form pronouns [CLITIC > NONCLITIC].
- Rule 2a: Nominative pronouns precede genitive pronouns [NOMINATIVE > GENITIVE].

- Rule 2b: First person pronouns precede second person pronouns and third person pronouns; second person pronouns precede third person pronouns [1 > 2 > 3].
- Rule 3a: If a nominative pronoun is LOWER than a genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then ONLY the NOMINATIVE pronominal clitic is used.
- Rule 3b: If a nominative pronoun is LOWER than a genitive pronoun in terms of the PERSON hierarchy (1 > 2 > 3), then substitute the nominative pronominal clitic with a free form pronoun. That is, use a genitive pronoun and a free form pronoun.

Second, are the pronominal monosyllabic forms determiners or nouns in Dibabawon Manobo?

As shown in 7.3.1.2, two of the pronominal monosyllabic forms, *to* and *kan*, previously analyzed as particles or determiners are “AUXILIARY NOUNS” that carry the feature [+extension], that is, nouns that require a dependent predicate. The fact that *to* and *kan* are “auxiliary nouns” suggests the possibility that other monosyllabic pronominal elements in Dibabawon Manobo might also be “auxiliary nouns”.

Third, what constitutes the transitive construction in Dibabawon Manobo?

As shown in 7.3.1, based on the morphosyntactic and semantic properties that Dibabawon Manobo clauses exhibit, we can conclude that patterns 3a–c clauses (i.e., dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses) are the transitive

constructions, whereas pattern 2 clauses (i.e., dyadic *-um/-og-*, or *maN-* clauses) are extended intransitives or pseudo-transitives, a type of intransitive clause.

Fourth, what kind of actancy structure does Dibabawon Manobo have (accusative, ergative, or split ergative)?

Based on the discussion in sections 7.3.1.2 and 7.4, we can observe that the S of an intransitive clause and the O of a transitive clause have the same morphological marking, whereas the A of a transitive clause has a distinct morphological marking. This suggests that Dibabawon Manobo has a pure ergative case-marking system. Unlike Kavalan and Central Cagayan Agta, Dibabawon Manobo does not have a verbal agreement system. Therefore, based on the case-marking system alone, we can conclude that Dibabawon Manobo has a pure ergative actancy structure.

CHAPTER 8

CONCLUSION

8.1 SUMMARY

The typological status of Formosan languages, Philippine languages, and other so-called “Philippine type languages” has been one of the great mysteries in the study of the syntax of the world’s languages. They have often been assumed to be typologically unique in possessing the so-called “focus system”, a type of voice system that is characterized by the use of various verbal affixes to indicate the thematic role of the NP bearing the nominative case in a sentence. They have also been assumed by some linguists to be typologically so unusual that notions such as transitivity, actancy structure, and so forth, which are commonly used in syntactic description, are either irrelevant or inapplicable to the study of these languages.

In this study, I have re-examined clause structure in Formosan languages and Philippine languages with an attempt to provide an answer to this typological problem. In order to discuss the typological status of Formosan languages and Philippine languages, some notions that are crucial to the discussion of clause structure were introduced in Chapter 2. Syntactic notions covered in this chapter include: (i) core arguments vs. peripheral arguments (or adjuncts), (ii) valency vs. transitivity, (iii) canonical transitive, passive, and antipassive, (iv) actancy structure, and (v) the various uses of the term “ergative”, such as “syntactically ergative”, “discourse ergative”, and “lexically ergative”.

Following the discussion of syntactic notions that are relevant to the study of transitivity and actancy structure, Chapter 3 provided a critical review of previous analyses of so-called “Philippine type languages”. In order to discuss various types of previous analyses, I first discussed verbal clause patterns in these languages. In discussing verbal clause patterns, I provided a brief discussion of the forms and functions of the reflexes of PAN **-um-*, **-en*, **-an*, **Si-*, (and PMP **maR-* and PMP **maN-*) in Formosan and Philippine languages. I then proceeded with a brief introduction and critical review of seven different types of analyses that have been provided in the literature. These include: (i) the “passive” analyses, (ii) the “focus” analyses, (iii) the ergative analyses, (iv) the “active” analysis, (v) the “fluid voice” analysis, (vi) the “hybrid” analysis, and (vii) the “symmetrical voice” analysis.

After providing a general characterization of verbal clause patterns in Formosan and Philippine languages and reviewing previous analyses, I presented case studies of two Formosan languages (Kavalan and Atayal) and two Philippine languages (Central Cagayan Agta and Dibabawon Manobo). In each case study, I have addressed at least the following two questions. First, what constitutes the canonical transitive construction in each language? Second, what kind of actancy structure does each language have (accusative, ergative, or split ergative)? In order to facilitate the discussion of transitivity and actancy structure in these languages, I provided a discussion of some of the basic morphosyntactic facts for each language, such as word order, construction markers, and their pronominal system. Two additional questions were addressed in the case study of

the languages. First, what are the constraints that condition the relative order of pronouns? Second, are the prenominal monosyllabic forms determiners or nouns?

Based on a thorough analysis of textual data in these four languages, I concluded that only one, rather than both, of the dyadic clause patterns constitutes the transitive construction in each of the languages under investigated. Specifically, dyadic *-an* clauses are transitive constructions in Kavalan. Dyadic *-un* clauses, dyadic *-an* clauses, and dyadic *s-* clauses are transitive constructions in Atayal. Dyadic *-an* clauses, dyadic *-ãñ* clauses, dyadic *i-* clauses, and dyadic *i-* *-ãñ* clauses are transitive constructions in Central Cagayan Agta. Dyadic *-on* clauses, dyadic *-an* clauses, and dyadic *i-* clauses are transitive constructions in Dibabawon Manobo. As for the other dyadic clause pattern (i.e., dyadic *-um-/(-)m-* clauses in Kavalan; dyadic *(-)m-* clauses in Atayal; dyadic *ma-*, *mag-*, *maN-* clauses in Central Cagayan Agta; and dyadic *-um-/og-*, or *maN-* clauses in Dibabawon Manobo), formerly analyzed as transitive constructions in previous analyses, these are treated as extended intransitives or pseudo-transitives, a type of intransitive clauses.

Based on the observations that (i) the S of an intransitive clause and the O of a transitive clause have the same morphological marking, whereas (ii) the A of a transitive clause has a distinct morphological marking in each individual language, I concluded that each individual language has an ergative case-marking system. I noted that even though neither Atayal nor Dibabawon Manobo has a (productive) verbal agreement system, it is still possible to conclude, based on the case-marking system alone, that both of these languages also exhibit a pure ergative actancy structure. As for Kavalan and Central

Cagayan Agta, verbs in these two languages can carry an optional genitive clitic pronoun or pronominal-related form that agrees with the A of a transitive clause in person and number, but not with the S of an intransitive verb nor with the O of a transitive verb. This suggests that both Kavalan and Central Cagayan Agta have an ergative agreement system. Because Kavalan and Central Cagayan Agta exhibit ergativity in both their nominal case-marking system as well as in their verbal agreement system, I concluded that both Kavalan and Central Cagayan Agta have a pure ergative actancy system.

In addition to the discussion of transitivity and actancy structure, I also provided a detail discussion of constraints that determine the relative order of pronouns in Squliq Atayal and Dibabawon Manobo.

The order of pronouns in Squliq Atayal has been previously described as solely determined by the PERSON hierarchy (either $1 > 2 > 3$ or $2 > 1 > 3$). However, as I have shown in section 5.2.2, PERSON alone CANNOT adequately account for the pronominal order facts in Squliq Atayal. Instead, it should be used in conjunction with other constraints. I proposed a set of three constraints that are required to adequately account for the order of pronominals in Squliq Atayal.

As for the order of pronominals in Dibabawon Manobo, I provided a set of rules that appear to better account for the facts than those appearing in previous descriptions of the language.

The categorical status of pronominal monosyllabic forms, which are commonly analyzed as “determiners” in previous analyses, was a focus of discussion for each of the languages in the case studies. I showed that some of the pronominal monosyllabic forms

are “AUXILIARY NOUNS” that carry the feature [+extension], that is, nouns that require a dependent predicate or a dependent complement clause. Specifically, in Squaliq Atayal, at least two of the pronominal forms, *quʔ* and *squʔ*, might be auxiliary nouns, at least in some cases. In Central Cagayan Agta, all the pronominal monosyllabic forms are auxiliary nouns, while in Dibabawon Manobo, at least two of the pronominal forms, *to* and *kan*, are auxiliary nouns. As for Kavalan, in the textual data that I examined, there is no single instance of the pronominal monosyllabic forms that is followed by an element that is unlikely to be a noun. It is still uncertain whether these forms might also be auxiliary nouns in Kavalan.

8.2 DIRECTIONS FOR FUTURE RESEARCH

Having summarized the discussion in previous chapters, I now suggest directions for future research.

This study provides a small-scale preliminary comparison of the syntactic typology of only four of the Formosan and Philippine languages. Although the details of the syntax differ among these four languages, they are similar in two respects. First, semantic properties correlate with morphosyntactic manifestations of transitivity in all four languages. That is, clauses exhibiting high semantic transitivity are encoded grammatically (i.e., morphologically and syntactically) as transitive. Second, they all exhibit an ergative actancy structure. The fact that they all have an ergative actancy structure might suggest that most, if not all, so-called Philippine type languages might

also have an ergative actancy structure. Further studies on the actancy structure of other Philippine type languages are needed to verify this claim.

Moreover, as discussed in Chapters 4–7, the constraints that determine the relative order of full noun phrases and pronominals in these four languages differ from one to another. For example, in Atayal, nominative full NPs tend to occur clause finally. However, in Central Cagayan Agta and Dibabawon Manobo, the agent tends to precede the theme regardless of the construction type in which they occur. Also, the relative order of pronominals can be determined by phonological factors in Atayal. However, in other languages, phonological factors are not relevant to the order of pronominals. It will be interesting to conduct a survey of word order constraints (for both full NPs and pronominals) to see what factors might condition the relative order of full NPs and pronominals in other Philippine type languages.

Furthermore, I have shown in Chapters 4–7 that at least some of the prenominal monosyllabic forms in Atayal, Central Cagayan Agta, and Dibabawon Manobo might be “AUXILIARY NOUNS” that carry the feature [+extension], that is, nouns that require a dependent predicate or a dependent complement clause. It will be interesting to conduct a survey of the prenominal monosyllabic forms in other Philippine languages to see whether the “auxiliary noun” analysis proposed by Reid (2002b) is applicable to other Philippine type languages.

APPENDIX 1

SOURCES FOR INFORMATION USED IN SECTION 3.2.2

A. Formosan Languages

Formosan languages (general): Ross (1995)

Tsouic languages (general): Tsuchida (1976)

Amis, Central: Fey (1986); Wu (1994, 2000)

Amis, Nataoran: T. Chen (1987)

Atayal, Squliq: Egerod (1965, 1966, 1978); Huang (1993); Rau (1992)

Atayal, Cʔuliʔ (Mayrinax): Huang (1995), Huang (2000a, 2000b)

Basay: Li (1999)

Bunun (Isbukun): H. H. Lin (1996); Zeitoun (2000a)

Bunun (Takbanuað): Jeng (1977)

Kanakanabu: Tsuchida (1976)

Kavalan: Y. L. Chang (1997, 2000a)

Paiwan: H. C. Chang (1992, 2000); C. J. Lin (1992)

Pazih/Pazeh: Blust (1999b); Li and Tsuchida (2001)

Puyuma: Huang (2000c); Tan (1997); Teng (1997)

Seediq/Sedik: Asai (1953); Y. L. Chang (1997, 2000b); J. H. Chen (1996); Holmer
(1996)

Siraya: Adelaar (1997)

Saaroa: Tsuchida (1976)

Saisiyat: Yeh (1991, 2000)

Thao: Blust (1998b, 2003a, 2003b); Huang (2000d)

Tsou: Tsuchida (1976); Tung (1964); Zeitoun (1992, 2000b)

B. Philippine Languages

Philippine languages (general): Conant (1911, 1912); Reid (1973)

Bashiic/Batanic languages: Tsuchida et al. (1989)

Central Cordilleran languages (general): Reid (1974, pers. comm.)

Northern Cordilleran languages (general): Tharp (1974a)

Southern Cordilleran languages (general): Himes (1998)

Central Philippine languages (general): Zorc (1977); Jason Lobel (pers. comm.)

Mangyan languages: Barbian (1977)

Manobo languages (general): Elkins (1963); Harmon (1977)

Agta, Casiguran Dumagat: Headland and Headland (1974)

Agta, Central Cagayan: P. Healey (1960); Mayfield (1987)

Agutaynen: Quakenbush (1999)

Aklanon: de la Cruz and Zorc (1968)

Alta, Northern: Reid (1987; 1991)

Alta, Southern: Reid (1987; 1991)

Arta: Reid (1989)

Atta: Lusted et al. (1964); Whittle and Lusted (1963)

Babuyan: Tsuchida et al. (1989)

Balangao/Balangaw: Shetler (1976)

Bikol: Mintz (1971, pers. comm.); Jason Lobel (pers. comm.)

Binukid: Post (1992)

Blaan/Bilaan, Koronadal: Abrams (1961, 1963, 1970); Dean and Dean (1955)

Blaan/Bilaan, Sarangani: Rhea (1972)

Boholano: Zorc (1977)

Bontok, Central: Reid (1964)

Bontok, Guinaang: Reid (1992, pers. comm.)

Bontok, Kadaklan/Eastern: Fukuda (1997)

Bontok, Talubin: Reid (pers. comm.); Kikusawa and Reid (2003)

Cebuano/Sebuano: Wolff (1972)

Ga'dang/Gaddang: Troyer (1960, 1966); Walrod (1976)

Hiligaynon/Ilonggo: Wolfenden (1971)

Ibaloy/Inibaloi/Nabaloi: Ballard (1974); Himes (1998)

Ibanag: Tsuchida et al. (1989)

Ifugao/Ifugaw, Batad: Newell (1993)

Ilokano/Ilocano: Vanoverbergh (1955); Rubino (2000)

Ilongot: Himes (1998)

Inati: Pennoyer (1986-1987)

Isnag/Isnag: Barlaan (1975, 1977, 1999)

Itawis/Itawes: Natividad and Solomon (1970)

- Itbayat/Itbayaten: Yamada (2002)
- Ivatan, Central: Reid (1966)
- Ivatan, Southern: Hidalgo and Hidalgo (1971)
- Kalinga, Guinaang: Gieser (1987)
- Kalinga, Limos: Ferreirinho (1993)
- Kalinga, Upper Tanudan (Brainard 1985, 1991)
- Kallahan, Keley-i: Hohulin and Hale (1977); Himes (1998)
- Kallahan, Kayapa: Himes (1998)
- Kankanay, Northern: Porter (1979)
- Kapampangan: Forman (1971); Mirikitani (1972)
- Karao/Karaw: Brainard (1994a, 1994b, 1996, 1997, 2003)
- Leyteño: Zorc (1977)
- Mag(u)indanao/Magindanaw: E. Lee (1964)
- Mamanwa: H. Miller (1969, 1973); J. Miller (1964); Miller and Miller (1976)
- Manobo, Agusan: Schumacher (1986); Weaver and Weaver (1964)
- Manobo, Ata: Austin (1966); Morey (1964)
- Manobo, Blit: Reid (1993)
- Manobo, Cotabato: Johnston (1975); Kerr (1965, 1988)
- Manobo, Dibaba(w)on: Barnard and Forster (1954); Forster (1964, 1970); Forster and
Barnard (1968, 1987)
- Manobo, Ilianen: Brichoux and Brichoux (1977)
- Manobo, Kagayanen: Harmon (1977); Pebley (1998, 1999)

Manobo, Sarangani: C. DuBois (1976)

Manobo, Tasaday: Reid (1993)

Manobo, Western Bukidnon: Elkins (1963, 1968, 1970)

Mansaka: Svelmoe and Svelmoe (1974, 1990); Thomas (1958)

Mapun: Collins et al. (2001)

Maranao/Maranaw: McKaughan and Macaraya (1967)

Masbatenyo: Wolfenden (2001)

Naturalis: Zorc (1977)

Pangasinan: Benton (1971); Himes (1998)

Sama Bangingi: Gault (1999a, 1999b, 2002)

Sama (Pangutaran Island): Walton (1986)

Sambal, Botalan: Antworth (1979)

Sambal, Tina: Agagas et al. (1978); Bautista and Goschnick (1978)

Sambal, Kakilingan: Yamashita (1992)

Sinama, Manuk Mangkaw: Akamine (1996, 2002)

Sorsogon/Sorsoganon: Sheila Zamar (pers. comm.)

Subanen, Sindangan: Arms (1996)

Surigaonon: Zorc (1977)

Tagbanwa, Aborlan: J. Hussey (1966); S. Hussey (1965)

Tagbanwa, Kalamian/Calamian: R. Aguilar and Ruch (1978); T. Aguilar and Ruch
(1978); Ruch (1974)

Tagalog: Schachter and Otanes (1972); De Guzman (1978); Sheila Zamar (pers. comm.)

Tausug: Hassan et al. (1994); Rubino (pers. comm.)

Tboli/Tagabili: Forsberg (1992); Lindquist et al. (1959); Porter (1977)

Waray (Waray): Wolff and Wolff (1967); Rubino (2001)

Yakan: Behrens (2002); Brainard and Behrens (2002)

Yami: Asai (1936); Ho (1990, 1993)

Yogad: A. Healey (1958); Davis et al. (1998)

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