A Newly Discovered Blade Tool Industry from the Central Philippines

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With the aid and advice of one of the most knowledgeable amateur archaeologists in the Philippines, Attorney Romualdo Mendiola of Catbalogan City, Samar, the authors were able during the spring of 1969 to survey and excavate sites in the Catbalogan area that produced a lithic industry characterized by microblade tools. These materials have been named the Buadian industry, after the island on which the type sites are located. Since the analysis of the industry is still going on and will continue for some time, the present note has as its purpose the announcement of the discovery of this important industry. At the same time, we wish to report some of our tentative conclusions about it.

So far, we have located the Buadian industry on a number of small islands in the southern Samar Sea centering upon the islands of Buad and Daram (lat. 11° 40' N, long. 124° 45' E). Our collection contains examples from all of the islands surveyed with the exception of Daram. Buadian tools from Daram, however, are in the collection of Mendiola and were studied by us. Since the bulk of our work was confined to Buad Island itself, we will limit our discussion of the industry to the materials from there.

The materials recovered consist of small blade and flake tools, cores, and debitage (Pls. I–III). At present over one thousand tools have been cataloged, and the final number may well be substantially larger. The majority of the tools were made upon flakes produced by a blade technique. Judging from their modal dimensions as we now know them, we think the materials may be further classified as a microblade industry, as that term is used by some Asian, European, and Canadian archaeologists (Aso 1965: 161; Taylor 1961: 425–426). It should be pointed out, however, that the small size of the Buad tools may not be a culturally

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significant factor, but rather a function of regional variability and scarcity of raw materials in the Catbalogan region, since a complex of similar appearance but with much larger blade tools seems to exist in the area between Catbalogan and Catarman on the large island of Samar. In any case, most of the blade tools from all of these areas are made from a caramel-colored cryptocrystalline rock, one source of which is the limestone formations along the Candacan River 20 km east of Catbalogan.

In future reports, a strictly descriptive classification of the tools will be presented, but for the present we must necessarily talk of them in terms of traditional functional categories. As of this writing we can say that the following tool types have been identified: knives with and without backing; scrapers of the end, side, and notched varieties; borers; single and multiple blow burins; gravers; and samtik. Backing that is found on both knives and borers is of three kinds: natural or cortex, retouch, and burin blow. Samtik are tools or fragments of tools that were used by the modern inhabitants of Buad as part of a flint and steel strike-a-light. Among the knives are glossed blades that are the highlight of the collection. Over one hundred and fifty of these have been cataloged so far. The majority have a single glossy area on the dorsal surface along one edge. Some, however, show gloss along both dorsal edges. When such a gloss is present, a narrower glossy area will inevitably be found on the adjacent ventral surface. The characteristic features of the gloss are in accord with the descriptions of what has been called sickle gloss or corn gloss by a number of authors (Semenov 1964: 113; Witthoft 1967: 388). In other words, these blades seem to have been used in some way for the cutting of grass-type plants. Whether or not the grasses involved were cereals (e.g., rice) is a problem to be investigated further. Backing of various kinds is also found on these blades and many of them had been sharpened or reworked or both into other tool types after their gloss had been laid down. What has been said of the blade tools here largely holds for the small number of flake tools recovered; they can be categorized with the same terms and in all probability were used in a similar fashion.

At this time there is no direct evidence that either ground-stone tools or pottery are associated with the Buadian industry. Ground adzes of various forms have been found in small numbers on the surface of Buad and the adjacent islands. Similarly, sherds of late-appearing types of earthenware and late export porcelains are also found on the islands' surfaces. In some instances, Buadian tools are found with the earthenware and porcelains, and the question of the stratigraphic relationship of all these items is raised. This stratigraphic relationship is of extreme importance since, for reasons to be discussed later, the bulk of our materials are surface finds.

Controlled excavations of limited extent were carried out at two locations on Buad Island. In these excavations the soil stratigraphy of the island was found to have been affected by two factors: (1) eustatic movements possibly during post-Pleistocene times and (2) severe erosion of the thin topsoil after deforestation in very recent times. Thus, all over the island, the surface and upper soil layers yield mixed deposits of Buadian tools, ground tools, ceramics, and other items of even more recent origin. The lower layers down to the shallow bedrock, on the other hand, appear to contain only Buadian materials. Because of this fact, we conclude that the Buadian industry predates the ground tool manifestations. Most certainly it predates all of the ceramic remains on the island. (In our surveys, no subsurface sites containing ground-stone tools could be located. The earthenware seen on the islands did not include any types that could be classed as either neolithic or iron-age in date when compared with such materials excavated by Hutterer in central Samar.)
Plate I  a, Sawankalok celadon sherd; b, Middle Ming blue and white sherd; c, Ching gray and white sherd. Bottom: sampil, Buadian flints with heavy irregular retouch that may have been used by the local people as part of a flint and steel during World War II.
Plate II  a, core, B-2256, ht. 3.9 cm; b, core, B-2235, ht. 3.2 cm; c, core, B-2241, ht. 2.8 cm; d, core, B-2232, ht. 6.2 cm; e, core, B-2248, ht. 5.1 cm; f, core, B-2294, ht. 3.4 cm.
Plate III  

A, glossed blade, cortex back, broken; B, glossed blade, broken; C, glossed blade, cortex back, broken; D, glossed blade, byproduct, broken; E, glossed blade, whole; F, glossed blade, backed, broken; G, glossed byproduct, broken; H, glossed byproduct, broken; I, glossed blade, thick, irregular, broken. Arrows point to central portion of gloss area.
It should be reiterated at this point that the majority of the tools in our collection were surface recoveries—owing to the fact that our work was of a preliminary nature designed to explore the archaeological possibilities of the area, given the limited resources we could muster. Nevertheless, the little excavation that was done does help us to begin to understand the complex geological and cultural history of the island. Fortunately, the excavations also produced carbon materials sufficient for at least three radiocarbon dates. On 13 July 1970, one radiocarbon date was received: GaK-2871—880 ± 100 B.P., based on a Libby half-life of 5570 years. Other materials will be processed as soon as money can be found to cover the expenses involved. During the interim, the analysis of the materials will continue, and we hope that a fuller report will be published in the Philippines in the near future. (Because of the initial involvement and continuing interest in this work by Divine Word University, much of our material is scheduled for publication in its journal, Leyte-Samar Studies.)

Two glossed blades were recovered from disturbed deposits in Panhulugan II cave on the Basey River, Samar, by Hutterer in 1968. There is also one glossed blade, a surface find from northern Mindanao, in the museum collection of San Carlos University in Cebu City. We would appreciate hearing from anyone having unpublished information on similar materials from Southeast Asia, particularly the glossed blades, as we have been unable to locate any other occurrences of these tools in the available regional literature. The authors should be reached at this address: D. J. Scheans, Anthropology, Portland State University, Post Office Box 751, Portland, Oregon 97207, U.S.A.*

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