New Knowledge: Findings from the Catalogue of Endangered Languages ("ELCat")

Lyle Campbell, Raina Heaton, Nala Lee, Eve Okura, Sean Simpson, Kaori Ueki, John Van Way
Goal: To report on findings from *The Catalogue of Endangered Languages* (ELCat) to date – on new knowledge produced by the Catalogue.

We ask, did you know?

(1) Over 3,000 languages are endangered (3176, 46%).

(2) 639 languages are extinct – 227 of known extinct languages became extinct recently, since 1960 (35.5% of all extinct languages, 9.2% of all languages).

(3) Whole language families are extinct – all the languages of 100 families are gone, from the c.420 language families – 24% of the linguistic diversity of the world has been lost.
**Need for The Catalogue of Endangered Languages:**

The endangered languages crisis is one of the most important problems facing humanity today, posing moral, practical, and scientific issues of enormous proportions.

**ELCat goals:** to provide a definitive, authoritative, and up-to-date resource on the endangered languages of the world.

**Produce new knowledge.**
Provide resources for communities whose languages are in danger. Supply information missing in other sources.
Correct errors (misidentification of languages, missing languages, languages that are not real or distinct from other languages, classifications of languages).
Update and correct information (number of speakers, location, etc);
Provide degree of endangerment scale, and documentation index.

Provide this information in an accessible, updatable, sustainable form.
Promote public awareness, foster support, increase resources, and inform the public and scholars alike.
Catalogue of Endangered Languages Project

Supported by a National Science Foundation grant (collaborative University of Hawai‘i Mānoa and Eastern Michigan University), website constructed by Google.org at www.endangeredlanguages.com.

ELCat is directed by Lyle Campbell (UHM), and Helen Aristar-Dry and Anthony Aristar (LinguistList, EMU).

University of Hawai‘i at Mānoa is responsible for the languages of the Americas, Asia, the Caucasus, Europe, and the Pacific, for the Endangerment Scale and for the Need for Documentation Index (see poster).

EMU is responsible for programming, technical aspects, bibliography management, and for the languages of Africa and Australia.

Team of Graduate Research Assistants.
What is an endangered language? (How does a language get into ELCat?)

ELCat criteria (see the Language Endangerment Scale):

Absolute number of speakers

Intergenerational transmission (are children learning the language?)
   Age of youngest speakers.

Declining numbers of speakers.

Declining domains of language use.

Number of speakers relative to total number of the ethnic population.
<table>
<thead>
<tr>
<th>Level of Endangerment</th>
<th>5 Critically Endangered</th>
<th>4 Severely Endangered</th>
<th>3 Endangered</th>
<th>2 Threatened</th>
<th>1 Vulnerable</th>
<th>0 Safe</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intergenerational Transmission</td>
<td>5 Few speakers, all elderly.</td>
<td>4 Many of the grandparent generation speaks the language.</td>
<td>3 Some of child-bearing age know the language, but do not speak it to children.</td>
<td>2 Most adults of child-bearing age speak the language.</td>
<td>1 Most adults and some children are speakers.</td>
<td>0 All members of community/ethnic group speak the language.</td>
</tr>
<tr>
<td>Absolute Number of Speakers</td>
<td>5 1-9 speakers</td>
<td>4 10-99 speakers</td>
<td>3 100-999 speakers</td>
<td>2 1000-9999 speakers</td>
<td>1 10,000-99,999 speakers</td>
<td>0 &gt;100,000 speakers</td>
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<tr>
<td>Speaker Number Trends</td>
<td>5 A small percentage of members of community/ethnic group speaks the language; the rate of language shift is very high.</td>
<td>4 Fewer than half of members of community/ethnic group speak the language; the rate of language shift is accelerated</td>
<td>3 About half of members of community/ethnic group speak the language; the rate of language shift is frequent but not rapidly accelerating</td>
<td>2 A majority of members of community/ethnic group speak the language; the numbers of speakers is gradually diminishing</td>
<td>1 Most members of community/ethnic group are speakers; speaker numbers are diminishing, but at a slow rate</td>
<td>0 Almost all members of community/ethnic group speak the language; speaker numbers are stable or increasing</td>
</tr>
<tr>
<td>Domains of Use of the Language</td>
<td>5 Used only in very few domains, (e.g., restricted to ceremonies).</td>
<td>4 Language is being replaced even in the home.</td>
<td>3 Used mainly just in the home; no literacy or education programs in the language.</td>
<td>2 Used in non-official domains; shares usage in social domains with other languages.</td>
<td>1 Used in all domains except official ones (i.e., government and workplace).</td>
<td>0 Used in all domains (e.g. government, media, education and the</td>
</tr>
</tbody>
</table>
ELCat’s intended audiences and users

Funding agencies who want to make informed decisions: Scholars and funding agencies need up-to-date information on number and location of speakers, and on language classification, in order to deploy resources effectively; it is important to know about what dictionaries, grammars, and texts already exist, and about documentary projects.

Linguists and students interested in choosing languages for documentation or revitalization work.

Communities whose languages are at risk.

Scholars in other disciplines, especially those concerned with culture, history, and ecology.

The general public (to raise awareness of problems and needs).

Educators at all levels.

Media personnel.
ELCat provides multiple sources:
Information about the languages (status, location, affiliation, etc.)

<table>
<thead>
<tr>
<th>Speaker number</th>
<th>Speaker number text</th>
<th>Intergenerational transmission</th>
<th>Speaker number trends</th>
<th>Domains of use</th>
<th>Source</th>
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<tr>
<td>Edit 100-999</td>
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<td>(Tryon 2007)</td>
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<td>Edit</td>
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<td>(Bowern 2011)</td>
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New Knowledge: What have we learned so far from ELCat?

Known knowns (in Donald Rumsfeld’s terms):

(1) The evidence from the Catalogue shows that 3176 languages (currently) of the world’s c.6909 are endangered (46% of all languages), based on the precise criteria of ELCat. This 46% is near to the oft-cited 50% scenario of languages expected to become extinct or doomed by the century’s end (but far from the 90% worst-case scenario), but the date assumed for this is misleading.
(2) Languages with fewer than 10 speakers:
Some 457 have fewer than 10 speakers (14% of endangered languages, nearly 7% of all languages). This figure is relative.

Sources agree that 203 have fewer that 10 speakers; another 91 are reported variously as having no remaining speakers or having fewer than 10 speakers -- total: 294 languages.

Sources for another 113 vary, some listing fewer than 10 speakers, others more. Total: 407 languages probably with fewer than 10 speakers. (More?, languages for which we have no estimate of speaker numbers.)

Sources agree that another 50 languages in ELCat have no know speakers ("extinct"), included in the Catalogue because of ongoing revival efforts. Total ELCat languages with fewer than 10 speakers: 457 (note 141 may have no speakers).

If these 50 are removed, the total of endangered languages is c.3126, where 407 have fewer than 10 speakers: 13% of all endangered languages have fewer than 10 speakers (6% of all languages in the world).
(3) **639** of known languages are already **extinct** or have no known native speakers (languages known to have existed; **9.2%** of all languages).

(4) Of these **639** extinct languages, **227** became **extinct recently**, since 1960 (**35.5%**); **383** became extinct before 1960; for **29** the date is not clear. This demonstrates concretely that the rate of language extinction has become much more highly **accelerated** in recent times, as is often claimed.
(5) **Important corrective:** The frequently repeated claim that 1 language goes extinct each 2 weeks is **not supported.** ELCat finds that on average only .36 of a language per month becomes extinct, i.e. about 1 each 3 months, or 4.3 languages per year, and this is true for all periods of time in recent years.

These losses are still horrendous, for all the familiar reasons. There is no need to continue to repeat the inaccurate claim, which ultimately will have negative consequences -- the list of recently extinct languages is **sufficiently shocking** for anyone. The list of languages with fewer than 10 speakers, probably all of which will soon be extinct (if revitalization efforts do not succeed), is more than enough to **confirm the ongoing crisis** of language loss.
(6) **Whole language families** are gone –

All the languages of **100** families (including isolates) are extinct, from the c.420 language families – **24%** of the **linguistic diversity** of the world has been lost.

**28** of these 100 extinct language families became extinct since 1960 (28%).

This confirms the common claim of significant on-going loss of language diversity, as well as of highly **accelerated** language loss in recent times.
(1) **Uncontacted** groups: In Brazil there are 42 “uncontacted isolated indigenous groups (Instituto SocioAmbiental 2011); FUNAI ([www.funai.gov.br](http://www.funai.gov.br)) counts 55.

Others: Peru 15, Bolivia 5 (8?), Colombia 3, Ecuador 1, Guyana 1. Brackelaire: more than 60 isolated groups in South American countries.

(2) The many languages that have **scant** if any **documentation**.
(3) For 332 languages in ELCat, the number of speakers is “unknown,” 10.5% of its 3176 endangered languages (4.8% of all languages). Ethnologue lists 277 languages with unknown number of speakers (4% of all languages).

(4) The sources are out of date and/or are inaccurate for many languages.

(5) For many we do not know:
   The age of the youngest speakers;
   The domains in which the languages are used;
   Whether children are learning the language;
   Whether the number of speakers is declining.

(6) We do not know what ELCat will discover in the next 2 years; however, the goal is to fill in as much of the missing information as possible and to correct errors in existing sources.

Join in. Let’s address the unknowns and improve the information about the knowns – ELCat’s goals. Please send in suggested changes wherever needed.
Conclusions

We side with Copernicus:

“To know that we know what we know, and to know that we do not know what we do not know, is true knowledge.”

As the Catalogue of Endangered languages moves into phase II, its goal is to achieve true knowledge by obtaining information on the endangered languages that we know that we do not currently known well enough and thereby produce new knowledge relevant to ELCat’s several audiences and how endangered languages are talked about generally. ELCat is doing this now.

Join in. Let’s address the unknowns and improve the information about the knowns – ELCat’s goals. Please send in suggested changes wherever needed.
Mahalo nui loa
(Thanks)!