

Evidentiality in Athabaskan

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Abstract

This paper is a typological survey of grammatical evidentials across the Athabaskan language family. It is shown that expressions of evidentiality differ widely from language to language. There are languages in which evidentiality is poorly grammaticalized (such as Chiricahua) to very full evidential systems (in Hupa and San Carlos Apache). Explanations for this difference must be sought in the area of contact features and general typological development, rather than trying to look for genetic explanations for the difference in evidential systems between languages. This is exemplified with two cases, (a) the morpheme /la/ 'inferential', which may be traced back to a verb 'to be', a well-known grammaticalization source; (b) the origin of visual evidentials, which derive from deictic sources.

1 Introduction

Evidentiality, the study of source of the information markers, is an area that in the last couple of years has attracted an increasing amount of attention, both from a descriptive point of view and a theoretical one. This paper surveys the ways in which evidentiality is marked in the Athabaskan family with attention to the meaning and areal distribution of evidential morphemes.

Even though evidentiality has for the longest time been viewed as an "exotic" phenomenon that only occurs in languages like those spoken in the Americas, this situation has started to change as more and more is being discovered about how evidentiality works. It is now generally accepted that evidentiality, in one form or another, is a category which occurs in most, if not all, areas of the world (see de Haan (2005)).

The viewpoint that evidentiality is a rather exotic phenomenon has led certain scholars to take evidentiality as a fundamental difference in how people view the world. Nowhere has this been more forcefully expressed than in (Whorf, 1956, p.85), and the passage is worth quoting in full:

Why, for instance, do we not, like the Hopi, use a different way of expressing the relation of channel of sensation (seeing) to result in consciousness, as between 'I see that it is red' and 'I see that it is new?' We fuse the two quite different types of relationship into a vague sort of connection expressed by 'that,' whereas the Hopi indicates that in the first case seeing presents a sensation 'red,' and in the second that seeing presents unspecified evidence from which is drawn the inference of newness. If we change the form to 'I hear that it is red' or 'I hear that it is new,' we European speakers still cling to our lame 'that,' but the Hopi now uses still another relater and makes no distinction between 'red' and 'new,' since, in either case, the significant presentation to consciousness is that of a verbal report, and neither a sensation per se nor inferential evidence. Does the Hopi language show here a higher plane of thinking, a more rational analysis of situations, than our vaunted English? Of course it does. In this field and in various others, English compared to Hopi is like a bludgeon compared to a rapier.

Although this passage may seem rather out-of-date, this point of view is surprisingly common even today. It is for instance not uncommon to find the opinion that evidentials act as a kind of truth-serum, in other words, languages that have a well-developed system of evidentials will have no way of telling lies. Such claims, while persistent, are rather far-fetched. In recent years, evidentiality has been found to play a greater role in languages than previously assumed and if we wish to consider evidentiality from a cross-linguistic, typological perspective, we need to concentrate on linguistic argumentation and not on extra-linguistic feelings of purported superiority.

The focus of this paper will be the Athabaskan language family, one of the families traditionally considered to be lacking in grammaticalized evidentials (see e.g., the survey of evidentials in Sherzer (1976)). One purpose of this paper is to challenge this view and to show that, as in any language family, grammaticalized evidentials do occur. The data were for the most part taken

from published sources. This was done to highlight the fact the grammatical descriptions of evidentiality in these languages (and in other language families as well, of course) contain many gaps and point to open questions which need to be resolved before a thorough description of evidentiality in Athabaskan can be obtained. Consequently, the scope of the present paper is preliminary in nature. Nevertheless, the current findings do agree with crosslinguistic typological patterns.

2 Preliminaries

The definition of evidentiality I will be using here is: evidentiality is the grammaticalized marking of the source of the information contained in the sentence. Commonly, the different sources of information are divided into two groups: those markers that show that the information has been obtained by the speaker (examples are *visual* and *auditory* evidence: the speaker has seen or heard the action or event described in the sentence) or that the information has come to him/her through some other means (examples are *inference*, the information is obtained through deduction, and *quotative*, when the information has been relayed to the speaker by another person). These two groups are usually referred to as *direct* and *indirect* evidentials, respectively. Not all different evidential categories are expressed in all languages.

Evidential categories can be absent in some languages or they can be merged with other categories. For instance, evidentiality is commonly associated with epistemic modality as both involve speaker judgment in some way (see Palmer (1986) for arguments), but there may be good reasons for keeping the two domains distinct (see de Haan (1999) for arguments). In this paper, I am focusing solely on evidentiality and will disregard its interaction with other categories.

It was shown in de Haan (1999) that languages tend to grammaticalize indirect evidentials before they grammaticalize direct evidentials. Languages in general develop grammaticalized quotatives and inferentials before evidentials that mark direct, sensory, evidence. Although there are minor exceptions to this generalization, it appears to be fairly robust crosslinguistically, based on the data reported in de Haan (2005).¹ The explanation for

¹One such exception is Hualapai (Watahomigie et al., 1982), a Yuman language from Arizona, there are grammaticalized evidentials for direct evidence and for inferentials, but not for quotatives. The same has been reported for Hupa, see section 4 below.

this grammaticalization pattern is related to markedness: when someone is speaking it will normally be assumed the speaker has first hand evidentiary information, unless explicitly stated otherwise. Thus, indirect evidentiality is marked with respect to direct evidentiality and according to markedness theory will have to be marked overtly.

3 The Data

This section presents the evidential systems of the Athabaskan languages for which I have reliable sources. The languages are organized according to how many evidential levels the language has. Each of the following counts as a level: quotative, inferential, auditory, and visual. Thus, a language with only a grammaticalized quotative is a 1-level evidential language; a language with a quotative and an inferential a 2-level language, etc.

3.1 Uncertain Systems

From the data in published sources, it is not always possible to ascertain what kind of evidential system a given Athabaskan language has. This is for instance the case with Chasta Costa (Sapir, 1914). The morpheme *-la* is probably inferential,² but there is no way to get a complete picture from the data provided:

- (1) txas-xé-la
'(evidently) rich'

(Sapir, 1914, p.333)

It is unclear whether *-la* is used only to denote inference, or whether it can be used for quotation as well.³

Mattole, another Pacific Coast language, shows another common problem (Li, 1930). The evidential morpheme is a prefix: *-'a*, which is used chiefly "...to introduce a direct quotation ..." (Li, 1930, p.53), as in *'aclé* "I do it." It is unclear whether this prefix has been grammaticalized to the point

²We can base this not only on Sapir's translation, but also on cross-Athabaskan evidence, see section 4 below.

³In Dena'ina Athabaskan the cognate particle *tu* seems to be used for quotative purposes only (Holton and Müller, 2005).

where we would consider it to be a fully grammaticalized evidential, in this case a Quotative.

3.2 The 1-level Hierarchy

The 1-level hierarchy occurs in a number of languages. In Chiricahua Apache the morpheme *-naʔa* denotes a quotative (Hoijer, 1946b, p.67). Hoijer gives no examples, but it would appear that the suffix is obligatory. The same situation is also found in Galice, a Pacific Coast Athabaskan language. The enclitic form *-h^waⁿ* ‘so people say’ can be attached to various words in the sentence (Jacobs, 1968, p.183). There are no other evidentials listed. Another language that might show a 1-level system is Sarcee (Cook, 1984, p.35–36). There is a morpheme *-lâ* which according to Cook denotes inferentiality. An example is shown in (2):

- (2) $\gamma\bar{a}tc\grave{u}g\grave{u}d\grave{i}s\acute{a}l\bar{l}\bar{a}$
 ‘He trimmed it. [by inference]’

(Cook, 1984, p.36)

Sarcee would appear to contradict the universal tendencies, that there is always a quotative present in evidential systems. However, the data are not conclusive enough to make a definitive judgment. There are some hints that *-lâ* might be a quotative as well, as evidence by the following quote from Cook (1984, p.36): “. . . *-lâ* is most frequently used in narratives of past events” This is exactly the environment where we would expect quotatives to occur, to report on events in the past. If there is a quotative as well, Sarcee would be an example of a language with a 2-level evidential hierarchy and would fit into the next section.

3.3 The 2-level hierarchy

A 2-level evidential hierarchy encompasses both quotative and inferential evidentials. There are two possibilities for such a system.

The first possibility is that one morpheme is used for both levels. This is exemplified by Hare Slave (DeLancey, 1990). There is one particle which is used for both quotative and inference. This particle is *lô* and its uses are shown in (3):

The second morpheme is *lá* which is most likely an inferential evidential. In the sentences with *lá* in Willie (1996), this morpheme is always accompanied by the combination *t'áá 'aaníí* which appears to be a combination marking that a given sentence is true. This combination means that "... an obligation has been realized or an assumption has proven to be false." (Willie, 1996, p.343). Examples are:

(5) a. 'ashkii t'áá 'aaníí k'íí taah yiyiilóóz lá
 boy just true horse water:to 3:3:led INF
 'The boy really did water the horse(s).'

b. Jáan t'áá 'aaníí diné nili lá
 John just true Navajo 3:be INF
 'John is really a Navajo.'

(Willie, 1996, p.343)

From the examples it would appear that *lá* has mirative as well as evidential interpretations (see footnote 3 on page 70).

Chipewyan is also an example of a language in which the quotative and inferential are expressed with different morphemes (Li, 1946; DeLancey, 1990, p.153). The quotative is represented by the suffix *-sni* 'it is said' (Li, 1946, p.421) while according to Goddard (1912), cited in (DeLancey, 1990, p.153) there are a number of related inferential morphemes, depending on the type of inference:

- (6) *-k'e, -hii k'e*⁵ "used to indicate that the act was discovered by traces or other evidence after it transpired"
-hii k'e la, -hii k'úl la "used with a statement of fact inferred from a succeeding fact or a result"

The two sets of morphemes appear to distinguish between physical inference and mental inference, although the difference is not always easy to make in practice.

⁵This morpheme is listed as *-hik'é* 'it is found' in Li (1946, p.421). In addition, there may be one other evidential morpheme: *-t'θe* 'it is heard' (Li, 1946, p.421). The semantic meaning of this morpheme is unclear. No data are given for this morpheme and it would appear to be another quotative.

3.4 The 3-level System

A 3-level system consists typically of the two indirect evidential levels quotative and inferential and a direct evidential. As far as the nature of this direct evidential is concerned, one of the following options is possible:

- A general sensory evidential, covering all direct senses
- A nonvisual sensory evidential, leaving the visual sense unmarked
- An auditory evidential leaving the visual unmarked, and the other sense are subsumed under the inferential
- A visual evidential, and all other senses are contained in the inferential

The only Athabaskan language for which I have data that appears to have such a system is Western (San Carlos) Apache. The following evidential morphemes are used in Western Apache (Edgerton (1963, p.121–122), see also de Reuse (2003)).

- (7) *tš' inì* “it is said” (“gossip”, Willem de Reuse, p.c.)
lék'è quotative
-ni? “action or condition in the past, known by participation or direct report”

In addition, there are inferential morphemes (Willem de Reuse, p.c.), of which *-lá* which is glossed as ‘surprise’ (in Edgerton (1963, p.122)) may be one. This would appear to be cognate with similar morphemes in Navajo and Sarcee. The difference between the two quotative morphemes is not entirely clear. Edgerton reports that *tš' inì* is used in myths and legends (Edgerton, 1963, p.121) but how this differs from the morpheme *lék'è* is not made clear. The direct evidential *-ni?* appears to function as a general sensory evidential, but the data are too limited to say this with complete certainty.

Hupa, a Pacific Coast Athabaskan language, also has a 3-level evidential system, but it differs from that of Western Apache and it is better discussed separately.

Language	Quotative	Inferential	Auditory	Visual
Chasta Costa	?	✓		
Chipewyan	✓	✓		
Chiricahua Apache	✓			
Galice	✓			
Hare Slave	✓	✓		
Hupa		✓	✓	✓
Mattole	✓			
Navajo	✓	✓		
San Carlos Apache	✓	✓	✓	✓
Sarcee	✓	✓		

Table 1: *Evidential categories in Athabaskan languages*

In addition, Hupa has morphemes to denote inferentiality. The reason Hupa is not a true 4-level evidential language is that Hupa appears to lack a grammaticalized quotative. While this is not a unique situation (see footnote 1), it is very rare. Quotative is usually the first evidential meaning to be grammaticalized. The reason might be that Hupa had a grammaticalized Quotative, and subsequently lost it.

The findings of this section are summarized in table 1, which shows the Athabaskan languages discussed here and their evidential categories (taking the most generous interpretation of the data above). The table should be read as follows: if the box is checked, there is an evidential morpheme for this meaning in the respective language. If there is no dividing line between checked boxes (as is for instance the case for the Hare Slave Inferential/Quotative), it means that there is one morpheme which represents both meanings. If the box is empty, it means there is no grammaticalized evidential for this meaning in the language under discussion.

From the table it can be seen that evidentiality manifests itself in different ways in the various languages. Even languages that are quite closely related can have different evidential hierarchies. This may be surprising at first but this situation is very common in general.

4 Discussion

The data presented in section 3 point to diverse origins of evidentials in Athabaskan. There are a number of possible explanations for the occurrence of evidentials in Athabaskan and they will be discussed here in turn.

4.1 Genetic Relation

From the wide variety of evidential morphemes it would appear to be unlikely that the entire variety of evidential systems demonstrated in section 3 above can be traced back to proto-Athabaskan. However, it may be possible that individual evidentials go back to the proto-language.

The most obvious candidate for a morpheme which can be traced back to proto-Athabaskan is the morpheme *-la* ‘inferential’ which occurs in one form or another in several languages from all branches of the Athabaskan family. The languages are Navajo, Chasta Costa, Sarcee and Dena’ina. In these languages, the morpheme is *-la*. This morpheme may also be part of other, more complex inferential evidentials. The Chipewyan morphemes *-hii k’e la*, *-hii k’ûl la* which denote mental inference obviously contain *-la*, as perhaps the Hupa form *-xōlan* ‘inference’ (Goddard, 1911, p.105). However, it is also possible that we are dealing with a general typological process and not with a genetic feature. This possibility will be explored in section 4.3 below.

4.2 Evidentiality As a Contact Feature

Quite often in contact studies evidentiality is considered one of the features that make up a Sprachbund. For instance, in his areal-typological investigation of North American Indian languages, Sherzer (1976) treats evidentiality as one of the possible features that are susceptible for borrowing in contact situations. Even though there are problems with his classifications (for instance, Sherzer only considers evidentials that are part of the verb, not those that are free morphemes or appear on other parts of speech), it is true that evidentiality as a category can be borrowed. This can be seen by looking at other well-known contact areas, for instance the Vaupès river region in the Brazil/Columbia border area (see Aikhenvald and Dixon (1998)). Evidentiality is one of the features that participate in the Sprachbund. There is also a

general “Eurasian” area (ranging from NW Europe to China) in which genetically unrelated languages have a grammaticalized direct—indirect evidential system (de Haan, 2005).

In the Athabaskan languages, the contact aspect of evidentiality shows up most clearly in the Pacific Coast Athabaskan language Hupa. This language shows a richer evidential system than other Athabaskan languages (with the exception of San Carlos Apache), and this is most likely due to contact with other evidential-rich languages in the area, such as the Pomoan languages like Kashaya Pomo (see e.g., Oswalt (1986)), and Wintu, a Penutian language (Pitkin, 1984). Both the Pomoan languages and Wintu have evidential systems of approximately the same complexity as Hupa.⁶ (However, unlike Hupa, these languages have grammaticalized forms for the quotative.) The evidential morphemes in Hupa appear not to be cognate with those in the Pomoan languages and Wintu, so direct borrowing is out of the question. However, the origins of the evidential morphemes in the individual languages point to similar typological strategies for creating grammaticalized evidentials. This will be further discussed in section 4.3b below with the example of visual evidentiality. The hypothesis is then that Hupa has a large evidential system due to its contact with neighboring languages that have similar (though not identical) systems.

Navajo with its 2-level system lies in an area where one and two-level systems are most prevalent. Neighboring languages with similar systems include Hopi, Jicarilla Apache, and several Tanoan languages. The only language in the area with a more extensive system is Acoma (Miller, 1965).

4.3 Typological Explanations

One of the tasks of linguistic typology is to find explanations for similar or identical phenomena in the world’s languages, especially if the phenomenon under investigation occurs in unrelated and/or areally separated languages. In the preceding discussion, several of these phenomena were encountered and in this section I will try to provide a typological explanation for two of them, namely the *-la* inferential morpheme and the languages that have a visual evidential.

a. The case of *-la* ‘inferential’

⁶The evidential system of Kashaya Pomo differs depending on the mood of the sentence (see Oswalt (1986)). In this paper, only the indicative evidentials are discussed.

As was mentioned in section 4.1 above, many Athabaskan languages have an inferential morpheme which is either *-la* or contains the morpheme *-la*. This could be due to the fact that a morpheme **-la* in proto-Athabaskan was used for the expression of inference, but there might be another reason for this phenomenon. Cook (1984, p.35) feels that the inferential morpheme *-là* in Sarcee goes back to a verb ‘to be’ (*yílà* ‘there was’). If this is true, and if the morpheme *-la* can also be traced back to a verb ‘to be’ in the other Athabaskan languages, then we are dealing with a path of development that has been attested in other, unrelated languages. Bybee et al. (1994, p.95–97) discuss the development from a complex construction with the verb ‘to be’ to an inferential construction in several languages in various parts of the world. If the above analysis can be substantiated, we can add the Athabaskan family to the set of languages that have grammaticalized inferential evidence with the verb ‘to be.’

b. Visual evidentiality

Only a handful of Athabaskan languages have grammaticalized a morpheme for visual evidence, namely Hupa and San Carlos Apache. Obviously the two languages are not in contact with one another so the development of a visual evidential in these languages has been an independent one.

In the case of Hupa, contact with other languages, especially Wintu, seems to have been instrumental in acquiring a visual evidential.⁷ The morpheme *-ye:ɣ* has a demonstrative origin (see example (8b) above) and in many languages we find a demonstrative visual evidential path. There is a similar development in Wintu.⁸ One of the visual evidential morphemes is *-ʔel*, glossed by Pitkin (1984, p.175) as a “demonstrative copula.” An example is shown in (10) below:

- (10) *c'a:wa-be:s-ile:*⁹
 sing-DUR-VIS
 ‘(I see/saw them) singing; singing they are/were.’

⁷For a fuller discussion on the development of visual evidentiality, see de Haan (2001).

⁸Wintu has several visual evidentials, deriving from different sources. The Pomoan languages use the other grammaticalization path, from tense/aspect to visual evidential (see de Haan (2001) for details). As we will see, San Carlos Apache used this path for developing a visual evidential.

⁹The morpheme *-ile:* is an allomorph of *-ʔel*.

The morpheme *-ʔel* contains the proximal demonstrative *-ʔE*, according to Pitkin (1984, p.175). If this is true, then Hupa and Wintu have used a similar path in grammaticalizing visual evidentiality, possibly under contact conditions.

The other Athabaskan language, San Carlos Apache, uses a different type of grammaticalization path, namely from a tense/aspect morpheme to a visual evidential. The morpheme *-niʔ/-nʔ* used for an “action or condition in the past, known by participation or direct report” (Edgerton, 1963, p.122) derives according to Willem de Reuse (p.c.) from a past tense morpheme. This is a plausible development, and one that is supported by crosslinguistic evidence. Not only do we find similar developments in the Pomoan languages, but also in the Eastern Tucanoan languages of the Brazil/Colombia border region, such as Tuyuca and Tucano, and, presumably, in many more places around the globe (see de Haan (2001) for details). San Carlos Apache developed a visual evidential apparently without any contact with other languages, so this development cannot be attributed to a contact phenomenon. Since it fits in nicely with established grammaticalization paths, the development of a past tense morpheme into a visual evidential must be viewed as a typological development.

4.4 Other Explanations

One factor that plays a major role in a typological study of evidentiality is the reliability of the data. For instance, in Chiricahua Apache the standard source (Hoijer, 1946b) only lists one evidential without any example sentences, *-naʔa* quotative. Is it the case that Chiricahua Apache really only has one grammaticalized evidential or is it true that we are dealing with an artifact of Hoijer’s research methodology (as was suggested to me by Willem de Reuse in personal communication)? Hoijer based his grammatical analysis on textual material and other evidentials (which do not really show up in texts of the type collected by Hoijer) might have been missed, or it could be that we are dealing with evidentials that are disguised as other functions. It is not always clear, for instance, if we are dealing with a visual evidential or with a past tense morpheme.

5 Conclusions

The preceding discussion has shown that the Athabaskan family is not deficient in evidentials but is about average in evidentials compared to other language families. Nevertheless, there is still plenty of work to be done. Native languages disappear at an alarming rate and the Athabaskan languages are no exception. If we want to get answers to the questions posed in this paper, a detailed semantic study needs to be done along the lines of DeLancey (1990) for Hare Slave.

While evidentiality is not one of the easiest areas of grammar to describe, more attention should be devoted to it in language descriptions and subsequent teaching programs. Its documentation is important not only for linguistic purposes, but also for language revitalization projects. To return to Whorf's quote from the introduction, while no person could think that with the loss of evidentials languages lose their "higher planes of thinking" or their rapiers, this loss does mean a significant impoverishment of the language. When a way of looking at the world is lost, we are all the poorer for it.