EVIDENTIALITY IN SOUTH ASIAN LANGUAGES

Elena Bashir
University of Chicago

Abstract. This paper explores the encoding of the semantics of evidentiality and indirectivity in some South Asian languages. In my analysis, evidentiality is related to the complex of overlapping categories involving (i) the source of information about an event or state and (ii) its acquisition by an observer/speaker. In some languages several of these notions are morphologically encoded; in others the categories are relatively "covert" and the expression of evidentiality is distributed (Aikhenvald's "scattered") throughout the grammar. The paper summarizes previously published data on inferential systems in Tajik Persian, Kalasha, Khowar, and Nepali, and presents new data on several other languages that have morphologically encoded inferentiality--Yasin Burushaski, three Nuristani languages, and Wakhi. Additionally, other inferentiality-marking strategies are discussed for a cluster of languages including Torwali, Pashto, Shina, and Kohistani, for Hindi and Urdu, and for a cluster of South Indian languages. Evidentiality is known to be highly susceptible to language contact effects Aikhenvald (2003:21-2) and Johanson (2000:81-2). The investigations reported in this paper confirm that evidentiality marking patterns fall into recognizable areal units and sub-units in South Asia as well. Evidentiality-encoding strategies are seen to group areally with clearly identifiable northern and southern clusters and a mixed area.

1 A cognitive model for evidentiality and indirectivity (inferentiality)

A cognitive model of event structure can unify and explain various specific manifestations of the categories of evidentiality and indirectivity (including mirativity).[1] Bashir (1993) explored this idea in the context of compound verbs; I now focus on evidentiality. This analysis is based on DeLancey's cognitively based model of an event as a vector having two endpoints, interpreted at the most general level as ORIGIN and TERMINATION (DeLancey 1985:47). This generalized schema underlies varying grammatical manifestations, depending on whether one focuses on the entities involved in an event, or on its logically or temporally sequential stages. Thus the ORIGIN and TERMINATION endpoints of the vector can be associated with the concepts AGENT and PATIENT, SOURCE and GOAL, or CAUSE and RESULT (DeLancey 1982:172). This is schematized below.

ORIGIN ->	EVENT - - >	TERMINATION
Temporal onset	Event/action	Temporal conclusion
Cause (e.g. act of volition)		Resultant state
Agent		Patient
Source		Goal

An event may impinge upon an observer/speaker's awareness at any point along its causal vector. He may become aware of an event from its ORIGIN, i.e. the stage of its cause or antecedent situation, as when a situation is anticipated, feared, predicted, or actively caused by him. If the observer/speaker has access to the ORIGIN end of an event vector or to the EVENT itself, the event will be reported with a direct form. If, however, he learns about an event only by observing its resultant state–the TERMINATION of the causal chain–the event will be encoded with an indirect form or strategy. This is the central insight underlying my analysis of evidentiality and inferentiality.

Differences in the point at which an event impinges upon an observer's awareness are grammaticized in many languages, for example Tibetan (1). (1-a) would be appropriate if the speaker is involved in planning the meeting, whereas (1-b) could be uttered by someone who had learned of the meeting second hand, as by reading a notice about it. "The use of *yod* indicates an assertion made on the basis of direct knowledge of the entire vector, while *'dug* indicates direct knowledge of the result but not of the cause." (DeLancey 1986:206) That is, the choice between *yod* or *'dug* depends on the impingement point of the causal vector with the speaker.

(1-a) *gza-spen-ba la   tsod-'du <u>yod</u>*
      Saturday   LOC meeting exist
      'We have a meeting on Saturday.'

---

[1]Plungian (2001:355) says that "the recurrent polysemy of admirative and inferential and/or quotative markers needs an explanation". Discussing mirativity, DeLancey (2001) has argued, citing languages like Hare (Athapaskan) which have a mirative marker apparently independent of evidentiality, that it is a category distinct from evidentiality. In my analysis, mirativity is one of the specific semantic effects that emerges when the observer/speaker has access only to the result end of an event vector.

(1-b) *gza-spen-ba la   tsog-'du 'dug*
Saturday   LOC meeting exist
'There's a meeting on Saturday.' (DeLancey 1986:206)[2]

Several parameters of the impingement of an event on a sentient observer/speaker correlate with its expression: (i) source: internal (endophoric) or external (sensory); (ii) time: past (old knowledge), present (new knowledge), future (presumption [necessary overlap here with epistemic modality]); (iii) directness: direct (first-hand sensory, well-established, hence speaker-internal) or indirect (second-hand, reported; inferred). Reported (hearsay) or inferred information is necessarily new. However direct sensory experience can also be new information; this situation gives rise to uniquely mirative semantics. Indirectly acquired information (hearsay, inference) is also frequently new (mirative); hence the overlap between the categories of indirectivity and mirativity.

2 Types of evidential systems

Aikhenvald and Dixon (2003:3) present a typology of evidential systems. Type I systems "state the existence of a source for the evidence without specifying it", and a statement marked for evidentiality is characterized "by reference to its reception by a conscious subject" (Johanson 2003:274). This type of evidentiality is therefore referred to as 'indirectivity' by Johanson (2000, 2003). Type II systems "specify the kind of evidence, be it visually obtained, based on inference, or reported information." Type II systems point to the ORIGIN of an event vector, while Type I systems focus on the TERMINATION.

3. Language data

3.1 Old Indo-Aryan (OIA)

The OIA verb system grammaticized the seen/unseen distinction. Deshpande (1981:62) concludes that in Panini's language the three preterital tenses were specified as in (2). The imperfect contrasted with the perfect in that the perfect was (to be) used when an action not witnessed by the speaker is reported.[3] The +/- seen distinction appears not to have existed in the non-past tenses.

(2)   <u>aorist</u>   <u>imperfect</u>   <u>perfect</u>
+ past   + past   + past
+ recent   - recent   - recent
+/- seen   + seen   - seen

In addition, a particle *kila* / *kira* was used in Sanskrit, Prakrit and the Pali Jatakas in senses which Emeneau (1969:244) gives as "report", "tradition", "traditional account", "general opinion, universal knowledge", "so it is heard", "as is reported", "as they say", and a secondary meaning of "irony". One example, of the traditional stories type, is given here as (3). Van Daalen (1988:11-12), analyzing Sanskrit and Prakrit texts, divides the uses of *kila/kira* into four disparate categories. However, Degener (1998:182) finds that *kila* functions in all cases as a reportative particle, seeing also in *kila* a clear mirative use and a possible historical link to Nepali *le* (see below).

(3)   *vyuSitāśva iti   khyāto babhūva   kila pārtivah*
VyuSitāśva QUOT called   exist(PERF).3s *kila* king
'There was of old, as the story goes, a king called VyuSitāśva.' [Mbh. 1.112.7] (Emeneau 1969:245)

3.2 Northern cluster

Previous research has shown that some modern IA languages–Kalasha, Khowar, and Nepali–grammaticize evidentiality in the verbal system. New work indicates that morphological inferentiality is also found in Wakhi, several Nuristani languages, and Yasin Burushaski.

3.2.1 Kalasha

In Kalasha and Khowar the old -*ta* participles took on the *parokSa* (unseen > inferential) value, while the finite preterite which developed from the aorist and imperfect retained the [+seen] specification. Thus in Kalasha and Khowar the basic [+/- seen] distinction is inherited from OIA, while a second stratum of inferential marking, accomplished with a past participle of 'become' (*birái* in Khowar, *huLa* in Kalasha) seems to be a later accretion.[4]

---

[2]My test sentence 'There is a meeting on Saturday' was elicited in order to make my results comparable to some degree with DeLancey's work.

[3]Cardona (2002) reaffirms Deshpande's conclusion, presenting textual evidence that the presence of the three-way distinction in the tense system described by Panini is also attested in Vedic literature.

[4]Khowar has been heavily influenced by Persian (Tajik) in many areas–lexis, syntax, and probably semantics. Turkic, with its robust indirectivity marking, may also have been important, since a ruling Chitrali dynasty came from Turkic-speaking areas. Also, until quite recently, Khowar has been in contact with Wakhi.

The basic tense-aspect forms are illustrated here with the 1st person sg. of *kárik* 'to do' (Bashir 1988a, b).

Non-past	
PRESENT/FUTURE-NON SPECIFIC (P/F-N-S) *a kár-im* 'I do, I will do'	
PRESENT/FUTURE-SPECIFIC (P/F-S) *a kár-im dai* 'I am doing, will do (at a specific time)'	
PRESENT PERFECT (P PERF) *a kai á-am* 'I have done'	

Past	
DIRECT	INFERENTIAL
PAST (PST-D) *a ár-is* 'I did.'	PST (PST-I) *a káda him* 'I did (reportedly, inadvertently.)'
PAST IMPERFECTIVE (PST IMPFV-D) *a kar-íman áy-is* 'I was doing.'	PAST IMPERFECTIVE (PST IMPFV-I) *a kar-íman ásta him* 'I was doing (reportedly.)'
PAST PERFECT (PST PERF-D) *a kai áy-is* 'I did, had done.'	PAST PERFECT (PST PERF-I) *a kai ás-ta him* 'I had done, did (reportedly.')'

    Past tense verb forms are obligatorily coded for the distinction between direct ("actual" in Bashir 1988a, b) and inferential (indirect) meaning. Direct subsumes such meanings as personally witnessed, or having long standing in one's conceptual repertoire, while inferential includes inference, new information, and hearsay. Present-tense forms do not have morphologically expressed inferential forms, but inferential counterparts are supplied by the addition of *huLa*, the past participle of *hik* 'to become'. When *huLa* appears in narration of directly experienced events, the meaning is mirative, i.e. that the speaker has just found out about (i.e. was not aware of before) the content of the assertion. Other specific pragmatic effects emerge, e.g. surprise, regret, or annoyance (Bashir 1988b:44). Contrastive examples follow for the past (4) and the present perfect (5). With first person agents, the inferential form gives a sense of unconscious, inadvertent, or mistaken action (5-b). This interaction effect of non-direct forms with first person has been noted for many languages. Additionally, in Kalasha specifically hearsay utterances involve a construction consisting of the infinitive of the verb expressing the semantic core of the assertion, and *ghõ'-an* 'they say' (6).

PAST - DIRECT
(4-a)   *õ'je-mí*   *par-á*
       now-EMPH go(PST-A)-3s
       'He just left.' (Bashir 1988b:37)
PAST - INFERENTIAL
(4-b)   *a*   *ayá a*   *ãgár Zot*   *káda*
       I(NOM) here come(PST-A)-1s fire already do(PST-I)-3s
       'I came here. (Someone) had already made the fire (unseen by me).' (Bashir 1988b:42)
PRESENT PERFECT - DIRECT
(5-a)   *a*   *põj So chaT jahás-una nisí á-am*
       I(OBL) 5   6   times plane-LOC sit(PRES PERF)-1s
       'I have flown (lit.'sat') in a plane five or six times.' (Bashir 1988b:41)
PRESENT PERFECT - INFERENTIAL (+ *húLa*)
(5-b)   *a*   *galatí kai á-am*   *húLa*
       I(NOM) mistake do(PRES PERF)-1s become(PST-I)-3s
       'I (just realized that I) have made a mistake.' (mirative) (Bashir 1988b:44)
(6)   *ne šik*   *ghõ'-an*   *mai putr*
       not be-INAN(INF) say(P/F-NS)-3p my son
       '(I hear/they say that) there isn't any, my son.' (Bashir 1988b:46)

3.2.2 Khowar

The Khowar verb system consists of marked inferential/indirect and unmarked direct forms. Its main forms are illustrated below for the third person singular of *korík-* 'to do'. (This analysis differs somewhat from Bashir (1988b).) In non-past tenses, inferential forms are constructed with an agent noun in *-ak* plus the PST-I form of *bik* 'be, become'. These forms are (partially) tense-neutral, in that they can apply to present, future, or past events. In forms built on the past participle, itself already marked as inferential, the *bik* 'become' forms add a mirative meaning.

DIRECT	INFERENTIAL
Non-past	
PRESENT/FUTURE, NON-SPECIFIC *korói* ' S/he does, will do.'	PRESENT/FUTURE/PAST *korák birái* 'It turns out that s/he does/will do; s/he does/will do/used to do.' (reportedly) (mirative)
PRESENT/FUTURE-SPECIFIC *koróy-an* 'S/he does, is doing, will do.'	
PRESENT PERFECT *korí asúr* 'S/he has done.'	PRESENT PERFECT *korí asák birái* S/he did, has done' (reportedly, mirative)
Past	
PAST *areér* 'S/he did.'	PAST *kardú* 'S/he did (unwitnessed).'
(PAST) PERFECT-1 *kardú ošói* 'S/he did, had done; would have done; was about to have done.'	(PAST) PERFECT-1 *kardú birái* 'S/he did, had done, has done' (reportedly, mirative).
PAST PERFECT-2 *korí asítai* 'S/he had done.'	PAST PERFECT-2 *korí astaái* 'S/he had done (unwitnessed, unwittingly.)'
PAST IMPERFECTIVE *koráu ošói* 'S/he was doing, was about to do.'	PAST IMPERFECTIVE-1 (Chitral, Torkhow) *koráwa birái* 'S/he (habitually) did, would do; was about to do (reportedly).' PAST IMPERFECTIVE-2 (Zondrangram) *koráu astaái* 'S/he was doing (reportedly, unexpectedly).'

Contrastive examples follow for the present/future (7) and the past tense (8).

PRESENT/FUTURE, SPECIFIC - DIRECT
(7-a)   *hasé pešáur-o-te   no bír-an*
      he   P.-OBL-DAT   not go(P/F-S.3s)
      'He is not going to Peshawar (known directly).'
PRESENT/FUTURE - INFERENTIAL
(7-b)   *pešáur-o-te   no boʏák birái*
      Peshawar-OBL-DAT not go(P/F-I)3s
      'He is not going to Peshawar (reportedly, new information).'
PAST - DIRECT
(8-a)   *hasé lahur-o-te   baʏái*
      he   Lahore-OBL-DAT   go(PST-A)-3s
      'He went to Lahore (first-hand knowledge).'
PAST - INFERENTIAL
(8-b)   *awá oreéi asít-am*
      I   sleep(PST PERF-D-1s)
      angáh hótam   ki   xúur kos   dúr-a   asteét-am
      awake become(PST-D)-1s I.saw.that other someone(OBL) house-LOC be(PST-I)-1s
      'I had fallen asleep. When I awoke I realized that I was in someone else's house.' (mirative)

    The category of inferentiality interacts with the pragmatic dimension of politeness. For example, in (9) the telephone rings and is answered by the younger of two sisters. The caller asks whether the addressee has a certain

thing he needs. The younger sister replies in the negative with a direct form and is admonished by the older sister to use an inferential form. The inferential form signals that the speaker didn't know at first that the thing was not present, and after looking for it, found it to be absent. The direct form, however, associates the speaker with direct/prior knowledge about the status of the object and perhaps unwillingness to give it.[5]

(9)   A: Question by caller ('Do you have x?')
        B: Reply by younger sister: *níki* ('No, we don't have it.')
        C: Admonition by older sister: *"no šak birái" ráwe* ('Say, "It turns out not to be here"'.)

3.2.3 Persian

Inferentiality in Persian is discussed most importantly in Windfuhr (1982), Lazard (1985, 1996, 2000), Utas (2000) and Jahani (2000). Afghan (Dari) Persian also displays grammaticized inferentiality, discussed in Perry (2000:230) and others. Tajik Persian is treated in Rastorgueva (1963) and Perry (2000, 2005). Since indirectivity is more highly developed in Tajik Persian, and since it has been in direct contact with Khowar and Wakhi, I summarize its evidentiality system briefly, following Perry (2005:227-234). Several tense forms are specified for indirectivity: the perfect, a non-witnessed durative, a non-witnessed past, and a non-witnessed past progressive. (i) The perfect indicative (past participle plus auxiliary 'be') functions both to indicate a resultant state and as a non-witnessed past or present. In the non-witnessed function, the perfect can indicate meanings of hearsay/quotative (10-a), mirative (10-b), and inference from observation of results. (ii) The non-witnessed durative consists of the perfect plus the prefix *me-*. This form is tense-neutral; it is frequently found in journalistic reporting, where the writer wants to establish distance from second-hand information; (11) illustrates this form with future time reference. (iii) The non-witnessed past consists of the past participle of the verb plus the perfect of *budan* 'to be' (12). (iv) The non-witnessed past progressive consists of the past participle of the verb plus the past participle of *istodan* 'to stand' grammaticized as a progressive construction, plus the perfect of *budan* 'to be' (13).

(10-a) *sayohat-ba rafta-ast*
        journey-on go(PERF)
        '(I heard) he went on a trip.' (Perry 2000:232) (hearsay/reportative)
(10-b) *ammo ba'd fahmid ke in ciz-i   siyoh zoɣ buda-ast*
        but   then realized that this thing-EZ black crow be(PERF)
        'But then he realized that this black thing (as it turned out) was a crow.' (Perry 2005:233) (mirative)
(11)   *ma'lum ast ki ū pagoh   me-rafta-ast*
        known is that he tomorrow is.going(DUR, NON-WIT)
        'It's known that he is going tomorrow.' (Perry 2005:230) (hearsay/reportative)
(12)   *gonahi karde bude-ast   ke sazo-yaš-raa   raft*
        a.sin do(PST, NON-WIT) that its.punishment-FOC he.went
        'He must have done something wrong to be punished (for it).' (Perry 2000:238) (inference from result)
(13)   *vai kitob xonda   istoda   buda-ast ki   man dar-ro   taq-taq kardam*
        he book read(PST PPL) stand(PST PPL) be(PERF) when I   door-ACC knocking did
        'He was evidently reading a book when I knocked at the door.' (Perry 2005:233)

3.2.4 Nepali

Nepali has (at least) three forms marked for evidential meanings: (i) the inferential perfect, (ii) a hearsay particle *re*, and (iii) a mirative copula *rahecha*. Michailovsky (1996), citing Clark (1963), describes two forms of the perfect in Nepali: a longer form consisting of the past participle plus the genitive marker *-ko*, and a shorter form consisting of the past participle in *-e*. This short form, called "inferential" by Clark and Michailovsky, was known to Nepali grammarians as the *ajñāt bhūt* 'unknown past'. Two examples follow as (14-a) and (14-b). Note that (14-a) involves the typical context of forgetfulness or absent-mindedness associated with first-person inferentials, and that (14-b) shows inadvertent action, both contexts associated cross linguistically with first-person inferential forms.

(14-a) *tyo kāgat ta   birse~   bhaneko ta   khāltī-mā po   hālechu*[6]
        this paper TOP forget(AOR)1s QUOT TOP pocket-in on.the.contrary put(INFER)1s
        'I thought I had forgotten the paper, but I find I had put it in my pocket.' (Clark 1963:248, cited in Michailovsky 1996:112)

---

[6]In this paper ~ (tilde) following a vowel represents nasalization of the preceding vowel, e.g. *e~* represents nasalized e..

(14-b)   *mai-le bhāvanā-lāī lukāuna košiš gare~,*   *tara saki-nā,*
　　　　 I-ERG   feeling-ACC hide(INF) attempt make(AOR)1s but be.able(AOR)-not
　　　　 'I tried to hide my feelings, but I could not,
　　　　 musukka hā~sichu,   *ma kastī   badmās-nī*
　　　　 sweetly   smile(PERF)1.fs I   what.a bad.girl
　　　　 (and) I smiled sweetly - what a bad girl!' (Michailovsky 1996:115)

　　The inferential perfect of *rahanu* 'to remain, continue' supplies a specifically mirative copula *rahecha* 'why, he is', which also participates in a progressive and a marked inferential perfect (15) (Michailovsky 1996:111). *rahecha* functions as copula in sentences like (16-a) and (16-b), in which the speaker focuses on the realization of a situation of which he was previously unaware. The hearsay marker *re* appears in (17).[7]

(15)   Inferential: *garecha* (do-INFERENTIAL PERFECT) 'Why, he has done!'
　　　 Progressive inferential: *gardo rahecha*
　　　　　　　　　　　　　　 doing remain(INFERENTIAL PERFECT) 'Why, he does/is doing!'
　　　 Perfect inferential: *gareko rahecha*
　　　　　　　　　　　　　　 done   remain(INFERENTIAL PERFECT) 'Why, he has done!'
(16-a)   *merā kitāb timro koThā-mā rahecha*
　　　　 my   book your room-in   it.is(INFER)
　　　　 'Oh, I see that my book is in your room.' (Matthews 1990:55)
(16-b)   *āhā! kasto   rāmro   pokharī rahecha*
　　　　 Ah! what.sort.of beautiful lake   it.is(INFER)
　　　　 'Ah! What a beautiful lake!' (Clark 1963:244, cited in Mikhailovsky 1996:111)
(17)   *bhare   pānī parcha   re*
　　　　 this.evening water fall(PRES INDEF) HEARSAY
　　　　 'They say that it's going to rain this evening.' (Matthews 1990:87)

3.2.5 Wakhi
The most basic way of encoding inferentiality in Wakhi is the use of the perfect (perfect stem (+ pronominal clitics)). The basic indicative function of the perfect is resultative-stative; e.g. *δъitr kъind vit-k* 'The sickle has become dull/is dull' (Pakhalina 1975:83), from which develop inferential and mirative senses. Compare (18-a, 18-b, and 18-c) and (19-a and 19-b). It seems that, as in Kalasha and Khowar, a second, mirative, component of meaning is achieved by adding a perfect form of 'be' or 'become' (20-b). The perfect also appears typically in the opening sentence of traditional (folk) tales about the past (21). As in other languages, volitionality distinctions often emerge from the choice between simple past (22-a) or perfect (22-b).

(18-a)   *salīm pešāwar reγd-a*
　　　　 Salim Peshawar go(PST)
　　　　 'Salim went to Peshawar (first-hand knowledge of speaker).'
(18-b)   *salīm pešāwar reXk*
　　　　 Salim Peshawar go(PERF)
　　　　 'Salim went to Peshawar (unseen by speaker).'
(18-c)   *salīm pešāwar reXk   tiwetk*
　　　　 Salim Peshawar go(PERF) be(PERF)
　　　　 'Apparently Salim went/has gone to Peshawar (unseen by speaker, mirative.'
(19-a)   *wuðg skpIrz mōr vit-e*
　　　　 today all.day rain become-PST
　　　　 'It rained all day today (first-hand observation).'
(19-b)   *wuðg-i   mōr dyetk*
　　　　 today-ps.3s rain give(PERF)
　　　　 'It has rained today.' (concluded by seeing water on ground).

---

[7]Michailovsky (1996) feels that the presence of *re* in the function of marking hearsay prevented the expansion of the semantic space of the inferential perfect to include hearsay. Peterson (2000) considers the category of mirativity as conceptually distinct from result-inferential. He argues that the hearsay particle *re* derives ultimately from the verb *rah-* 'stay, remain', by a development *rahécha > récha > re*, involving the loss of [h] and the erosion of the unstressed final syllable *-cha*. He finds the intermediate stage attested in written documents and gives one example. Peterson's analysis differs from that of Mikhailovsky in that he considers *re* to be a further develement and specialization of *rahecha* rather than pre-existing the inferential development of the perfect. It also differs from Degener's analysis relating Waigali *le* and Nepali *re*.

(20-a) *yem cuán-i   trešp*
        this apricot-ps.3s sour
        'This apricot (tree) is sour (known beforehand).'
(20-b) *yem-i   trešp cuan   tuétk*
        this-PS.3s sour apricot be(PERF)
        'This is a sour apricot (discovered after tasting it, mirative).'
(21)   *yi kampir-i   tiwitk   yi kəS Xəy də yi xun-əv   yašt haletk*
        one old.woman-ps.3s be(PERF) one boy   self in one house-ps.3p live(PERF)
        'There was an old woman and a boy. They lived in a house.' (Mock 1998:453, 215)
(22-a) *maZ-e   Xü   kitôb salīm-er   ðet*
        I(OBL1)-OBL2 self's book Salim-DAT give(PST)
        'I gave my book to Salim (intentionally).'
(22-b) *maZ-e   Xü   kitôb salīm-er   ðet-k*
        I(OBL1)-OBL2 self's book Salim-DAT give(PERF)
        'I gave my book to Salim (unknowingly, mistakenly).'

3.2.6 Nuristani languages
The Nuristani languages, despite the paucity of published data on some of them and the difficulty of obtaining fresh data, show clear indications of robust inferential/indirective systems.

3.2.6.1 Waigali (KalaSa-alâ)
Waigali (self-designation *kalaSa-alâ*) has a clear "reportative" particle, *–le*, first described by Buddruss (1987:33, 37) as a particle used when a speaker reports what he has not observed himself but knows by hearsay (23). Buddruss compares its function to that of Nepali *re* .

(23)   *aĵ'aa isl'am na   war-'aai nüstar'a kalaS'ãã-ba   kas'am prú~-Ra 'eog čar oR'oi-**le***
        yet   Islam NEG up-came before Waigal.people swearing give-DAT specific custom was-**le**
        'Islam had not yet arrived (in the valley) when (it is said that) among the early Waigal people there was a specific custom of swearing.' (Buddruss 1987:33)

Subsequently, Degener (1998:173-182) enumerates the tense forms in which *le* has been attested and discusses its functions in several text types. She compares its semantics with Turkish *miş* and with the OIA perfect. Discussing its etymology, she compares it to Nepali *re*. Degener's own description of *-le* points to its being a mirative particle. Strand (1999), in his review of Degener (1998), says that the preterital forms of 'be' given in Degener (1998:72) are not simple preterites, but "rather a marker of what [he] has called 'Realizational Mode' for neighboring Kamviri. It indicates a past change that the speaker formerly was unaware of, but at present realizes to be true. It appears most frequently with the reportative particle *-le*. English phrases like 'I realize/see/hear that...' and 'It turns out that...' indicate a similar mode." [Strand's] data lack examples of this form as an auxiliary, but it appears to form Degener's "Imperfekt II" and "Plusquamperfekt II". Waigali appears to have an extensive set of verb forms specified as inferential/indirective, at least some of which have clear mirative semantics.

3.2.6.2 Kâmviri[8]
Strand has called a set of verb forms having mirative semantics the "Realizational Mode." His paradigm (p.c.) for the realizational mode of 'be' is given as (24). Realizational forms also appear in verbs built with *âsa-* 'be' like the progressive (25).

(24)   Sg.   Pl.
    1. *âs'a-o-m* 'I realize that I was.'   *âs'a-o-mi?*   'I realize that we were.'
    2. *âs'a-o-?* 'I realize that you were.'   *âs'a-o-?R*   'I realize that you [pl] were.'
    3. *âs'a-o*   'I realize that he was.'   *âs'a-â*   'I realize that they were.'
(25)   *b'unâso* 'I realize that it was happening.' vs. *b'unâsi* 'It was happening.'

In Strand's words: "The basic meaning of this mode contrasts current certainty with former skepticism, disbelief, or unawareness: now I really am aware of the past action or circumstance, as opposed to my former skepticism, disbelief, or ignorance." This is a clear description of mirative semantics. Regarding other aspects of inferential/ indirective semantics, Strand says: "The Realizational mode does not appear in traditional tales, which are usually told in the retrospective imaginative mode (*e m'er bAlla* 'There was [probably] a king...'). As such tales cannot be

---
[8]All the information on Kâmviri is due to Richard Strand (p.c.) and http://users.sedona.net/~strand/.

verified by the speaker's experience, they would preclude the Realizational mode. And it is not used for the narration of unwitnessed events (normally in the Retrospective Perfect), unless the speaker is emphasizing his realization that the unwitnessed events were verified by his later experience. The mode does imply inference from the observation of resultant states, as does the Retrospective Perfect, but it emphasizes the speaker's change of evaluation of the event from uncertain to certain." (p.c. 6/6/06)

Kâmviri also has a reportative particle *-mma*, which may be used after past-tense verbs, except the past definite, to explicitly indicate that the speaker got knowledge of the verbal action from a source other than his own inference. This particle occurs often with the Realizational mode, to indicate that outside sources led the speaker to change his mind from skepticism to belief: *b'unaso-mma* 'I hear that it really did happen [contrary to my previous belief].' Strand sees Kâmviri *-mma* as functionally equivalent to Waigali *-le*.

3.2.6.3 Ashkun (ASkuNu)

The language of village Wama (self-designation *saNu-vīri*) is one of the dialects collectively named Ashkun. Buddruss (in press) includes three texts in this dialect, which contain a significant number of verb forms which Buddruss calls Preterite-II and Imperfect-II. These forms consist of the preterite or imperfect extended with *séi*, the present tense of *s-* 'be'. Preterite II occurs in contexts typical of inferential forms in neighboring Khowar and Kalasha. Two examples of Preterite II from Buddruss' texts appear here as (26) and (27). Morgenstierne (1934:68) gave several examples of these forms, considering their meaning uncertain. However, an example occuring in one of his texts (28) shows the form occuring in the opening sentence of a fairy tale, a typical inferential/indirective context. Also, the final sentence of the same tale shows a form with mirative meaning (29). Buddruss (in press:19) also mentions a Pluperfect II, having the paradigm shown in (30).

(26)   *a sə~Rú-ə*   *zú-es*   *kamgə'l*   *istrí přoti-***séi**
      a man fromWama-OBL daughter-PS3s Kamgal-to wife gave(PRT II.**is**)
      'A man from Wama gave his daughter in marriage to (someone in) Kamgal.' (Text 1, #1) (opening sentence of traditional tale)

(27)   *zəmás*   *batúə: "oho~, yek to son sagə-***séi**
      son.in.law thought aha   this so gold was(PRT II.3s)
      'His son-in-law thought, "Aha, so this is gold (as is heard)!' (Text 1, #11) (mirative)

(28)   *a*   *'bādšā 'səgə-sei sə*   *dū*   *i'strīRē[s] 'səgə-sən*
      one king   was   those two his.wives   were
      'There was a king; he had two wives.' (Morgenstierne 1929:232)[9]

(29)   *kī mr'ākwa aRs*   *pak'īrə täi 'zaŋgalwa*   *pə-k'ūcäi*
      that boy's   his.mother the.faqir from of.the.forest   from-middle
      awe'Rīara   *'bādšāa i'strī*   *a-sēi*
      having.brought.her the.king's   wife   she.is
      'When the faqir brought the boy's mother from the forest (she proved to be) the king's wife.' (Morgenstierne 1929:237, 221)

(30)   Sg.   Pl.
      1. *gestə'gə-səm* 'I had gone.', etc.   *gestə'gə-səmiš*
      2. *gestə'gə-səs*   *gestə'gə-səg*
      3. *gestə'gə-sei*   *gestə'gə-sən*

3.2.7 Yasin Burushaski

Burushaski has two main dialects–Hunza and Yasin. Yasin Burushaski has a past tense form, not found in Hunza Burushaski, in which *-ásc-* (Berger *-asċ/ast-*) is infixed between the verb stem and the personal endings. This form was first noted by Lorimer (1962:26), who described it as "producing an imperfect tense". Two of the three occurrences of this form in Lorimer's texts are the first sentences of traditional folk tales (31-a), and one indicates a mirative meaning (31-b). Later, Berger (1974:40-41) describes this form as indicating something rather "vague" or "indefinite" in that the speaker has not seen (the event) himself (32), pointing to the *-asċ/ast-* form as an 'indirect' or 'inferential' form. Following Lorimer (1962), Berger thinks that this form is an influence from Khowar, which is consistent with the phonological shape and semantics of Khowar inferential forms in *as-* 'be (animate)', e.g. *astaái* 's/he turned out to be.' Tiffou and Pesot (1989:35) also attest the *-aasc-* form, commenting that its use is highly dependent on the thought of the speaker, and that its use tends to be specific to certain speakers (p.c.). (33-a) is the beginning of a traditional tale (Tiffou and Pesot 1989:94); in (33-b), on the other hand, the fact that there was a very

---

[9]Morgenstierne's transcription and placement of stress marks has been maintained in his examples.

big forest is given as objective information.

(31-a)   *tshoor*   *hen wau-e*   *hen mušɣun b-aast-imi*
          long.ago a   old.woman-OBL a   nephew be-*aast*-PST3s
          'In former times an old woman had a nephew (or grandson).' (traditional tale)

(31-b)   *siia,*   *baadša seni ka "uule*   *šorba axer*   *buT nyʌm, buT mʌza mʌne-aast-imi"*
          saying, king   said that well(?) soup   after.all very sweet very tasty remain-*aast*-PST3s
          'On his saying this, the king said, "Well, the soup was very sweet and very tasty after all."' (Lorimer
          1962:294(16)) (mirative)

(32)   *te zamaná-ule uTánċ buT qaimát*   *bién-asċ-imi*
          that time-LOC camels very expensive be-*asċ*-PST3p
          'At that time camels were very expensive.' (Berger 1974:78[8])

(33-a)   *hen zamindár hír-en b-ā'sc-imi*   (33-b)   *han buT nyu jangák-an dulúm*
          a   farmer man-a be-ā'sc-PST.3s.hm   a   very big forest-a be(PST)3s
          'There was a peasant.'   'There was a very big forest.'

3.2.8 Hunza Burushaski

In Hunza Burushaski, evidential meanings do not seem to be indicated morphologically. Several evidential senses
are indicated by (i) a post-verbal mirative particle *qheér* (34-b), or (in conjunction with the perfect), for inference
from observation (35-b), and (ii) a form *seibáan* 'they say' for indirect information from speech-act sources (34-c) or
traditional knowledge.[10]

(34-a)   *guté há*   *salíim-e*   *y-úu-e*   *díulai*
          this house Salim-OBL his-father-ERG is.building
          'Salim's father is building this house (first-hand knowledge).'

(34-b)   *guté há*   *salíim-e*   *y-úu-e*   *díulai qheér*
          this house Salim-OBL his-father-ERG is.building *qheér*
          'Salim's father is building this house (speaker just came to know about it, mirative).'

(34-c)   *guté há*   *salíim-e*   *y-úu-e*   *díulai*   *seibáan*
          this house Salim-OBL his-father-ERG is.building they.say
          '(They say that) Salim's father is building this house.' (hearsay)

(35-a)   *khuulto giílt-ulo buT-an*   *tiS*   *gutshárimi*
          today   Gilgit-in great-indef wind blow(PST)-3s.y-class
          'There was a storm (here) in Gilgit today.' (direct observation) (G.M. Baig, Gilgit)

(35-b)   *khuulto giílt-ulo buT-an*   *tiS*   *gutsharilá qheér*
          today   Gilgit-in great-indef wind blow(PERF).3s.y-class *qheér*
          'There was a storm in Gilgit today.' (e.g. concluded after seeing broken branches)

3.2.9 Pashto

Evidentiality in Pashto appears not to be expresssed morphologically. Rather, a second-position, weak-stressed
particle *xo* is used for some evidential functions. It is used, along with intonation, to report an event that represents
hearsay (36-b), for new and surprising information (36-c), for inference from (visual) evidence (37-b), and to report
inadvertent action (38-b) (Abid Khan, p.c.).

(36-a)   *dā kor*   *də salīm plār*   *joR kəRay de*
          this house of Salim father make(PRES PERF.ms)
          'Salim's father built this house.' (if speaker saw him building it)

(36-b)   *dā kor*   *xo də salīm plār*   *joR kəRay de*
          this house *xo* of Salim father make(PRES PERF.ms)
          'Salim's father built this house.' (if speaker has heard this from a third party.)

(36-c)   *dā kor*   *xo də salīm plār*   *joR kəRay de* (with changed intonation)
          this house *xo* of Salim father make(PRES PERF.ms)
          'Salim's father built this house.' (speaker has just come to know this new information.)

(37-a)   *nən*   *bārān šaway de*
          today rain become(PRES PERF)
          'It rained today.' (If speaker saw the event of raining.)

---

[10]In Lorimer's (1935) texts, 22 of the 32 traditional tales included include the form *seibáan* in their introductory sentences.

(37-b) *nən   xo bārān šaway de*
        today *xo* rain   become(PRES PERF)
        'It rained today.' (If inferred by seeing water on the ground.)
(38-a) *mā   xpəli Toli pesi   xərc ki*
        I(OBL) self's all   money spend(PFV)
        'I spent all my money (intentionally).'
(38-b) *mā   xo xpəli Toli pesi   xərc ki* (with a different intonation)
        I(OBL) *xo* self's all   money spend(PFV)
        'I spent all my money (unwittingly, by mistake-just realized it).'

3.3 Shina and Kohistani cluster
In several Shina and Kohistani dialects, evidential distinctions are marked in the pronominal system, where the seen/unseen parameter is highly developed. Correlations of use of the different pronominal forms with tense-aspect forms have not yet been studied.

3.3.1 Palula
In Palula, an archaic variety of Shina spoken in Lower Chitral, *maní*, a non-finite form of 'say', is used sentence-finally to mark a statement as hearsay (39), or to mark the opening of traditional tales (40). It also can be used in a question about speech acts (41). Compare (41-a) and (41-b). Notice that here *maní* follows the word referring to the speech act, rather than being sentence-final.

(39)   *sadár   chatruuL-a   the ukhaandu maní*
        president Chitral-OBL to   coming   say
        'It is said that the President is coming to Chitral.' (Bashir 1996:259)
(40)   *muSTú zamanee ak   bachaa he~siLu maní*
        former time   one king   was   say
        'Once upon a time there was a king.' (Bashir 1996:260)
(41-a) *saliim-a   gubá nivešiLu*
        Salim-ERG what wrote
        'What (thing) did Salim write?' (e.g. letter, bill, etc.) (Bashir 1996:258)
(41-b) *saliim-a   gubá maní nivešiLu*
        Salim-ERG what say   wrote
        'What (content/words) did Salim write?' (Bashir 1996:258)

3.3.2 Gilgit Shina
In Gilgit Shina, source of knowledge distinctions are indicated analytically; hearsay information is embedded under a synchronically transparent, finite form of 'say' as in (42). The seen/unseen distinction is, however, grammaticized in a four-valued pronominal system (Radloff and Shakil, 1998:192).

(42)   *salim watun   (thenan)*
        Salim come(PRES PERF) (say-P/F.3p)
        '(They say) Salim has come/came.' (hearsay/direct observation) (M.A. Zia)

3.3.3 Kohistani Shina dialects
Schmidt (2000) and Schmidt and Kohistani (2001) provide valuable new information on the pronominal and deictic systems of Shina dialects. In Kohistani Shina the demonstratives *aáe* 'this' and *asá* 'that' are marked both for proximity/remoteness and for *source of knowledge* [emphasis mine]: *aáe* marks visual knowledge (43-a), while *asá* marks heard knowledge (43-b) (Schmidt and Kohistani 2001:136). The deictic elements *paár* 'over there, across, away' (visible to speaker or addressee) (44-a) and *pér* 'over there, across, away' (not visible to speaker or addressee) (44-b) mark the visible/non-visible parameter. Additionally, the demonstratives *aáe* 'this' and *asá* 'that' and the deictics *paár* and *pér* combine and interact to produce various emergent meanings. In these interactions source-of-knowledge marking overrides proximity/distance marking; in such cases stress shift specifies the degree of distance (45-a, 45-b). In both (45-a) and (45-b) the knowledge-source marking (seen) in the element *-aáe* overrides distance. Relative distance is conveyed by placing the stress on *aáe* for the closer distance (45-a) and on *paár* for the farther distance (45-b) (Schmidt, 2000:210).

(43-a) *aáe jók-un*   (43-b) *asá déez-i-ji   pató*
        this what-is   that day-OBLsg-ABL after
        'What is this (thing)?   'since that day' (Schmidt and Kohistani 2001:136)

(44-a) *phúuT th-áa-o*   *to*   *paár*   *dúu tobí-in-a*
        look   do(PERF)3md.sg. TOP over.there [visible] two tree-pl-are(f)
        '[As] he looked [he thought], "Over there are two trees" (in speaker's line of sight).'

(44-b) *pér*   *bo*   *waá*
        away [invisible] go(IMP) EMPH
        'Go away!'

(45-a) *mõ paar-aáe*   *váari*   *bój-m-as*
        I   over.there (close, seen) direction go-IMPF-1sg
        'I am going over there (a short distance in the speaker's line of sight).'

(45-b) *mõ paár-aae*   *váari*   *bój-m-as*
        I   over.there (distant, seen) direction go-IMPF-1sg
        'I am going way over there (a longer distance in the speaker's line of sight).'

In Tileli Shina there are four third-person pronouns (Schmidt 2000:202), specified for visible or known/invisible or unknown, and for close visible or remote visible. Schmidt (2000:212) concludes: "In both [Kohistani and Tileli Shina] three degrees of distance may be distinguished, with either visibility or line-of-sight location as an additional parameter, although these parameters are mapped on to different pronouns or deictics. Both the Tileli and Kohistani data testify to a third parameter: the source of knowledge. In Tileli, 'source' discriminates first and second-hand knowledge. First-hand knowledge is mapped onto visibility: it requires *Zo*, whereas second-hand knowledge or inference is mapped on to invisibility, and requires *so*. In Kohistani, 'source' discriminates information derived by visual means from information known by some other means. Visual source is mapped on to the proximate demonstrative, while non-visual source is mapped on to the remote demonstrative."

3.3.4 Indus Kohistani
According to Claus Peter Zoller (p.c.) the Indus Kohistani pronominal system is complicated, and the seen/unseen parameter is linked with concepts like 'inside/outside' and 'stationary/moving'.

3.3.5 Kalam Kohistani[11]
Hearsay and mirative meanings (46-b), and indirect knowledge (47-b, 48-b) are indicated by a sentence-final particle *-yer* (46-b), which appears to be from a defective verb *-ar-* 'say', which now exists only in past tense forms: *yɨ maro* 'I said', *tu aro* 'you(sg.) said', *sɨ aro* 's/he said', *ma maro* 'we said', *tha aro* 'you(pl.) said', *tām aro* 'they said'.

(46-a) *salīm-a*   *bɔɔb-a*   *ī~*   *šīT*   *cēg*
        Salim-OBL father-ERG this house(f) build(PST.f.sg.)
        'Salim's father built this house (speaker witnessed event).'

(46-b) *salīm-a*   *bɔɔb-a*   *ī~*   *šīT*   *cēg-yer*
        Salim-OBL father-ERG this house(f) build(PST.f.sg.)-perhaps
        'Salim's father built this house (hearsay, or new information).'

(47-a) *kyálam-a*   *lām-mey bāra kucír thū*
        Kalam-OBL village-in many dog   are (cf. *haiN*)
        'There are lots of dogs in Kalam village (known to speaker from first-hand experience.).'

(47-b) *zaraafa afriqe~ za[eng]gil-mey waan-ar*
        giraffes Africa jungle-in   are-*yer* (cf. *hote haiN*)
        'There are giraffes in Africa (presumably not direct knowledge).'

(48-a) *šə'm-aa*   *dós-a*   *a*   *járga thū/wɔɔn*
        Saturday-OBL day-LOC one meeting is/will be
        'There's a meeting on Saturday. (If I helped to arrange it.)'

(48-b) *šə'm-aa*   *dós-a*   *a*   *járga wɔɔn-t-ər*
        Saturday-OBL day-LOC one meeting will be-*yer*
        'There's a meeting on Saturday. (If I read an announcement about it.)'

3.3.6 Torwali
In Torwali, spoken in the Swat Valley, two particles indicating evidential meanings have been identified so far.[12] (i) A sentence-final particle *a* is employed in all tenses for sentences representing information acquired indirectly (49-b). A particle *ko* marks information acquired by inference from visual evidence (50-b). At this point I do not

---

[11]Data on Kalam Kohistani are based on field work done working with Amir Zada, an educated resident of Kalam.

[12]All the Torwali data in this paper were provided by Inam Ullah, of village Bahrain, Swat.

have enough contextualized data to say anything further about the uses of these particles.

(49-a) *miTiŋ   ləu aŋa-si di chi*
       meeting Saturday-of day is
       'There's a meeting on Saturday.' (If speaker helped to arrange the meeting.)

(49-b) *miTiŋ   ləu aŋa-si di chi-a*
       meeting Saturday-of day is-*a*
       'There's a meeting on Saturday.' (If speaker read about it in the newspaper.)

(50-a) *aš   agha mut-tu*
       today rain rain(PRES.PFV)
       'It rained today.' (If event of raining seen by speaker)

(50-b) *aš   agha mut-tu   ko*
       today rain rain(PRES.PFV) *ko*
       'It rained today.' (If inferred by seeing water on the ground)

3.4 Balochi and Brahui
The status of evidentiality in Balochi and Brahui is unclear.[13]

3.5 Urdu and Hindi
In Hindi and Urdu, indication of evidentiality/inferentiality semantics is distributed throughout the grammar. It is associated with at least three morphological patterns: (i) compound verb vs. simple verb, (ii) tense marked perfective vs. simple perfective; (iii) *na* vs. *nahĪ.* Hook (1974), an analysis of the compound verb, is relevant to the meanings discussed in this paper. Hook says (1974:248), "In cases where the performance of an action is completely unforeseen by the speaker he may not use the compound verb." Again, (1976:153): "If there is no possibility of an action or event's being anticipated, it is expressed with the non-compound verb." Two of his examples appear as (51-a) and (51-b).

(51-a) *kalambas ne   amrīkā kī khoj   kī / *kar dī/ * kar lī*
       Columbus ERG America of discovery(f.s.) do(PFV)f.s. /*do-give/*do-take
       'Columbus discovered America.' (Hook 1974:240)

(51-b) *kal   dūdh me~ cūhā   milā*
       yesterday milk in   mouse(m.s.) meet(PVF)m.s.
       'Yesterday we found a mouse in the milk.' (Hook 1976:153)

In (51-a) a compound verb would suggest that Columbus knew about the existence of America before discovering it; in (51-b) a compound verb (*mil gayā*) would suggest that the speaker anticipated or feared finding a mouse in the milk. In other words, mirative semantics is not compatible with the compound verb in *jānā* 'go'. In Bashir (1993), I argued that the distribution of compound verbs vis-à-vis simple verbs is related to the intersection point of an observer/speaker with an event vector. Compound verbs encode actions specified for intersection with more than one point on the vector, e.g. both origin and event, while simple verbs encode actions as an undifferentiated single-stage conception, e.g. the event itself, or the end point/resultant state. A single-stage conception including only the end point gives rise to mirative semantics.

    Montaut (2001:351), comparing the semantics of the present perfect (perfective participle + present tense of 'be') with that of the "aorist" (simple perfective = perfective *-(y)ā* participle) argues that actions or events represented with the aorist are disjunct from the speaker's present (moment of speech) because of the lack of a tensed auxiliary, which would anchor the reported event to the speaker's reference time. Thus mirativity–meanings which 'are grasped through a sudden irruption in the consciousness'–emerges for the simple perfective form. Montaut's examples (52-a) and (52-b), contrast the meaning of surprise ("as when opening the door and seeing an old friend accompanied by his young son not seen for long") in the simple perfective, (52-a), with the response to it in (52-b), which is rooted in the respondent's (prior) connection to the event (Montaut 2004:106). Bashir (2003) notes that absence of the auxiliary has the same effect in the present progressive, as in (53), uttered when a speaker, telephoning someone and expecting someone to answer, is surprised when no one picks up the telephone.

---

[13]Rossi (1989), citing Windfuhr's (1982) discussion of inferentiality in Persian, argues on the basis of elicited Balochi sentences patterned on sentences in Windfuhr (1982) that in the Balochi of Chakansar/Kang (influenced by Dari Persian according to the informant), some verb forms are used with inferential meaning. However Sabir Badalkhan (p.c.16 April 2006) does not accept this, especially for Pakistani Balochi. Lazard (2000) discussing Barker and Mengal (1969), which is based on Pakistani Balochi, thinks that the meanings of B&M's Past II ("Past Completive") and Past Perfect II ("Past Perfect Completive") may be related to the evidential system; however, Sabir Badalkhan does not see evidential meaning in these examples. This question needs text-based research. Regarding Brahui, I have not yet been able to identify any forms or constructions which convey evidential/indirective meanings; the question remains open.

(52-a)   *are ! kitnā   baRā **ho gayā** !*
         interj. how.much tall   become(aor)
         ' Oh, he has grown so tall! / how tall he has grown! '
(52-b)   *vah kāfī   baRā **ho gayā** hai*
         3s   fairly/rather tall   become(pres.perf)
         'He has grown quite tall.' (Montaut 2001:352)
(53)   *koī   **uThā nahĪ rahā***
         anyone lift   NEG remain (PFV-ms)
         'No one is answering.' (contemporary Pakistani Urdu) (Bashir 2003)

Additionally, Bashir (2003), a study of the negative elements *na* and *nahĪ*, tentatively finds that with the loss of its unmarked/default status, in contemporary Pakistani Urdu *na* is specializing to some degree into the negative marker associated with mirativity or non-volitionality. It appears that *rahnā* 'remain' and *rakhnā* 'put' are used in some cases with mirative nuances. This awaits further investigation.

3.6 South Indian (Dravidian/Dakkhiini/Marathi) cluster

3.6.1 Malayalam
In Malayalam, evidentiality distinctions are not morphologically encoded, but are scattered throughout the grammar. Some of the means noted so far are: (i) use of a verbal noun rather than a finite past tense form (54-b); (ii) a particle *allō*, which has a range of meanings including softening a harsh statement, adding certainty, or adding surprise (54-c); (iii) the perfect. An event directly witnessed is expressed with the simple past, whereas one inferred from observation of the results is expressed with a perfect form interpretable as 'must have V-ed', an inference based on the speaker's knowledge of the world (55-b).[14]

(54-a)   *Rāman-ṟe   acchan   ī   vīTu nirmmiccu*
         Raman-GEN father(NOM) this house   build(PST)
         'Raman's father built this house.' (Speaker saw him building it.)
(54-b)   *Rāman-ṟe   acchan   ī   vīTu nirmmiccu kēTTu*
         Raman-GEN father(NOM) this house   build(VERBAL NOUN)
         'Raman's father built this house.' (Speaker has learned this from a third party.)
(54-c)   *Rāman-ṟe   acchan   vīTu nirmmikkunnuNT-allō*
         Raman-GEN father(NOM) house   build(PRES)-*allō*
         'Raman's father is building a house.' (Speaker has just come to know this.)
(55-a)   *innu mazha illa*
         today rain   became(PST)
         'It rained today.' (event of raining seen by speaker)
(55-b)   *innu mazha peytāyirikkum*
         today rain   must.have.fallen
         'It (must have) rained today.' (inferred by seeing water on the ground)

3.6.2 Tamil
Several strategies mark evidentiality. (i) The particle *-ām* marks information attributed to a third-party speech-act source, either aural or written. It functions in all tenses.[15] Compare (56-a) and (56-b). (ii) A second construction used to mark hearsay attribution involves the quotative particle *enRu*, the conjunctive participle of 'say', with the form *kēLvi* (< 'hear') marking question or hearsay (56-c). (iii) The present perfect can be used to indicate inferences, i.e. conclusions based on observation of results of an event (57). (iv) The frozen particle *-pōla* 'it seems that' can indicate mirative senses in all tenses (58). (v) A frozen form *vēNTum* 'must' functions in mirative meanings (59).

(56-a)   *vīran inta vīT-ai-k   kaTT-in-ān*
         Viran this house-ACC build-PST-3sm
         'Viran built this house.' (personally known)
(56-b)   *vīran inta vīT-ai-k   kaTT-in-ān-ām*
         Viran this house-ACC build-PST-3sm-HEARSAY
         'I gather/hear, that Viran built this house.' (hearsay)

---

[14] I am indebted for the Malayam examples and discussion to Nisha Kommatam, Lecturer in Malayalam, University of Chicago.

[15] The lexical source of *-ām* is not certain, but according to J. Lindholm (p.c.) it may be from the root *-āhi* 'to be, become'. I am grateful to V.J. Fedson for the Tamil examples in this section.

(56-c) *vīran inta vīT-ai-k   kaTT-in-ān   enRu   kēLvi*
        Viran this house-ACC build-PST-3sm say(CP) question/hearsay
        'The *on dit* is that Viran built this house.'

(57)   *vīran-kku   pustakatt-ai koTu̱ṯṯu iru-kkir–ēn*
        Viran-DAT book-ACC give(PRES PERF)-1s
        'I've evidently, obviously (unknowingly/mistakenly) given Viran the book'.

(58)   *vīran inta vīT-aik   kaTTu-kir-ān-pōla*
        Viran this house-ACC build-PRES-3s.m-it.seems
        'It looks as if/seems as if Viran is building this house.' (Speaker has just learned this.)

(59)   *en pustakatt-ai avan-ukku nān koTuttu irukka v ēNTum*
        my book-ACC   he-DAT   I   give CP be(INF) must(frozen)
        'I must have (inadvertently) given my book to him.' (For example, I've forgotten that I did.)

3.6.3 Telugu

As in Malayalam and Tamil, marking of evidential meanings is scattered, including: (i) the particle *anTa* 'saying';
(ii) a surprise particle *-ē*; (iii) the morpheme *-aTI-* 'like'.[16] *anTa* 'saying' functions to indicate hearsay (60-b), and
other types of indirect knowledge. Although no meaning of reduced belief in the statement is inherent in statements
with *-anTa*, it can be used as a discourse strategy to distance the speaker from responsibility for a statement, and to
quote proverbs. In reporting the actions of a third person, in combination with the emphatic marker *-ē*, *anTa* can
yield a mirative-like meaning (60-c); with a first-person speaker, *-ē* alone can evoke the mirative sense (61). In a
case like (62-b), *-anTa* is not obligatory, and would be used only if the indirective sense is focused. *-aTI-* 'like',
which follows the non-finite verbal element, can indicate indirect knowledge of events or situations acquired from
sources other than (extended) speech. Thus in (63-b) it indicates inference from observation of a resulting state,
while in (64-b), with a first-person agent, the nuance of inadvertent action emerges.

(60-a) *salīm vāLl-a   nānna ī   illu kaTT-inc-ā-Du*
        Salim ones-OBL father this house build-CS-PST-3sm
        'Salim's father built this house.' (Speaker saw him building it).

(60-b) *salīm vāLl-a   nānna ī   illu   kaTT-inc-āD-anTa*
        Salim ones-OBL father this house build-CS-PST(3s)-SAY
        'Salim's father built this house.' (Speaker has heard this from a third party.)

(60-c) *salīm vāLla   nānna ī   illu   kaTT-inc-āD-aTa-n-ē*
        Salim ones-OBL father this house build-CS-PST-3sm-say-n-EMPH
        'Salim's father built this house.' (Speaker has just come to know this information.)

(61)   *ayyē Tēpī peTTu-kō-v-aDam marci-pō-y-ā-n-ē*
        Oh   hat put-REFL(GER)   forget-go-y-1s-n-EMPH
        'Oh, I forgot to put on my hat.' (Said in surprise)

(62-a) *haidarābād-u-lō   gurrā-lu unn-ay*
        Hyderabad-u-LOC horse-pl be(PRES)-3p.n-h
        'There are horses in Hyderabad.' (presumably first-hand knowledge)

(62-b) *āfrikā-lō   jirāfī-lu unn-āy-(anTa)*
        Africa-LOC giraffe-p. be(PRES)-3p.n-h-(saying)
        'There are giraffes in Africa.' (presumably indirect knowledge)

(63-a) *ivvāLla vāna kurisin-di*
        Today   rain shower(PST PPL)-3s.n-h
        'It rained today.' (If the event of raining was seen by the speaker.)

(63-b) *ivvāLla vāna kurisin-aTl-un-di*
        Today   rain shower(PST PPL)-like-be(PRES)-3s.n-h
        'It rained today.' (If the event of raining inferred by seeing water on the ground.)

(64-a) *nēnu nā pustakam salīm-ku   icc-ā-nu*
        I   my book   Salim-DAT give-PST-1s
        'I gave my book to Salim (intentionally).'

(64-b)   *nēnu nā pustakam salīm-ku   iccin-aTl-unnā-nu*
             I   my book   Salim-DAT give(PST PPL)-like-be(PRES)-1s
             'I gave my book to Salim (unknowingly, mistakenly).' (lit. 'It seems that I've given my book to Salim.')

3.6.4 Kannada

Several morphemes function to convey evidential meanings. (i) -*ante* < 'say' functions for hearsay and mirative when the new information is acquired from a speech act of someone else (65-b), and indirectly known events or states (66-b). In a case like (66-b), -*anTa* is not obligatory, and would be used only if the indirective sense is focused. (ii) -*ē* (emphatic) functions only to indicate surprise, not as a general mirative. (iii) -*ante* + -*ē* indicates new information (65-c). (iv) -*anga*- 'like' can report the traces of an unseen event if it is inferred from evidence other than (extended) hearing. In (67-b) *anga* indicates an inference from a visually observed result; while in (68-b) it indicates indavertent action. (v) A form *nōD-appa*, literally 'see-man' appears in the first-person mirative context as in (69) where it expresses surprise at an inadvertent action. All Kannada materials and judgements here are due to Nagaraj Paturi.

(65-a)   *salīma-avara appa ī mane-yan-nu   kaTTi-s-ida*
             Salim's-OBL father this house-yan-ACC build-CS-PST3sm
             'Salim's father built this house.' (Speaker saw him building it.)
(65-b)   *salīma-avara appa ī mane-yan-nu   kaTTi-s-ida-n-ante* (< *kaTTisidanu + ante*)
             Salim's-OBL father this house-yan-ACC build-CS-PST3sm-*n*-say
             'Salim's father built this house.' (Speaker has heard this from a third party.)
(65-c)   *salīma-avara appa ī mane-y-annu kaTTi-si-da-n-anta-n-ē* (< *kaTTisidanu + ante*)
             Salim's-OBL father this house-y-ACC build-CS-PST3s-n-say-n-SURPRISE
             'Salim's father built this house.' (Speaker has just come to know this information.)
(66-a)   *maisūri-n-alli kudure unTu*
             Mysore-n-LOC horse   are
             'There are horses in Mysore.' (Presumably this is first-hand knowledge.)
(66-b)   *āfrika-n-alli jīrāfi-gaLu unT-ante* (< *unTu + ante*)
             Africa-n-LOC giraffe-pl   be(PRES)3p.n-h-say
             'There are giraffes in Africa.' (Presumably this is non first-hand knowledge.)
(67-a)   *ivattu maLe suritu*
             today rain   pour(PST)3s.n-h
             'It rained today.' (If the event of raining was seen by the speaker.)
(67-b)   *ivattu maLe surid-ang-ide*   < (*suritu + anga + ide*)
             today rain   pour(PST PPL)-like-be(PRES)3s.n-h
             'It rained today.' (Inferred, for example, by seeing water on the ground.)
(68-a)   *nānu nanna pustaka-(na) salīma-ge~ koTTe*
             I   my   book-(ACC) Salim-DAT give(PST)1s
             'I gave my book to Salim (intentionally).'
(68-b)   *nānu nanna pustaka-(na) salīma-ge~ koTT-ang-iddīni* (<*koTTu + anga + iddīni*)
             I   my   book-(ACC) Salim-DAT give(PST PPL)-like-be(PRES)1s
             'I (unknowingly, mistakenly) gave my book to Salim.'
(69)   *ē nānu Topi-yan-nu iTTu-koLluvaDu   maratu-biTTe nōD-appā*
             Oh I   hat-yan-ACC put-take(GERUND) forget-leave   see-man
             'Oh, I forgot to put on my hat!' (Uttered in surprise.)

3.6.5 Dakkhini Urdu[17]

Several forms serve to mark evidential meanings in Dakkhini. (i) *katē* 'it is said' is obligatory in hearsay and second-hand information contexts (70-b). (ii) The particle *rē / rī* (masculine/feminine addressee) specifically indicates surprise, not merely new information (70-c). *katē* marks indirectness only. It is invariant and can occur in all tenses, including equational sentences and embedded questions (71). In (71), the speaker (A) assumes that the addressee (B) will have indirect rather than first-hand knowledge of who is to come with the bride, hence A's use of *katē*. *katē*

---

[17] The information on Dakkhini in this paper is due to Nagaraj Paturi. In Dakkhini, aspiration is lost, even in voiceless stops. There is no palatal sibilant, but sometimes the retroflex sibilant is heard, e.g. *pešāb* 'urine' > *peSāb*. The reflexive (*apnā*) is only rarely used. There is no agentive postposition *ne*, and the verb agrees with the subject, even in perfective transitive sentences. According to Paturi, existing Dakkhini literature includes mostly folklore, and there is no new written literature being composed in Dakknini. Dakkhini is used on the radio, but only for satire, local color, or local characters. It is, however, vital as a spoken language.

is also used to quote proverbs (72), and also in utterances involving recalled speech, e.g. (73), which represents the soliloquy of a woman recalling her husband's hurtful words. (iii) Inference from evidence to an unseen event is indicated by the invariant, sentence-final particle *sarkā* 'like', which can also indicate an impression or belief from any source: visual (74-b, 75), auditory, or the imagination. *sarkā* also occurs in the first-person mirative/non-volitional context (76-b).

(70-a)   *Salīm-kā bā   is gar-kō   banāyā*
        Salim-of father this house-ACC made
        'Salim's father built this house.' (Speaker saw him building it.)

(70-b)   *salīm-kā bā   is gar-kō   banāyā katē*
        Salim-of father this house-ACC made   it.is.said
        'Salim's father built this house.' (Speaker has heard this from a third party.)

(70-c)   *salīm-kā bā   is gar-kō   banāyā katē   rē*
        Salim-of   father this house-ACC made   it.is.said SURPRISE
        'Salim's father built this house.' (Speaker has just learned this surprising information.)

(71)   A: *baccī kē sāt kōn   ārāy   katē*   B: *salīm katē*
        bride with   who is.coming it.is said   Salim it.is.said
        A: 'Who (do they say) is coming with the bride?'   B: 'They say Salim (is coming).'

(72)   *purānā marīz adā   hakīm āy katē*
        old   patient half doctor is it.is.said
        'A long-standing patient is half a doctor.'

(73)   *mai sēmār-ū~ katē - vō accī ai katē - mai mar jānā katē -*
        'I am lazy (he says) - She is good. - I should die.' (recalled words of husband)
        mai kaiku marū~ - uskō mārkē-ī marū~gī
        'Why should I die!?- I will die only after killing him/her.' (speaker's thoughts)

(74-a)   *āj   pānī āyā*
        today water came
        'It rained today. (If the event of raining was seen by the speaker.)

(74-b)   *āj   pānī āyā   sarkāy (< sarkā + hāy)*
        today water came it.is.like
        'It rained today.' (lit. 'It seems like it rained today.' If the event was inferred by seeing water on the ground.)

(75)   *gayā sarkāy*
        went it.is.like
        'It seems like he has gone.'

(76-a)   *mai mērā kitāb salīm-kō   diyā*
        I   my   book Salim-DAT gave
        'I gave my book to Salim (intentionally).'

(76-b)   [*mai mērā kitāb salīm-kō   diyā*] *sarkāy*
        I   my   book Salim-DAT gave it.is.like
        'I (unknowingly, mistakenly) gave my book to Salim.'(unknowingly, mistakenly)

3.6.6 Marathi

In Marathi, several evidential strategies are found: (i) *mhaNe*, a quotative particle from 'say' indicates hearsay information (77-b)[18] (ii) The present perfect appears with new information (77-c). (iii) The difference between direct (78-a) and indirect (78-b) knowledge is encoded by the use of the present or the imperfect, which is used for information about remote objects, not directly knowable.[19] (iv) *-ē* 'exclamation' appears in combination with *are* 'exclamation' for inference about events from visible results/mirative (79-b). An event inferred from a visible resultant state can be reported with the subjunctive (80-b) as opposed to the simple perfective/past (80-a), or with the 'surprise' particle *-e.*

---

[18]My information and Marathi examples are due to Philip Engblom, Lecturer in Marathi, University of Chicago. Engblom observes (p.c.): "My sense is that the *mhaNe* here is rather falling out of use in urbanized, educated Marathi. Some people do use it more consistently than others."

[19]Marathi *asNo~* 'to be' has three forms in the present tense. The first form, e.g. *mī~ āheN* 'I am' from the root *as* 'be' is used to express the existence of objects (in a location) or their properties. The second form, e.g. *mī hoy* 'I am', from the root *bhu-*, 'become' is used for affirming the qualities of objects. The third form, e.g. *mī asto* 'I (m) usually am', from the root *as* 'be', usually has the sense of present habitual or continuous action; it is called 'imperfect' by Engblom.

(77-a) *salīm-cyā vaDilā-nnī he ghar bāndh-lā*
 Salim-GEN father-AG this house build(PFV)
 'Salim's father built this house.' (direct knowledge)
(77-b) *salīm-cyā vaDilā-nnī he ghar bāndh-lā mhaNe*
 Salim-GEN father-AG this house build(PFV).m.s. they.say
 'Salim's father built this house.' (Speaker has heard this from a third party.)
(77-c) *salīm-cyā vaDilā-nnī he ghar bāndh-le-lā āhe*
 Salim-GEN father-AG this house build-take-PFV be(PRES)3s
 'Salim's father has built this house.' (Speaker has just come to know this.)
(78-a) *mahārāShTra-at vāgh āhet*
 Maharashtra-LOC tiger be(PRES.1st.form)3p
 'There are tigers in Maharashtra.' (This is presumably first-hand knowledge.)
(78-b) *āphrik-et jirāph astāt*
 Africa-LOC giraffe be(IMPERF)3p
 'There are giraffes in Africa.' (This is presumably indirect knowledge.)
(79-a) *majhy-ā bhāvā-nī salīm-lā patra lihi-lā*
 my-OBL brother-AG Salim-DAT letter write-PST INDEF(m.s.)
 'My brother wrote a letter to Salim.' (If I saw him writing it, for example.)
(79-b) *are, mājhyā bhāvā-ni salīm-lā patra lihi-lā-e!*
 Oh, my(m.s.) brother-AG Salim-DAT letter write-PST INDEF(m.s.)-EXCLAM
 'Oh, My brother's written a letter to Salim.' (If I learned this by seeing the letter on his desk, for example.)
(80-a) *āj pāus paD-lā*
 today rain fall-PST INDEF(m.s.)
 'It rained today.' (Event of raining was seen by the speaker.)
(80-b) *āj pāus paD-lā asāvā*
 today rain fall-PST INDEF(m.s) be(SUBJ)m.s
 'It rained today.' (If the event of raining was inferred by seeing water on the ground.)'

4. Summary
In a Northern cluster including Kalasha, Khowar, Tajik Persian, Wakhi, and perhaps Yasin Burushaski, Type I systems are found. In a Southern cluster, evidential strategies, including mixed types, include developments of 'say' into "hearsay" markers. The evidentiality/indirectivity marking systems of the southern cluster of languages are remarkably parallel (Table 1). Tamil, Kannada, Telugu and Dakkhini employ a marker renderable as 'like' in the senses of first-person mirative, and inference from evidence other than that of (extended) speech. A quotative-like form from 'say' appears in Tamil, Kannada, Telugu, Dakkhini, and Marathi. In the South Indian cluster, insofar as different markers are used for information from speech-act and non-speech sources, the system can be said to resemble a Type II system in which the source of information is specified. The pronominal systems in some dialects of Shina also appear to have some Type II-like characteristics.

Table 1. Evidentiality/indirectivity marking forms in South Indian languages

Language	form < 'say'	'like' form	surprise/ emphatic particle	'must' form	form < 'become'	perfect for inference
Malayalam	?	?	*allō*	?	?	yes
Tamil	*enRu, k ēLvi*	*pōla*	*-ē*	*v ēNTum*	*-ām*	yes
Kannada	*ante*	*anga*	*-ē*	?	?	?
Telugu	*anTa*	*aTl*	*-ē*	?	?	?
Dakkhini	*katē*	*sarkā*	*are ...rē*	?	?	?
Marathi	*mhaNe*	?	*-ē*	?	?	yes

Table 2 briefly compares information available to me about the expression of evidentiality and inferentiality in some South Asian languages.

Table 2. Evidential forms and meanings in some South Asian languages

Language	Mirative		Indirective/inferential		
	non-1st person	1st person	Hearsay	Inference from result	Traditional knowledge
Vedic	?	?	particle *kila*	verb sys.- perf.	?
Panini's Skt.	?	?	?	verb sys.- perf.	?
Prakrit, Pali	?	?	particle *kila*	?	?
Kalasha	verb sys.-I forms; *huLa* < 'become'	verb sys.-I forms; *huLa* < 'become'	verb sys.-I forms; *ghoan* 'they say'	verb sys.-I forms; *huLa* < 'become'	verb sys.-I forms
Khowar	verb sys.- I forms, *birái* < 'become'	verb sys.- I forms, *birái* < 'become'	verb sys.- I forms, *birái* < 'become'	verb sys.- I forms, *birái* < 'become'	verb sys.- I forms, *birái* < 'become'
Yasin Burushaski	verb sys.- infix < 'be'	?	verb sys.- infix < 'be'	?	verb sys.- infix < 'be'
Wakhi	verb sys.-perf. + perf. < 'be'	verb sys.-perf. + perf. < 'be'	verb sys.-perf.	verb sys.-perf.	verb sys.-perf.
Tajik Persian	verb sys.- perf.	verb sys.- perf.	verb sys.-perf.	verb sys.-perf.	?
Ashkun (Nuristani)	verb sys. (< 'be')	verb sys. (< 'be')	?	?	verb sys. (< 'be')
Kâmviri (Nuristani)	verb sys.- 'realizational'	verb sys.- 'realizational'	particle *mma*	verb sys.	verb sys.
Waigali (Nuristani)	verb sys.; particle *le*	verb sys.; particle *le*	particle *le* (< *kila*?)	?	particle *le*
Nepali	verb sys.- infer. perf.; infer. copula *rahecha*	verb sys.- infer. perf.; infer. copula *rahecha*	particle *re* (< *kila*?)	verb sys.- infer. perf.	?
Hunza Burushaski	particle *qheér*	particle *qheér*	*seibáan* < 'say'	particle *qheér*	*seibáan* < 'say'
Gilgit Shina	?	?	analytical < 'say'	analytical ?	?
Kohistani Shina	?	?	pronominal sys.	?	?
Tileli Shina	?	?	pronominal sys.	?	?
Palula	?	?	*maní* (< 'say')	?	*maní* (< 'say')
Torwali	?	?	particle *-a*	particle *-ko*	?
Kalam Kohistani	particle *yer* (< 'say')	intransitive construction	particle *yer* (< 'say')	?	?
Pashto	particle *xo* + intonation	particle *xo* + intonation	particle *xo* + intonation	particle *xo* + intonation	?
Tamil	*pōla* 'seems'	*pōla* 'seems'; *vēNDum* 'must'	suffix *-ām*, *enRu kēlvi*	verb sys.- perf.	?
Malayalam	surprise particle *allō*	surprise particle *allō*	verbal noun	perf.	lexical

	Mirative		Indirective/inferential		
Language	non-1st person	1st person	Hearsay	Inference from result	Traditional knowledge
Telugu	*anTa* < 'say' + *ē* (surprise)	*aTl* 'like'	*anTa* < 'say'	*aTl* 'like'	?
Kannada	*ante* < 'say'	*anga* 'like"; *noD appa* 'see man'	*ante* < 'say'	*anga* 'like'	?
Dakkhini Urdu	*sarkā* 'like, seems'; *katē* < 'say'	*sarkā* 'like, seems'	*katē* < 'say'	*sarkā* 'like, seems'	*katē* < 'say'
Marathi	pres. perf. (+ ē surprise)	adverb; intrans. constr.	*mhaNe* < 'say'	subjunctive	?
Hindi and Urdu	absence of pres. AUX; simple verb	absence of pres. AUX; simple verb	*sunā* 'heard', *kahtē haiN* 'they say'	*lagnā* 'seem, like'	*kahtē haiN* 'they say'

References

Aikhenvald, Alexandra. 2003. Evidentiality in typological perspective. In: Aikhenvald and Dixon (eds.), 1-31.
_____ and Dixon, R.M.W. (eds.) 2003. *Studies in Evidentiality.* Amsterdam: Benjamins.
Aoki, Haruo. 1986. Evidentials in Japanese. In: Chafe and Nichols (eds.), 223-238.
Barker, Abd-al-Rahman and Aqil Khan Mengal. *A Course in Baluchi.* Montreal: Mc Gill University.
Bashir, Elena. 1988a. Inferentiality in Kalasha and Khowar. *CLS 24.* Chicago: Chicago Linguistics Society, 47-59.
_____. 1988b. *Topics in Kalasha syntax: An Areal and Typological Perspective.* Ph.D. Dissertation, University of Michigan. Ann Arbor: University Microfilms. (http://wwwlib.umi.com/dissertations)
_____. 1993. Causal chains and compound verbs. In: Manindra K. Verma (ed.), *Complex Predicates in South Asian Languages.* New Delhi: Manohar.
_____. 1996. Mosaic of Tongues: Quotatives and complementizers in Northwest Indo-Aryan, Burushaski and Balti. In: Hanaway, William L. and Wilma Heston (eds.) *Studies in Pakistani Popular Culture.* Lahore: Sang-e-Meel Publications and Lok Virsa Publishing House, 187-286.
_____. 2003. *na* and *nahĪ* in Hindi and Urdu. Paper presented at the 23rd annual meeting of the South Asian Languages Analysis Roundtable (SALA 23), at the University of Texas, Austin, October 10-12, 2003.
Berger, Hermann. 1974. *Das Yasin-Burushaski.* Wiesbaden: Harrassowitz.
Buddruss, G. 1987. Ein Ordal der Waigal-Kafiren des Hindukusch. *Cahiers Ferdinand de Saussure 41*:31-43. Geneva: Librarie Droz.
_____. in press. Drei Texte in der Wama-Sprache des afghanischen Hindukusch. To appear in *Gedenkschrift Grjunberg.*
Cardona, George. 2002. The Old Indo-Aryan tense system. *Journal of the American Oriental Society* 122(2):235-241.
Chafe, W. and Nichols, J. (eds.). 1986. *Evidentiality: The Linguistic Coding of Epistemology.* Norwood, NJ: Ablex.
Clark, T.W. 1963. *Introduction to Nepali.* Cambridge: W. Heffer and Sons.
Degener, Almuth. 1998. *Die Sprache von Nisheygram im Afghanischen Hindukusch.* Wiesbaden: Harrassowitz.
Delancey, Scott. 1982. Aspect, transitivity and viewpoint. In: P. Hopper (ed.), *Tense-aspect: Between Semantics and Pragmatics.* Amsterdam: Benjamins.
_____. 1985. Lhasa Tibetan evidentials and the semantics of causation. *Proceedings of the Eleventh Annual Meeting of the Berkeley Linguistics Society.* Berkeley, California: Berkeley Linguistics Society.
_____. 1986. Evidentiality and volitionality in Tibetan. In: Chafe and Nichols (eds.), 203-213.
_____. 2001. The mirative and evidentiality. *Journal of Pragmatics.* 33:369-382.
Deshpande. M. 1981. PāNini and the Vedic evidence: A peep into the "past". *Golden Jubilee Volume.* Poona: Vaidika Samśodhana MaNDala, 52-65.

Emeneau, Murray B. 1969. Sanskrit syntactic particles - *kila, khalu, nūnam*. *Indo Iranian Journal* 11: 241-268.

Guentchéva, Z. (ed.) *Le Énonciation Médiatisée*. Louvain and Paris: Peeters.

Johanson, Lars. 2003. Evidentiality in Turkic. In: Aikhenvald and Dixon (eds.), 273-290.

_____. 2000. Turkish indirectives. In: Johanson and Utas (eds.), 61-87.

_____ and Bo Utas (eds.). 2000 *Evidentials: Turkish, Iranian and Neighbouring Languages.* Berlin: Mouton de Gruyter.

Lazard, Gilbert. 1985. L'inferentiel ou passé distancie en persan. *Studia Iranica* 14:27-42.

_____. 1996. Le médiatif en Persan. In: Guentchéva (ed.), 21-30.

_____. 1999. Mirativity, evidentiality, mediativity, or other. *Linguistic typology* 3:91-110.

_____. 2000. Le médiatif: considérations théoriques at application à l'iranien. In: Johanson and Utas (eds.), 209-228.

Lorimer, D. L. R. 1935. *The Burushaski Language, Vol. II. Texts and Translations*. Oslo: H. Aschehoug & Co.

_____. 1962. *Werchikwar English Vocabulary*. Oslo: Universitets Forlaget.

Michailovsky, Boyd. 1996. L'inférentiel du Népali. In: Guentchéva (ed.), 109-123.

Mock, John Howard. 1998. The Discursive Construction of Reality in the Wakhi Community of Northern Pakistan. Ph.D. Dissertation, University of California, Berkeley.

Montaut, Annie. 2001. On the aoristic behaviour of the Hindi/Urdu simple past: From aorist to evidenciality. In: D. Lönne (ed.), *Tohfa-e-Dil: Festschrift Helmut Nespital*. Reinbek: Wezler, 345-364.

_____. 2004. *A Grammar of Hindi*. Munich: Lincom-Europa.

Morgenstierne, Georg. 1929. The language of the Ashkun Kafirs. *Norsk Tidsskrift for Sprogvidenskap*. 2:192-289.

_____. 1934. Additional notes on Ashkun. *Norsk Tidsskrift for Sprogvidenskap*. 7:56-115.

Pakhalina, T.N. 1975. *Vaxanskij Jazyk*. Moscow: Nauka.

Perry, John. 2000. Epistemic verb forms in Persian of Iran, Afghanistan and Tajikistan. In: Johanson and Utas (eds.), 229-257.

_____. 2005. *A Tajik Persian Reference Grammar.* Leiden, Boston: Brill.

Peterson, John. 2000. Evidentials, inferentials, and mirativity in Nepali. In: Balthasar Bickel (ed.). *Person and Evidence in Himalayan Languages. Linguistics of the Tibeto-Burman Area.* Volume I: 23.2:13-37.

Radloff, Carla F. and Shakil Ahmad Shakil. 1998. *Folktales in the Shina of Gilgit*. Islamabad: National Institute of Pakistan Studies, Quaid-i-Azam University and Summer Institute of Linguistics.

Rastorgueva, V. S. 1963. *A Short Sketch of Tajik Grammar.* trans. and ed. by Herbert H. Paper. The Hague: Mouton.

Rossi, A. 1989. L'inferenziale in Baluci. *Études Irano-Aryennes offertes À Gilbert Lazard. Studia Iranica* 7:283-291.

Schmidt, Ruth Laila. 2000. Typology of Shina pronouns. *Berliner Indologische Studien* 13/14:201-213.

_____ and Razwal Kohistani. 2001. Nominal inflections in the Shina of Indus Kohistan. *Acta Orientalia* 62:107-143.

Strand, Richard. http://users.sedona.net/~strand/

Tiffou, Étienne and Jurgen Pesot. 1989. *Contes du Yasin*. Paris: Peeters/SELAF.

Utas, Bo. 2000. Traces of evidentiality in Classical New Persian. In: Johanson and Utas (eds.), 259-274.

Van Daalen, L.A. 1988. The particle *kila/kira* in Sanskrit, Prākrit and the Pāli Jātakas. *Indo-Iranian Journal* 31:111-137.

Windfuhr, Gernot. 1982. The verbal category of inference in Persian. In: *Monumentum Georg Morgenstierne II*, 263-287. *Acta Iranica* 22. Leiden: Brill.