

Verbal Semantics and Sentence Construction

Author(s): Johanna Nichols

Proceedings of the First Annual Meeting of the Berkeley Linguistics Society (1975), pp. 343-353

Please see “How to cite” in the online sidebar for full citation information.

Please contact BLS regarding any further use of this work. BLS retains copyright for both print and screen forms of the publication. BLS may be contacted via <http://linguistics.berkeley.edu/bls/>.

The Annual Proceedings of the Berkeley Linguistics Society is published online via [eLanguage](#), the Linguistic Society of America's digital publishing platform.

Verbal semantics and sentence construction

Johanna Nichols
University of California, Berkeley

Dans la langue il n'y a
que des différences sans
termes positifs.

It has long been observed that the ergative languages of the Caucasus have a special sentence construction which contrasts with both ergative and intransitive types. This is the 'affective construction', used with verbs of perception. 1) Closer to home, traditional grammars abound in references to distinctive behavior of verba sentiendi et dicendi. The two phenomena have nothing in common except their governing lexical class. It is precisely such facts that will concern us here. A number of well-defined lexicosemantic classes of verbs will be shown to govern such surface patterns as the failure of subject selection, the failure of direct-object selection, and the appearance of otherwise unexpected reflexive, passive, intransitive, mediopassive, deponent, and similar forms of verbs. 2) The governing lexical classes will be consistent across languages and language stocks; the governed syntactic phenomena will vary. For this behavior I will use the term displacement -- distinctive treatment of a salient class, with departure from the dominant scheme accorded more significance than the material treatment of the deviating category.

One of the clearest examples concerns five Russian prepositions: nad 'over, above', pod 'under', za 'behind', pered 'in front of', meždu 'between'. These five are unique among spatial-locative prepositions in governing the instrumental case. The choice of the instrumental is semantically unmotivated, the only coherent fact being the semantic properties of these prepositions. A feature of perspective, exclusive to these five, is singled out for emphasis in unusual case government.

Distinctive treatment of verbal classes produces the three displacement patterns just mentioned: subject displacement, object displacement, and voice displacement. Object displacement should be distinguished at the outset from mere intransitivity in two-place verbs. No language achieves uniform transitivity in the surface treatment of its two-place predicates. In other words, every language will use oblique complements rather than direct objects for nominal relations low on the object-selection hierarchy. For instance, every language will have some expressions such as go in, cross over; but transitives such as enter, cross, follow are a marked type. Every language will have constructions like look at, listen to; but transitives such as watch, Fr. écouter are a marked class. These facts are interesting in themselves, but we will be concerned with failures of subject and object selection at or near

the top of the scale: with verbs having agents or experiencers, and with verbs having patients.

The first hierarchy of displacement classes centers on what are known as psychological predicates, experiential verbs, or -- the term used here -- psych-verbs. These comprise verbs of perception, verbs of emotion, and verbs of cognition. They also tend to include verbs of modality and related notions such as ability and difficulty. 3) Representative East Caucasian examples:

Bats 4)	son	ho	w-abc ^o	'I know you'
	lsg dat	2sg nom	verb	(Dešeriev 232-4)
Avar	insu-da	žindirgo	was	w-ixana
	Fa loc	own	So nom	verb
				'(the) father saw his son'
				(Bokarev 36)

(For an overview of Caucasian sentence-construction types see Meščaninov 1967: Ch. IV; Klimov 1965:55, 62.) Many nominative languages show parallel subject displacement. Slavic languages display a sizable set of psych-verbs with dative experiencers (Russian examples): 5)

emotion:	mne nraivitsja	'I like'	(<u>mne</u> , lsg dat.)
	mne grustno	'I'm sad'	
	mne veselo	'I'm happy'	
cognition:	mne izvestno	'I know'	
	mne kažetsja	'it seems to me; I think'	
	mne ponjatno	'I (can) understand'	
perception:	mne vidno	'I (can) see'	
	mne xolodno	'I'm cold'	
modality:	mne nado	'I must'	
	mne možno	'I may' (permission)	
	mne nužno	'I need'	

Finnish shows the genitive in an analogous construction: 6)

minun on jano	'I am thirsty'	(<u>minun</u> , gen.;
minun on tarve/minun tšytyy	'I must'	<u>on</u> , 'is')
		(Eliot 138)

Similar examples abound. Iranic languages, like their Caucasian neighbors, may exhibit the 'affective' sentence construction as the result of subject displacement, utilizing one or another local case, with psych-verbs (Edel'man 1974). (For more on Indo-European dative-impersonal constructions see Guxman 1967.)

The psych-verbs may also be set apart by voice displacement. Latin deponents, formally passive but active in meaning, include such verbs as fruo 'enjoy', vereor 'fear', obliviscor 'forget', and the related loquor 'speak', etc. In those languages of the stative/active type whose verb classes have lexical exceptions, psych-verbs may figure prominently even in a much-reduced class of statives (e.g. Bats, with only a handful of statives: Dešeriev 221 ff.; also Tunica: Haas 1946:355-7).

On the other hand, psych-verbs may be among the first stative verbs to be displaced into an (expanding) active class. These diametrically opposed treatments support the definition of displacement as a purely negative device without symbolic value. Psych-verbs are a salient lexical class, and therefore apt to receive special treatment.

Displacement is seldom exhaustive; other members of the same semantic class will typically show normal voice and subject selection. E.g., Russian has ordinary surface transitives in ljubit 'like, love', videt 'see', znat 'know', and a number of others which take nominative subjects and accusative objects. Their transitivity, and their very basic lexical status, prove that the displacement of the other psych-verbs is not simply a matter of borderline transitivity.

Within the generic class of psych-verbs, the subset of emotion verbs may be singled out for special treatment. Conspicuous among the Russian lexical reflexives, the Slavic equivalent of deponents, are such verbs as: 7)

ja seržus	'I'm angry'	ja interesujus	'I'm interested'
ja bojus	'I'm afraid'	ja bespokojus	'I'm worried'

(The final -s is the reflexive particle.) In Finnish a group of transitive verbs of (explicit or implicit) emotion govern the partitive in the object (Eliseev 1959:68-9):

simple	rakastaa	'love'	pelät#	'fear'
emotion:	vihata	'hate'	kadehtia	'envy'
causative:	kiusata	'annoy'	ilahduttaa	'make glad'
	suututtaa	'anger'		
agentive:	onnitella	'congratulate'	tervehti#	'greet, welcome'
	kiitt#	'thank'		

Three distinct syntactic classes are involved, and three pairs of nominal relations -- evidence that the shared verbal feature, and not nominal roles, determines this use of the partitive. 8)

In Latin a group of five verbs indicating negative emotion govern an accusative experiencer and a genitive object of emotion. From this core, the genitive government is occasionally extended to personal verbs, including some of positive emotion (Lane 207-8):

impers.:	tuī	mē	miseret	'I pity you'
	2sg gen	lsg acc	verb	
pers.:	fastīdit	meī		'he disdains me'
	verb	lsg gen		(Plautus)
	quamquam	domī	cupiō	'although I yearn for home'
	conj.	gen	verb	(ib.)

In Avar the verbs 'like' and 'love' take the dative in subject displacement -- a small class, but conspicuous in using the pan-East-Caucasian dative experiencer, in contrast to the locative used with general psych-verbs.

Russian distinguishes an adjunct to the class of emotion verbs. Like the Finnish set above, they are an internally diverse group. They are united only by the presence of a semantic component WANT, explicit or implicit. All govern the genitive with greater or lesser regularity.

WANT:	xotet'	'want'	želat'	'wish'	žazdat'
implicit					'thirst for'
WANT:	dostigat'	'attain'	iskat'	'seek'	
	trebovat'	'demand'	ždat'	'wait for'	
WANT:	izbegat'	'avoid'	lišat'	'deprive'	

Any general definition of the notion emotion verb must mention a conspicuous component of evaluation (as defined by Osgood et al. 1957), either positive (love) or negative (hate). A similar parameter figures in the definition of WANT. (That the two are not the same can be demonstrated by introspection: love, high in positive evaluation, entails no assumptions about a time-coreferential WANT; and vice versa.)

In summary, the first series of displacement classes is headed by the general category of psych-verbs cum modals. Once the generic class has been singled out for displacement, a subgroup of emotion verbs may be distinguished. An even more specific class may be set apart, as with Russian WANT. As a result the unmarked, generic group of displaced psych-verbs may consist most conspicuously of modals and related notions, as in Finnish and Slavic; or verbs of perception and cognition may dominate, as in Avar. It is difficult to rank the markedness of perception vs. modal verbs. (Another Caucasian language, Lezgin, is reported to distinguish verbs of possibility, with relative 'subject', from general psych-verbs, which take the dative: Meščaninov 1967:66ff.)

The special treatment of emotion verbs must be distinguished from simple metaphor as in the ablative of separation with verbs of negative reaction, Engl. at and Russ. na with verbs of aggressive emotion, etc. Each of the sets above is characterized by extension of the government pattern to causatives, conversives, and other derivatives of the presumed historical core. Synchronically, we are dealing with verbal features and not with case assignment based on semantic roles of nominals. Diachronically, however, the role of metaphor is important. The rise of displacement classes seems to proceed by formal renewal of an important subclass, 9) with subsequent spread to the generic class. A prominent source of formal devices is the variety of figurative oblique complements with verbs of emotion. We can trace the Russian WANT verbs back to an ablative of separation, with subsequent generalization. The Finnish partitive must have had a similar source.

Verbs of authority, ruling, disposition, and the like are a sufficiently conspicuous displacement class in Indo-European to warrant reconstruction as governing the genitive in the proto language (Kurylowicz 1964:184, following Delbrück). The

independence of the displacement class from its material realization is demonstrated by the formal renewals of the governed case in the various daughter languages. Although the genitive pattern is documented in archaic Latin usage (Lane 209), a replacement in the form of the ablative governed by such verbs as utor 'use' seems to have emerged in at least an incipient stage. In Slavic a number of verbs, including Russ. vladet 'rule, own', upravljat 'govern', rukovodit 'direct, manage' rake the instrumental; the pattern shows some productivity in Russian. In Lithuanian, a quite restricted subset of the same verbs governs the dative (vadovauti 'direct, manage', diriguoti 'conduct, direct').

The implicational hierarchy established so far is outlined below. To the left are the more general and widely attested groups; those to the right are more specific and less frequently found. Implication may be read from right to left.

general psych- verbs	general emotion verbs	evaluation, WANT	verbs of authority, ruling
----------------------------	-----------------------------	---------------------	----------------------------------

The diagram suggests that verbs of authority are in principle related to psych-verbs. A subtle link does seem to exist in the evaluative component characteristic of the higher-ranked classes. Verbs of authority have a self-benefactive component: to rule or have disposition over something suggests action in one's own interest, status beneficial to oneself. The precise role of this factor in semantic structure varies from extralinguistic connotation to contextual implication to explicit semantic component. Whatever their precise connection, authority verbs appear to be a specifically Indo-European displacement pattern and hence may not belong in the universal chart at all.

There is a second, separate displacement hierarchy whose outlines are more speculative than those of the first and will only be sketched here. Because the verbs involved are one-place predicates, the formal realization of classes centers on voice displacement and the choice between parts of speech.

Many languages distinguish stative from active verbs among intransitives. For such languages, verbs of motion and verbs expressing assumption of position (sit down as opposed to sit, be sitting) stand at the head of an implicational hierarchy: the active verbs will always include at least verbs of motion, and virtually all of them (although I know of no language whose active verbs comprise only verbs of motion).¹⁰

Next we encounter at least a few verbs of position such as to be sitting. These are states susceptible to voluntary control. Also at this point we may observe a few strictly locative notions: live (in a place), be (in a place). (The locative complement, obligatory with these verbs and frequent with verbs of position, is evidently the shared feature.) In Bats, for instance, locative 'be', 'live', and verbs of motion are active, while the copula 'be' is stative (Dešeriev 221ff.).

The next two classes create distinctions between parts of speech. At this point, for instance, we find that Indo-European and its neighbors will begin to use adjectives rather than verbs. For languages with parts of speech not isomorphic to our own, we need to make a further distinction of relatively discrete figure-ground shapes (round, square, crooked, grooved) from formless properties such as color, texture, and the like. Whorf, for instance, draws roughly this line between Hopi verbs and adjectives (1946:164).

These four stages -- motion, position, shape, formless qualities -- form a reversible hierarchy. Any stage may be entered from below, by the relatively more stative verbs, or from above, by active verbs. It is a strict hierarchy in that stages cannot be skipped, either in the synchronic composition of formal classes or in their diachronic expansion. One source of apparent exceptions lies in interference from the first implicational hierarchy: voice displacement of psych-verbs will be a consistent source of relatively more stative verbs. Georgian, for instance, has a class of 'static verbs' (Čikobava 1967:51), morphologically defective in that they coincide formally with passives of causatives. They may be likened to deponents and lexical reflexives in Indo-European languages. On the present hierarchy they are limited to the second class, the verbs of position and location, but they include a number of psych-verbs as well. This is a stative class, and should include all relatively more stative levels. It fails to include representatives of the third and fourth levels only because those notions are normally lexicalized as adjectives and thus not susceptible to the voice-displacement properties of verbs. Lexicalization of this type is a second source of apparent violations of hierarchical ordering.

Creek exhibits a similar lexicalization of certain statives, in this case as participials of active verbs. They include predicates of color, texture, and the like, and a few of shape (Haas 1974). They extend from the fourth into the third classes.

Balto-Slavic inherited from Proto-Indo-European a class of verbs with a long *ē suffix in the infinitive stem, thought by some to have comprised the stative verbs of a stative/active protolanguage (e.g. Perel'muter 1974). The early Slavic representatives of this class, based on Old Church Slavic vocabulary, included principally the following types. 11)

psych-verbs	*zīrēti	'look at'	*mīnēti	'think'
position	*sēdēti	'sit'	*visēti	'hang'
motion	*bēgēti	'run'	*letēti	'fly'

If the *ē verbs were indeed originally statives, they have expanded beyond the second class into the first, the verbs of motion. Ordinarily when stative/active systems yield to subject/object systems it is the active verbs that intrude into the stative domain. If the Balto-Slavic irregularity is not just the natural result of a system breaking down, these verbs deserve a careful, semantically-based search for internal chronology.

These examples can be schematically represented as follows. Arrows indicate presumed or attested directions of expansion; heavy vertical lines indicate at least partial class membership.

	Bats active verbs	Georgian 'static' verbs	Slavic *e verbs	Creek active ppls.	Hopi parts of speech
motion					
position (location)	↓	↑	↑		
shapes	(Adjec- tives)	(Adjec- tives)	(Adjec- tives)		Verbs and 'ambivalents' ↓
colors, textures, etc.				↑	*Adjec- tives

In summary, we have seen two separate implicational sequences. The first is headed by psych-verbs, and often uses subject or object displacement. The second centers on decreasing agency and discreteness (potency and activity, in the terms of Osgood et al. 1957), and is manifested in voice displacement distinctions in part of speech. Psych-verbs may function in both hierarchies. Viewed as perceptual states, they enter into the second; viewed as two-place relations with animate subjects, they initiate the first.

Several other verb classes are candidates for inclusion in one or the other hierarchy. In Slavic, verbs expressing motion of a body part govern the instrumental: Russ. maxat' rukoĵ 'wave the hand'. In several languages (Indo-European, Caucasian) verbs such as 'hit', 'touch' exhibit object displacement. Both examples are suspect insofar as a spatial relation can be invoked: to wave with the hand, to hit or touch on.¹²⁾ Verbs of possession may trigger special sentence constructions, e.g. genitive plus copula as used in the Caucasus and its analogs in nominative languages lacking a transitive have (Russian u menja est' 'I have', lit. 'to me is'). Where a transitive have exists it is usually a stative verb. Rather than genuine displacement, these facts seem to indicate borderline transitivity (for possession as location see Lyons 1968:388ff.). Voice displacement with verbs denoting weather and related phenomena is uninteresting in that such predicates lack logical arguments. The pan-Slavic instrumental with verbs 'smell', 'waft', etc. is conspicuous and tenuously connected to meteorological phenomena: Russ.

pa^xnet rozami 'it smells of roses (instr.)'
veet vesnoj 'there's a breath of spring (instr.)'

(See Mrazek 1964:193ff. for examples and a broader classification.) In Balto-Finnic such verbs would fit into the wider group of verbs of perception taking the ablative (allative, in eastern dialects) in the predicate nominal: Fi. tuoksua 'smell', näyttää 'seem, look', kuulostaa 'sound' (Eliseev 92ff.). We are back among the psych-verbs.

Rigorous attention to displacement per se, independent of its material realization, loses some explanatory value to the structuralist ideal. Clearly the morphosyntactic realization of displacement is not always arbitrary. It may have a transparent historical source, as when an ablative of separation is extended to evaluative or emotion verbs. Frequently it will have a synchronically motivated derivational source. For instance, languages having a dative case will almost invariably use it in the early phases of displacement. The category dative has some cross-linguistic validity as a morphological focus (although its peripheral functions will not always coincide): It has a double source: it is semantically assigned to nouns functioning as experiencers, goals, and/or beneficiaries; and it is syntactically assigned to the subject of an infinitive created by Equi. These rules, of course, overlap to a considerable extent. It is this substantive semantic fact that explains the parallel subject displacement of psych-verbs in both nominative and ergative languages. In both instances, the experiencer receives an oblique treatment as a result of displacement. Some of the early displacement of modals would then be due to syntactic assignment of the dative. (Since true modals and many peripheral modals may be used only with sentential complements, perhaps no modals will need to be analyzed as reflecting true displacement.) Otherwise we seem to find mirror-image displacement, although here we need more data. Emotion verbs, for instance, trigger object displacement in Finno-Ugric and Indo-European, but subject displacement in Avar.

Some languages are more prone to use displacement than are others, as is especially true of the first hierarchy. Uralic, Indo-European, and East Caucasian tolerate much more displacement than do West Caucasian, Basque, Paleosiberian, and apparently Turkic. Sometimes this absence of displacement may be internally supported. Paleosiberian languages exhibit a variety of 'subject' cases in response to animacy or gender-like properties of nouns (see Meščaninov 1967:Ch. V for a survey of construction types). Verbal displacement rules might overload such a system. The West Caucasian languages lack the variety of morphological cases required for subject and object displacement.

Displacement, when it occurs, follows universal lines. But the choice of whether or not to use it is language-specific, and language families seem to be remarkably conservative in this respect: recall the Indo-European verbs of authority, with a displacement pattern still visible after millennia of syntactic change and morphological renewal. Where not

internally conditioned, specific displacement patterns or a general absence of displacement could be diagnostic for genetic reconstruction. This conclusion has implications for the linguistic situation in the Caucasus. West Caucasian may well not tolerate subject displacement, but what is striking is its apparent failure to achieve with any other device the psych-displacement so characteristic of East and South Caucasian. Similarly, East Slavic fails to show certain minor displacement patterns of Balto-Finnic despite centuries of syntactic convergence. If all of these facts are not just illusions created by omissions from published grammars, we may have discovered an area of syntax sufficiently stable to support genetic hypotheses.

Footnotes

- 1 This paper originated in an effort to place the Slavic facts in areal and typological perspective. Thus the bias in the data base toward Eurasian languages and case languages. The quotation from Saussure appears on p. 172.
- 2 Obviously there are interdependencies among these three. Subject-selection failure typically alters voice in a nominative language; object-selection failure produces intransitive constructions in ergative languages.
- 3 It is admittedly unorthodox to include modals among the psych-verbs; but if the latter are defined by their experiencer argument, then modals also strongly govern a nominal which is better classed as an experiencer than as any other of the more or less standard nominal functions.
- 4 Bats also permits the standard ergative construction with these verbs: as (erg.) w-abc'o-s ho 'I (erg.) know you' (ibid.). h is a pharyngeal fricative (Cyrillic х). In both examples in the text, the direct object is in the unmarked case and the verb agrees with this noun.
- 5 The first-person dative is used only to simplify the examples, some of which may sound stilted in this form.
- 6 The modern genitive may have syncretized an older dative, reconstructed partly on the basis of these constructions (pro: Oinas 1961:8; con: Hakulinen 1961:69). The allative and adessive cases used with some of these same verbs probably represent a recent replacement under Balto-Slavic influence: minulla (adess.) on kylm# 'I am cold', minulle (all.) sopii 'it suits me'.
- 7 The reflexive form entails object-selection failure, since reflexives cannot normally govern accusative direct objects. This pattern is best analyzed as voice displacement, with object displacement only a by-product, because with very few exceptions it seems triggered by verbal semantics and is not contingent on transitivity and intransitivity.
- 8 Much the same displacement pattern is pan-Balto-Finnic and occurs in Hungarian as well; ibid.

9 For formal renewal and its mechanism see Kuryłowicz 1964: Ch. I. In Avar the result of formal renewal of emotion verbs among psych-verbs was the appearance of the areally unmarked dative experiencer. This favored morphological structure could have been achieved in many ways, however. Of interest here is only the fact that precisely the emotion verbs were singled out: displacement, following universal semantic lines, facilitated conformity to an areal tendency in morphology.

10 This statement can be worded more strongly. In some, but not all, stative/active languages, sentence construction types are lexically governed by verbs and subject to many lexical exceptions. In such languages, it is the stative verbs that are the marked, minor class. If only the verbs of motion were active, they would be the marked class; but this pattern seems not to occur.

11 The psych-verbs included also some verbs of speaking. Like 'look at', these are the agentive derivatives we have seen in displacement classes mentioned earlier. Also included were the stative two-place verbs *drgēti 'have, hold' and (with a different present stem) *jīmēti 'have'. Verbs of position, and perceptual phenomena corresponding to the fourth level of the hierarchy, are the most numerous representatives of the *ē class (as is also true of Baltic and Latin).

12 See Kuryłowicz 1964:185ff. for an interpretation of the genitive with 'touch', 'hit', etc. as a reduced construction.

References

- Bokarev, A. A. 1949. Sintaksis avarskogo jazyka. Moscow-Leningrad: AN.
- Čikobava, A. 1967. Gruzinskij jazyk. In V. V. Vinogradov, ed., Jazyki narodov SSSR, IV, 22-61. Moscow: Nauka.
- Dešeriev, Ju. D. 1953. Bacbijskij jazyk. Moscow: AN.
- Edel'man, D. I. 1974. O konstrukcijax predloženiya v iranskix jazykax. VJa 1974:1.23-33.
- Eliot, C.N.E. 1890. A Finnish grammar. Oxford.
- Eliseev, Ju. S. 1959. Sintaksičeskie slovosočetačnija v sovremennom finskom jazyke. Moscow: AN.
- Guxman, M. M. 1967. Konstrukcii s datel'nym/vinitel'nym lica i problema ergativnogo prošlogo indoevropskix jazykov. In V. M. Žirmunskij, ed., Ergativnaja konstrukcija predloženiya v jazykax različnyx tipov. Leningrad: Nauka.
- Haas, Mary R. 1946. A grammatical sketch of Tunica. In H. Hoijer et al., Linguistic structures of native America, 337-66. New York: Viking Fund.
- . 1974. Creek language teaching materials. University of California, Berkeley.
- Hakulinen, Lauri. 1961. The structure and development of the Finnish language. (Indiana University publications, Uralic and Altaic series, 3.) Bloomington.

- Klimov, G. A. 1965. *Kavkazskie jazyki*. Moscow: Nauka.
- Kuryłowicz, Jerzy. 1964. *The inflectional categories of Indo-European*. Heidelberg: Winter.
- Lane, G. M. 1898. *Latin grammar*. Cambridge: Harvard University Press.
- Lyons, John. 1968. *Introduction to theoretical linguistics*. Cambridge University Press.
- Meščaninov, I. I. 1967. *Ergativnaja konstrukcija v jazykax različnyx tipov*. Leningrad: Nauka.
- Mrázek, Roman. 1964. *Sintaksis ruskogo tvoritel'nogo*. Prague: SPN.
- Oinas, Felix J. 1961. *The development of some postpositional cases in Balto-Finnic*. (Suomalais-ugrilaisen Seuran Toimituksia, 123.) Helsinki.
- Osgood, C.E., G. Suci, P. Tannenbaum. 1957. *The measurement of meaning*. Urbana.
- Perel'muter, I. A. 1974. *Ob oppozicii "perexodnosti -- nepere-xodnosti" v sisteme indoeuropejskogo glagola*. VJa 1974:3. 70-81.
- de Saussure, F. 1916. *Cours de linguistique générale*. Paris.
- Whorf, B. L. 1946. *The Hopi language, Toreva dialect*. In Hoijer et al., op. cit., 158-83.