

A RELATIONAL TYPOLOGY OF DESIDERATIVES

Donna B. Gerdtz
State University of New York at Buffalo

This paper has two purposes. It seeks first to outline the properties of Desiderative constructions, that is, constructions involving an affix, auxiliary, or higher verb that means (or used to mean) 'want'. On the basis of data from several languages, section 1 describes three common types of Desideratives. Section 2 gives a formal account of the three Desiderative constructions within Relational Grammar; this is a straightforward matter given the concepts available in that theory.

Second, I discuss some data involving Passives and Desideratives from Halkomelem, a Salish language spoken in southwestern British Columbia. Section 3 shows that these data prove to be paradoxical within a relational treatment. Although I only refer peripherally to other frameworks here, it is clear that the Halkomelem data are problematic for analyses of Desideratives given elsewhere, including Grimshaw and Mester (1985) and Jensen and Johns (to appear).

The basic problem is that most theories share the assumption that 'control' structures will be cross-linguistically restricted to involve only the final subject of the complement predicate. For example, Government/Binding Theory, which represents the controlled nominal as PRO, limits PRO to surface structure complement subject, so (1) and (2) but not (3) or (4) are grammatical.

- (1) I want PRO to go.
- (2) I want PRO to be elected.
- (3) *I want John to like PRO.
- (4) *PRO wants John to be liked by him.

The Halkomelem data call this assumption into question. Either Desiderative constructions cannot be treated as the theory-equivalent of 'control' structures or the view of how syntax and semantics interface in such structures must be broadened.

The relational solution to the paradoxical Halkomelem data which I propose in section 4 is, in fact, based on a combination of these facts. Finally, section 5 presents a revised version of the cross-linguistic typology of Desideratives which makes use of the concepts developed under the relational account.

1. A Typology of Desideratives

An informal survey of the properties of Desideratives reveals that there are three common types cross-linguistically. Two major criteria distinguish the three types: first, whether or not the Desiderative adds an argument to the clause, therefore increasing its valence (section 1.1); second, whether or not the Desiderative actually means "want" or has taken on a future meaning (section 1.2).

The morphological realization of the Desiderative varies cross-linguistically as well as within languages. There appears to be some correlation between the above typology and the morphology of the Desiderative as briefly discussed in section 1.3. To facilitate this discussion, I refer to the entire construction as a Desiderative but to the morphological element--word, suffix, etc.--which carries the desiderative meaning as WANT.

1.1 Structure Building vs. Inheritance WANT

The first criterion for distinguishing Desideratives is whether or not WANT subcategorizes for a subject argument which will be the thematic agent in a manner similar to Causative constructions. Those which have an argument of their own I refer to as structure building. This concept is easily demonstrated by English examples like (5), where the subject "I" plays only one role in the sentence, that of "agent" of WANT.

(5) I want you to go.

In Desideratives which are the opposite of structure building, referred to here as inheritance Desideratives, WANT does not add a unique argument of its own but rather sponges off the structure of the inner predicate. This concept is most clearly illustrated in an ergative language, such as Eskimo, (6)-(7), or the Halkomelem, (8)-(9): [1][2]

(6) angutik tiki- guma-vuk
man-ABS arrive-want-3SG(SUBJ)
"The man wants to arrive."

(7) anguti-up annak taku-guma-vaa
man- ERG woman-ABS see-want-3SG(SUBJ)/3SG(OBJ)
"The man wants to see the woman."

- (8) ?i hənəm[?]-əl[?]mən[?] t^θə swəy[?]qe[?]
 aux go- want det man
 "The man wants to go."

- (9) ?i kʷən[?]-ət-[?]əl[?]mən[?]-əs t^θə swəy[?]qe[?] t^θə ʃəptən
 aux take- tr-want- 3erg det man det knife
 "The man wants to take the knife."

When WANT is attached to an intransitive predicate, as in (6) or (8), the Desiderative is also intransitive, as seen by the ABS case in (6) and by the lack of ERG agreement in (8). Transitive predicates, however, form transitive Desideratives as seen by ERG Case or Agreement in (7) and (9). Thus, the suffixes -guma in Eskimo and -[?]əlmən in Halkomelem are structure inheriting, they do not subcategorize for an argument of their own. In languages with two expressions of WANT, structure building vs. inheritance is often the distinguishing characteristic. In addition to -guma, Eskimo has a suffix -kqu 'want, order' which occurs only in structure building constructions, as illustrated in (10) and (11).

- (10) tiki- kqu- vauk
 arrive-order-3SG(SUBJ)/3SG(OBJ)
 "He orders him to arrive."

- (11) anguti-up annak tiki- kqu- janga
 man- ERG woman-ABS arrive-want-3SG(SUBJ)/3SG(OBJ)
 "The man wants the woman to arrive."

Since kqu adds an argument, the Desiderative is finally transitive even though the inner predicate tiki 'arrive' is intransitive. The two Eskimo WANTS contrast in this respect as seen by (6) vs. (10).

Korean has several forms of WANT, one of which is the auxiliary verb siph-ta, as in (12).[3]

- (12) Na-n+n ka-ko siph-ta
 I- TOP go-cmp want-ind
 "I want to go."

This form is not structure building, as * (13) shows:

- (13) * Na-n+n John-i/--+1 ka-ko siph-ta.
 I- TOP -NOM/ACC go-cmp want-ind
 ("I want John to go.")

Higher verbs like wenhata or palanta can be structure building, however, as in (14).[4]

- (14) Na- n+n John-i/--+1 ka-ki- l+l pala-n- ta.
 I- TOP NOM/ACC go-cmp-ACC want-pr-ind
 "I want John to go."

Halkomelem also makes use of this distinction. The suffix $-?əlmen$ only inherits structure [cf. (8)]; it cannot build structure as seen in *(15):

- (15) * $ʔi$ cən hənəm[?]-əl[?]mən tθə John
 aux lsub go- want det J.
 ("I want John to go.")

The higher predicate $s\dot{\chi}i?$, in contrast, is always structure building. This predicate, which appears in a nominalized form with the agent referenced as a possessive, takes a nominalized embedded clause, as illustrated in (16) and (17).

- (16) nə s- $\dot{\chi}i?$ k'wə-nə-s-nəm[?]
 lpos nom-want cmp- lpos-nom-go
 "I want to go."
- (17) nə s- $\dot{\chi}i?$ k'w-s- nəm[?]-s t^θə swəy[?]qe[?]
 lpos nom-want cmp-nom-go- 3pos det man
 "I want the man to go."

As seen especially in (16), $s\dot{\chi}i?$ and the embedded predicate each have a subject argument, hence the double occurrence of the 1st person possessive prefix.

Structure building vs. inheritance is therefore seen to be a major criterion distributing WANT in Eskimo, Korean, and Halkomelem.

1.2 Linked vs. Free WANT

The above discussion has centered on the argument structure of Desideratives. Consideration of their semantics provides a second means for distinguishing them. In the case of structure building WANT, the argument added to the construction by WANT is always the agent. Inheritance WANT is more complicated: since WANT does not have an argument of its own, it will either link onto an argument of the inner predicate or it will be semantically free.

The former case is illustrated by the Halkomelem examples in (8) and (9) above. For example in (8), the subject man is interpreted as being both the actor of 'go' and the agent of 'want'. In other words, linked WANT selects an argument of the inner predicate for its semantic

interpretation.

In contrast, free WANT will remain unlinked. No nominal is uniquely singled out as the agent but rather WANT will be taken to modify the entire inner predicate. Free WANT is thus semantically more akin to aspect or mode and often takes on the meaning of a habitual or near future.[5] English 'want' can be used in this sense, as in the examples in (18)-(19).[6]

- (18) Does your car want to/ wanna stall in first gear?
 (19) This glue doesn't want/wanna to stick.

Some languages, for example Korean, do not have this latter type of WANT. Thus, -siphta discussed above only appears in situations where there is clearly an animate agent.

Linked and free WANT are sometimes difficult to differentiate, especially in languages like Halkomelem where the same form is used for both. Linked WANT can often be recognized because it places semantic restrictions on the agent. In contrast, free WANT is blind to the properties of the nominals, looking only for congruity between the clause and whatever aspectual qualification WANT expresses in the language.

Halkomelem -ʔəlmən is a case of linked WANT. This can be seen by contrasting (20) and (21):[7]

- (20) ʔi cən { hənəmʔ-ə1ʔmənʔ
 aux lsub { go- want
 { he.yʔ- ə1ʔmənʔ
 { build canoe-want
 { ʔiʔtənʔ-ə1ʔmənʔ
 { eat- want
 "I want to go/build a canoe/eat."

- (21) *əwə cən ʔi.nʔ { papəs-ʔə1ʔmənʔ
 neg lsub aux-lssub { get hit- want
 { ʔiʔtəc'- ʔə1ʔmənʔ
 { get cut- want
 { ʔiʔk'w- ʔə1ʔmənʔ
 { get lost- want
 ("I don't want to get hit/get cut/get lost.")

In (20), where the inner predicate is agent-oriented, -ʔəlmən is possible, but in (21) where it is patient-oriented, -ʔəlmən is impossible, even though the clauses seem perfectly logical, especially in the negative as in (21). Examples like (21) would be rendered by the structure building sʔiʔ,

for example (22).

- (22) ʔəwe nə s-^ʔiʔ k'wə-nə- s- pəpəs
 neg lpos nom-want cmp-lpos-nom-get hit
 "I don't want to get hit."

However, Halkomelem -ʔəlmən also appears with patient-oriented predicates, but in these cases the Desiderative construction is clearly representing a natural or unavoidable future, as in (23)-(24)

- (23) ni cən tu wəʔ məq'- ʔəlmən
 aux lsub just already full- want
 "I'm getting rather full."
 (24) ʔi q'wəq'wəlʔ-əlʔmənʔ t^θə sθ'u.mʔ
 aux ripe -want det berry
 "The (last of the) berries are almost ripe."

I take these to be cases of free WANT; e.g., it is nonsensical to ascribe "wanting" to "the berries" in (24).

The two types of -ʔəlmən are clearly different semantically as shown by the fact that a Desiderative with s^ʔiʔ can be substituted for the former but not the latter, cf. (16) vs. *(25).

- (25) * s-^ʔiʔ-s k'w-s- q'wəq'wəlʔ-s t^θə sθ'u.mʔ
 nom-want-3pos cmp-nom-ripe -3pos det berry
 ("The berries want to be ripe.")

1.3. Summary: Desiderative Morphology

The data discussed above support a three-way typology of Desideratives as summarized in Table I. Each language discussed shows an interesting correlation between the type of Desiderative and its morphological realization. Although a small sample, these languages suggest several generalizations.

All three types of Desideratives seem to exist in English and the same verb form want is used in each case. [8] Korean, Eskimo, and Halkomelem have two forms of Desideratives, one for structure building and a second for inheritance. In Korean and Halkomelem, the former is a free verb form (albeit nominalized in Halkomelem) and the latter is a verbal suffix; in Eskimo, both types of WANTS are verbal suffixes. Although it may seem that there is no correlation between the form and type of the Desiderative, I am unaware of a language where inheritance WANT is a free form while structure building WANT is an affix suggesting

that, where a language allows predicates to be expressed as verbal affixes, this option will very likely be taken for inheritance WANT. This makes sense when the close structural and semantic ties between inheritance WANT and the inner predicate are considered.

The fact that there are languages like Korean which do not seem to have free WANT, where a future meaning is assumed, suggests that the future use is an extension of other types of WANT, rather than vice versa. Furthermore, that free WANT in Halkomelem shares a form with linked WANT rather than structure building WANT is no accident under the above typology. It is easy to see that since linked and free WANT have the same argument structure, a small shift in the semantics, i.e., the delinking of the agent of WANT, is all that is needed to develop the latter from the former.

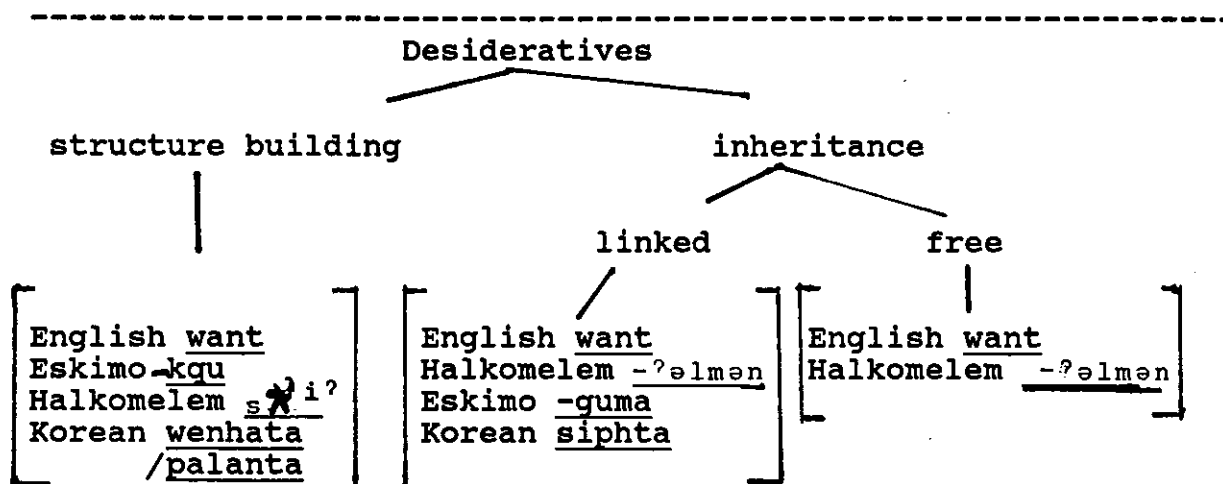


TABLE I. A Typology of Desideratives

2. A Relational Analysis: Desiderative Union

The previous section presented a pre-theoretical survey of the basic types of Desideratives which appear cross-linguistically. This section gives a Relational Grammar analysis of the three types of Desideratives discussed above.

Desideratives, like Causatives, can be expressed in several ways: WANT can be a higher verb, a serial verb, an auxiliary, or an affix. Higher verb WANT appears in a periphrastic construction which is bi-clausal at surface structure. Examples of this include Halkomelem s^hi? as in (16) and (17), where it is clear that there are two clauses in the surface form since agreement is referenced on both

the main and complement clause predicates, and Korean as in (14) where the nominalized complement clause can take ACC case. English also provides evidence for a bi-clausal surface structure; in examples like (26) reflexives, obligatory with a clausemate antecedent, are not possible:

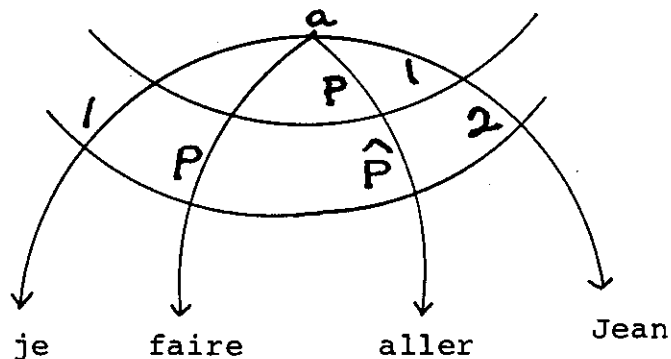
(26) *I wanted John to see myself.

Other than the fact that periphrastic constructions may involve raising or control, they are essentially uninteresting from a relational viewpoint.[9] This paper focuses on the challenging topic, Desideratives expressed by verbal affixes or auxiliaries which are mono-clausal at surface structure.

The key point of the relational analysis of monoclausal Desideratives comes from the view of Clause Union constructions developed by Davies and Rosen (to appear). They reformulate Clause Union, formerly thought to be a merger of two clauses, as a totally mono-clausal construction. For example, under their analysis, the French Causative in (27) would be represented as in the stratal diagram in (28).

(27) J'ai fait aller Jean.
"I made Jean go."

(28)



A single node (a) is the tail for all arcs in (28); thus, by definition, it represents a single clause. However, there are nonetheless two P(predicates) in (28): aller, which will be referred to as the P1 and faire, as the P2. Moreover, each P has a set of nominals related to it; the P and the nominals which share some stratum with it will be referred to as a P-sector. The P-sector for the P1 is the P1-sector, etc. Elements which originate in the P2-sector are referred to as P2-entrants; je is a P2-entrant 1 [subject].

Under this modified view of Clause Union, the entrant P and its accompanying nominals--in this case, a 1--take priority over the elements in earlier P-sectors; the earlier elements adjust according to the following schema: [10][11]

- (29) (i) A P_n-sector final 1 may be revalued as an initial 2 or 3 in the P_{n+1}-sector (per language specific instructions)
(ii) Otherwise, all elements inherit their relations subject to the Stratal Uniqueness Law.

The Stratal Uniqueness Law (Perlmutter and Postal 1983, revised Davies and Rosen to appear) will allow only one element bearing a P, 1, 2, or 3 relation in a stratum.

We see the effect of (29) in the Causative in (28). The P₁-sector 1 is revalued as a 2 in the P₂-sector; the P₁ is placed en chomage; P-chomeurs appear as infinitives in French.

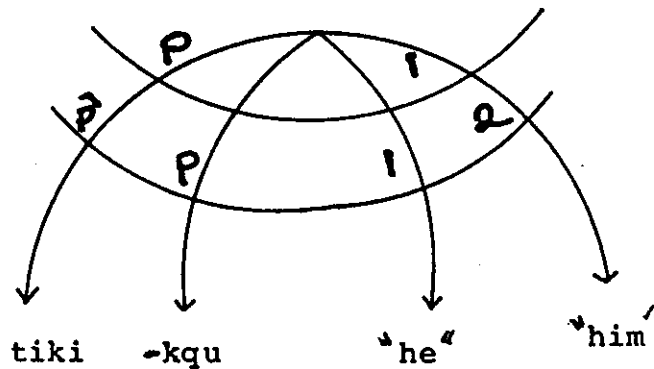
Turning now to Desideratives, we see that the constructs introduced above allow for an account of the three types given in section 1. The basic idea is that Desideratives where WANT is expressed as an auxiliary or verbal affix are multi-predicate clauses involving "Desiderative Union".[12] An analysis of structure building vs. inheritance cases is presented in section 2.1. One additional mechanism is required to distinguish linked vs. free WANT, as discussed in section 2.2.

2.1 Structure Building vs. Inheritance

Structure building vs. inheritance Desideratives are easily distinguished within a Union analysis; I demonstrate this using Eskimo -kqu and -guma.

Structure building Desideratives are exactly like Causatives; the entrant P will bring along an argument of its own--a 1 nominal; the P₁-sector elements adjust according to the schema in (29).[13] Thus, an example like (10) above will be represented as in (30), which is exactly parallel to the French Causative in (28) above.

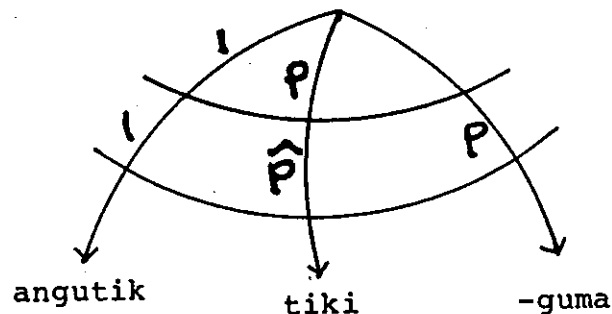
(30)



In Eskimo, the P1-sector 1 is revalued as a 2 (hence it appears in ABS case and is referenced by OBJ agreement); the entrant 1 is the final 1 (hence it appears in ERG case and is referenced by SUBJ agreement). As seen by examining the verbal morphology in (10), the P2 follows the P1 in Eskimo.

In inheritance Desideratives, the entrant P is not accompanied by an argument.[14] Thus, the nominals of the P1-sector are free to inherit their relations according to (29), as illustrated in (31), the representation of (6):

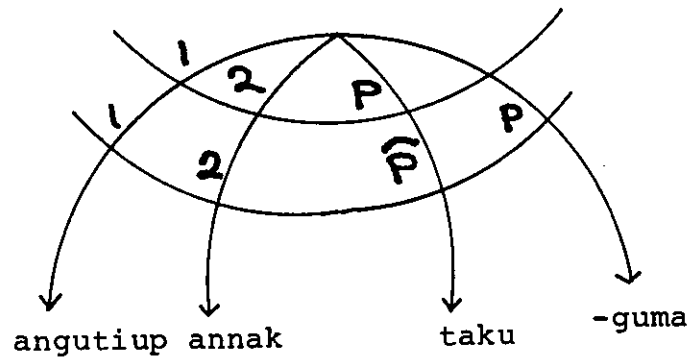
(31)



As (31) shows, the final stratum is intransitive (there is a 1 but no 2); the final 1 appears in the ABS case and is referenced by SUBJ agreement.

In an example like (7), where P1 is transitive, both the 1 and 2 inherit their relations, as represented in (32), hence they appear in the ERG and ABS cases respectively:

(32)

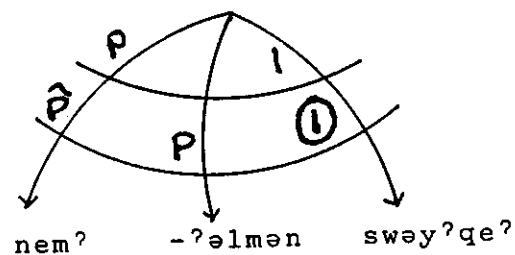


The difference between structure building and inheritance Desideratives--whether or not WANT brings in its own argument--is captured very simply under this account. Also the final transitivity of (10) and (7) but the final intransitivity of (6) are handled without further device.

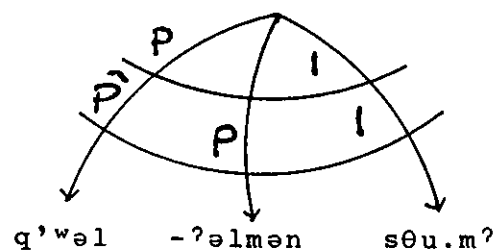
2.2 Linked vs. Free Desideratives

The concept 'initialized' (Davies and Rosen to appear) can be used to capture the difference between linked and free Desideratives. [15] A initialized nominal has a dual status: it both inherits its P1-section relation and it is a P2 entrant of the same relation. I will use Halkomelem to illustrate this concept. A case of a linked Desiderative as in (8) is represented in (33) while a free Desiderative as in (23) is represented in (34).

(33)



(34)



The above clauses are both finally intransitive (as evidenced by the lack of ERG agreement). The difference between them is that the 1 is initialized in (33), as represented by the circle around the P2-sector 1, while the 1 in (34) is not. [16] Initialization captures the fact that the subject in (33) bears semantic roles to both the P1 and P2 without complicating the analysis by positing additional structure for which there is no surface evidence.

3. A Morphosyntactic Paradox

The previous section presented a relational analysis for the three types of Desideratives discussed in section 1. This section presents some data involving Passives and Desideratives which provides a challenge to the above analysis (section 3.1). I point out that another Amerindian language, Micmac, has been noted to have a similar construction (section 3.2). However, due to morphological differences between the languages, the analysis given for Micmac cannot be extended to Halkomelem (section 3.3). Thus, a problem for the syntactic analysis of Desideratives arises.

3.1 Passives and Desideratives in Halkomelem

Many types of constructions can appear in the P1-sector of Halkomelem - ?əlmən, including Passive as (35)-(36) exemplify:

(35) ?i c'ec'əw-ət-əm?-əl'mən? θə Mary ?ə-λ' John
 aux help- tr-intr-want det M. obl-det J.
 "John was wanting to help Mary."
 /*"Mary was wanted to be helped by John."

(36) ?i ?ə-ɪ ?u le?ləm-n-əm? ɪə sieni?
 aux int-pst just look- tr-intr-want det woman
 ?ə-λ' John
 obl-det
 "Was John wanting to see the woman?"
 /*"Was the woman wanting to be seen by John?"

The characteristics of a Halkomelem Passive (see Gerdts 1981, to appear) are the presence of both transitive and intransitive verbal suffixes, lack of ERG agreement, and the presentation of the 1-chomeur in the oblique case, as can be seen by contrasting the active clause in (37) to its passive equivalent in (38): [17]

- (37) ?i le?lɛm?-nɛx^w-əs k^wθə swəy[?]qe[?] ɬə sɬeni[?]
 aux look- tr- 3erg det man det woman
 "The man is seeing the woman."
- (38) ?i le?lɛm?-n-əm[?] ɬə sɬeni[?] ?ə k^wθə swəy[?]qe[?]
 aux look- tr-intr det woman obl-det man
 "The woman is being seen by the man."

What is noticeable in cases involving Passive and Desiderative is the semantics: the initial l of the Passive (the final l-chomeur) and not the final l is interpreted as the agent of WANT. This may seem strange, especially considering that most languages link with the final l, as in the English data in (39); in fact, it might be claimed that the purpose of Passive in (39) is to allow John to link with WANT.

- (39) John wanted to be arrested by the police.

However, from a Halkomelem viewpoint, such an interpretation is not altogether surprising for two reasons: first, the Passive functions very differently in Halkomelem than in languages like English, and second, a Desiderative linking to the agent as in the English (39) can be expressed otherwise in Halkomelem.

Certain restrictions on Halkomelem clause structure make Passive unavoidable in some cases. For example, 3rd person proper nouns are banned from appearing as surface ergatives in Halkomelem hence *(a), rather the passive (b) is used.

- (40) a. * ni c'ew-ət-əs k^wθə John ɬə sɬeni[?]
 aux help-tr-3erg det J. det woman
 ("John helped the woman.")
- b. ni c'ew-ət-əm ɬə sɬeni[?] ?ə-λ' John
 aux help-tr-intr det woman obl-det J.
 "The woman was helped by John."

This restriction carries over to -?əlmən clauses, as (41a) vs. (1b) shows:

- (41) a. * ni c'ew-ət-?əlmən-əs k^wθə John ɬə sɬeni[?]
 aux help-tr-want- 3erg det J. det woman
 ("John wanted to help the woman.")
- b. ni c'ew-ət-əm-?əlmən ɬə sɬeni[?] ?ə-λ' John
 aux help-tr-intr-want det woman obl-det J.
 "John wanted to help the woman."

If the meaning of (b) is to be expressed, $-?əlmən$ would have to link with the 1-chomeur since this nominal is unable to appear as a final 1.

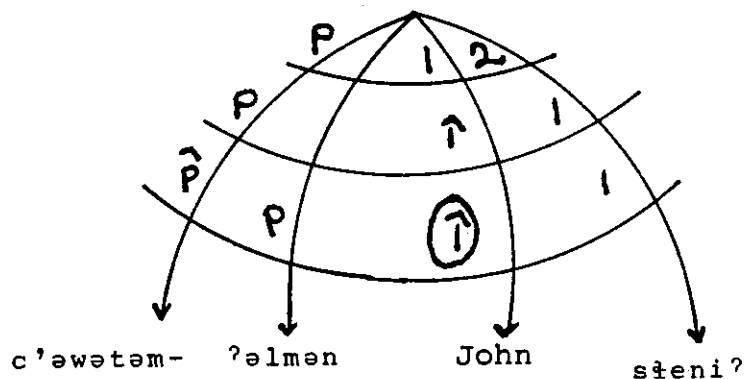
Furthermore, Halkomelem has another means of expressing WANT, as discussed in section 1, the higher predicate $s\lambda'i?$ which takes a nominalized complement clause, as in (16) above. Since the 1 of $s\lambda'i?$ can be coreferent with the final 1 of a complement Passive, sentences like (43) are possible.

- (43) $s\lambda'i?$ -s $ʔə$ $s\lambda'eni?$ $k'w$ -s- $c'ew$ - $ət$ - $əwət$ $ʔə$ - λ' John
 want-3pos det woman cmp-nom-help-tr-intr obl-det J.
 "The woman wants to be helped by John."

We see that the two Desiderative constructions allow either the agent of the Passive, as in (41b), or the final 1 of the Passive, as in (43), to be interpreted as the agent of WANT.

Irregardless of the language internal motivation for these constructions, the semantics of the linked $-?əlmən$ in the above Passives is problematic to the analysis of Desideratives presented in the previous section. An analysis of (41b) involving an earlier level Passive then Desiderative Union would be represented as in (44):

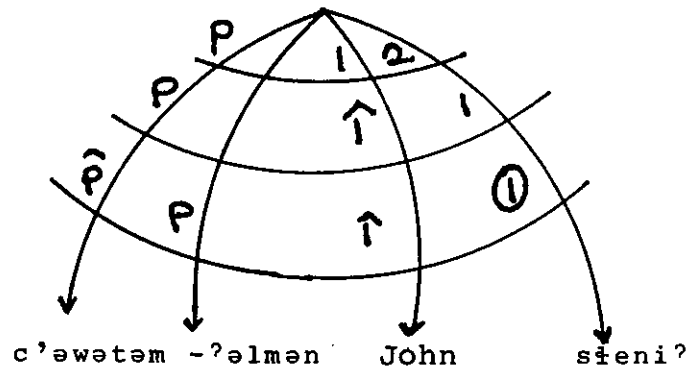
(44)



Since the 1-chomeur is the agent of WANT, it should be initialized as represented in (44). However, such an analysis makes it impossible to make a syntactic generalization about initialized nominals in Halkomelem, since, as seen in (33) above, $-?əlmən$ typically initializes a 1. Furthermore, an analysis which would posit the initialization of the final 1 as in (45) would predict the

wrong semantics; the final 1--not the 1-chomeur-- would be the agent of WANT, an interpretation which is not available with-?əlmən.

(45)



3.2 Micmac: A Syntactic Solution

A similar problem has been noted in the Algonquian language Micmac in Frantz (1976a,b, 1986). Micmac has a Desiderative prefix as illustrated in (46).

(46) Ketu-pma:l- k
 want-carry-ls:3s
 "I want to carry him."

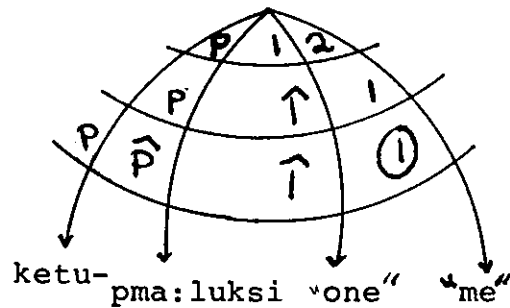
Micmac also allows a Desiderative of a Passive, as (47) shows.

(47) Ketu-pma:l- uksi-∅
 want-carry- pass-ls
 a. "I want to be carried."
 b. "One wants to carry me."

Like Halkomelem, it is possible to interpret the 1-chomeur (unspecified) as the agent of WANT as in the (b) gloss, but, unlike Halkomelem, the final 1 can also link to WANT, as in the (a) gloss.

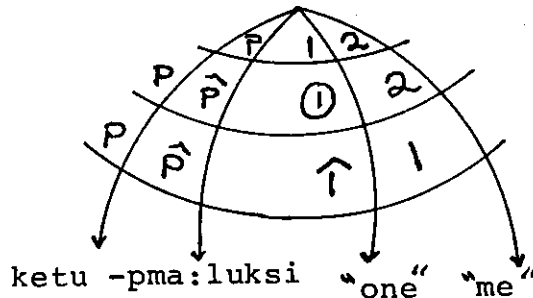
Recasting Frantz's analysis into the current framework, (47) under the (a) reading would be represented as in (48); here there is Passive in the P1-sector; the final 1 of the Passive is initialized as the 1 of the entrant P.

(48)



In contrast, (49) represents the (b) reading; the initial 1 is initialized as the 1 of the entrant P; then there is Passive in the P2-sector and the 1 of the entrant P is a final 1-chomeur.

(49)



The differences between the (a) and (b) readings are accommodated without additional mechanism. Furthermore, a simple generalization concerning initialization is possible. The nominal which is initialized as a 1 is also the nominal which inherits the 1-relation in the P2-sector.

3.3 The Satellite Principle and Halkomelem Morphology

However, Frantz's analysis for Micmac does not provide a solution for Halkomelem due to a morphological difference between the two languages. I claim that the ordering of verbal morphology correlates with the relational structure of a clause according to the Satellite Principle (Gerdt's 1980, 1981):[18]

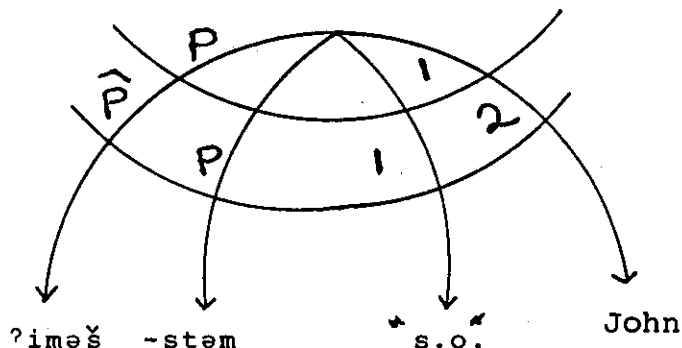
(50) The Satellite Principle;

Affixes are ordered from the root outward--that is, suffixes are ordered from left to right and prefixes from right to left--according to the order of the syntactic levels.

For example, the Halkomelem clause in (51) involves Causative and then Passive, as represented in the stratal diagram in (52).

- (51) ni [[{?imeš-} st] -əm] kʷθə John
 aux [[{walk-}caus]-intr] det J.
 "John was made to walk."

(52)



Since the Causative is in the C2-stratum and the Passive is in the C3-stratum, the Satellite Principle correctly predicts that the causative affix precedes the intransitive suffix marking Passive, as seen in the bracketing in (51).

Returning to the Micmac examples above, we see that because WANT is a prefix while the passive is a suffix, two different bracketings may be posited corresponding to two syntactic analyses. The analysis in (48) would be bracketed as in (53) since Passive is in an earlier stratum than Desiderative Union, but (49) would be bracketed as in (54) since Desiderative Union is in an earlier stratum than Passive.

- (53) [[ketu- [[pma:1] -uksi]]
 [[want- [[carry] -pass]]]

- (54) [[ketu- [pma:1]] -uksi]
 [[want- [carry]]- pass]

In Halkomelem, where both the Passive and Desiderative are represented by suffixes, the morphological bracketing, given in (55), indicates an analysis with Passive in an earlier stratum than Desiderative Union, i.e., the analysis in (45) above. [19]

- (55) {{{cew } -ət-əm] -ʔəlmən]
 [[[help]-tr-intr-] want]

However, in (45) the final 1 of the P1-sector initializes as the 1 of the entrant P and should be interpreted as the agent of WANT; but as discussed above, the wrong nominal is posited as the agent of WANT under this analysis.

Thus, we have a paradox.[20] The syntactic representation demanded by the semantics (i.e., one parallel to (49) above) and that demanded by the morphology ((45)) do not fit. Since Gerdtz 1981 shows that the Satellite Principle holds otherwise to all constructions in Halkomelem, a polysynthetic language, we can assume that it should also hold in the case of the Desiderative. Therefore, an analysis involving Passive in an earlier stratum than the Desiderative is the correct one for Halkomelem. Given that, we must conclude that the view of semantics and its representation in Relational Grammar requires revision, since the semantics is inappropriately represented in (45). Some doubt is also cast on the Micmac analysis above, since no motivation outside of the semantic needs of the theory has been given for the morphological bracketing.

I attempt a revised view of the semantics of Desideratives in section 4. But first I give an additional case of a construction where an entrant P links with an agent to show the relevance of the issue cross-linguistically and across construction types.

3.4 An Additional Problem Area: Motion Auxiliaries

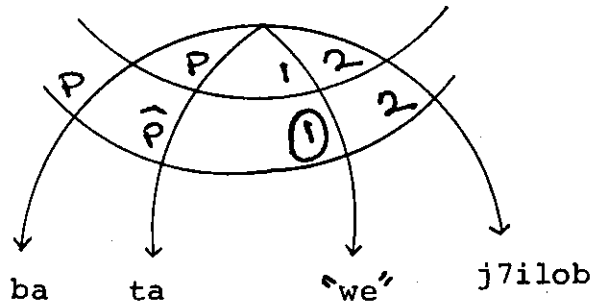
Another case of the semantic agent taking priority over the final 1 has been noted by Aissen (1984). In Tzotzil, several motion verbs (e.g. bat in (56)) also serve as auxiliaries (e.g. (57)).

(56) L- i- bat-otikotik.
cp-B1-GO- lplexc
"We went."

(57) Ba j- ta- tikotik j7ilol.
WENT A1-FIND-lplexc SHAMAN
"We went to find a shaman."

Examples of this type can also be analyzed as multi-predicate clauses; the auxiliary may be treated as an entrant P, for example (57) could be represented as in (58).

(58)



Passives such as (59) can appear with a motion auxiliary as in (60).

(59) L- i- 7ak'-b- at jmoton y-u7un kamikotak.
 cp-B1-GIVE-io-pass MY-PRESENT A3-BY MY FRIENDS
 "I was given my present by my friends."

(60) 7ech' 7ak'- b-at- ik- on jmoton
 PASS GIVE-io-pass-subj-B1 MY PRESENT
 "My friends passed by to give me my present."

That (60) is a Passive can be seen by the passive morphology and the presentation of the agent in a by-phrase. As Aissen notes, (60) is interpreted as involving the motion of the agent and not the final 1 of the Passive; that is, (60) cannot mean "I passed by to be given my presents by my friends".

Auxiliary constructions in Halkomelem exhibit the same phenomenon. The predicates nem? 'go' and mi? 'come' appear frequently as auxiliaries, for example in (61).

(61) ni nem? ləw?iləm
 aux go go in
 "He went in."

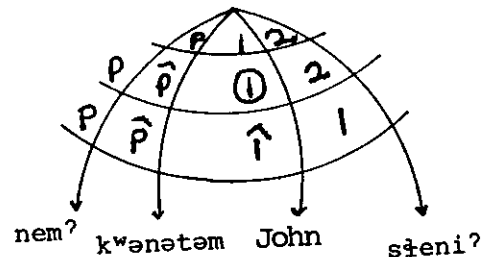
When a Passive follows the auxiliary as in (62), the agent--not the final 1--is moving.

(62) ʔe? wət nem? kwən-ət-əm θə sieni? ?ə-ʔ John
 too then go grab-tr-intr det woman obl-det J.
 "John went to grab the woman."
 /*"The woman went and was grabbed by John."

Aissen (1984) does not give an analysis for constructions like (60) though she suggests a Union analysis

might be appropriate. However, such an account would be problematic. The semantics of (60) and (62) would indicate an analysis in which Union is earlier than Passive, as in (63); the agent is initialized as the 1 of the motion auxiliary.

(63)



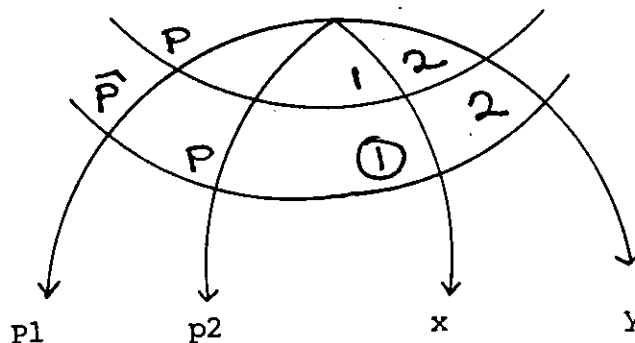
However, an analysis like (63) gets no support from the morphological structure of either Tzotzil or Halkomelem since the passive morphology appears on the P1 in both languages. As with the Micmac case above, there is no motivation outside of the semantics for analysis (63).

4. Semantics and Syntax Interface

Although the interface of syntax, semantics, and morphology is easily accomplished in Relational Grammar for a large number of constructions, the more exotic cases of Desideratives and motion auxiliaries discussed above are problematic to the theory. Assuming that the Satellite Principle is well-motivated and thus the syntactic analyses presented above are adequate, I am faced with the task of providing a semantic solution to the problem of agent linking.

To put the problem into more concrete terms, the flaw is introduced with the concept of initialized nominal. This concept seeks to capture the fact that a single nominal can have a semantic relation to more than one P of the clause. For example, in (64), the nominal x is the agent of both P1 and P2.

(64)



The nominal y , on the other hand, since it is not initialized, has only a single semantic role, that of patient of P1. The problem with Desideratives and the Halkomelem Passive is that a 1-chomeur would be initialized, as in (44), making it impossible to state a generalization about the grammatical relation of the initialized nominal since it is a 1 in other constructions. I conclude that initialization must be abandoned; without initialization, linked and free Desideratives must be differentiated elsewhere in the grammar. I turn to that task now.

4.1 Inheritance and SR-to-GR Mapping

A working assumption in Relational Grammar is that initial grammatical relations will have some semantic role assigned to them and that, furthermore, semantic relations (agent, patient, etc.) correspond to specific initial grammatical relations (1, 2, etc. respectively), though not vice versa; I refer to this as the SR-to-GR mapping principle.[21]

This principle works for P-initial strata as well. Entrant Ps vary in the number and type of semantic roles they assign. For example, causatives vary cross-linguistically; in some languages the Causative assigns only one role--the agent (i.e., the causer), but in other languages two roles are assigned--the agent and the patient (i.e., the causee). Nevertheless, the agent is a P-initial 1 and the patient is a P-initial 2, as required by SR-to-GR mapping.[22]

The exceptions to this principle seem to be limited to cases of inheritance, e.g. Desideratives in Halkomelem and motion auxiliaries in Tzotzil and Halkomelem; as discussed above, the agent in these cases is not the P-initial 1. However, SR-to-GR mapping is not random as the agents are nonetheless mapped to an initial 1--that is, the initial 1 in the previous P-sector. The problem is to explain why the exceptional cases are allowed to map in this fashion.

I propose that the explanation lies in the view of the inheritance constructions expressed above: with linked WANT, the entrant P has an agent role to assign but, since it does not bring in any arguments of its own, an initial 1 must be found for the agent to map to.

4.1.1 Mapping to the 1 in the Entrant Stratum

The simplest way of doing this is to map the agent to the 1 in the same stratum as the entrant P, i.e., the entrant stratum. In fact, many languages do this. For example, in Korean, it is clear from examples that involve Passive in an

earlier P-stratum, e.g. (65) and (66) that the inherited 1 is also the agent of WANT.

- (65) Na-n+n chepho-toi-eci-ko siph-ta.
I- TOP arrest-get-become-cmp want-ind
"I want to get arrested."
(e.g., at a demonstration)
- (66) Mary-n+n John-eykey ipmachu-eci-ko siph-et- ta.
M. -TOP J -DAT kiss-become-cmp want-pst-ind
"Mary wanted to be kissed by John."

4.1.2 Mapping to Initial 1

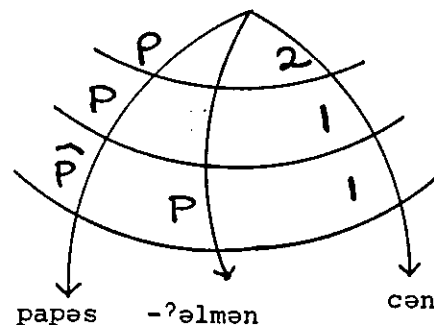
However, a language could also stipulate that the agent of a P in an inheritance construction could map to the initial 1 of the previous P-sector, as with Halkomelem WANT and motion auxiliaries and Tzotzil motion auxiliaries.

This view of mapping in Halkomelem together with the Unaccusative Hypothesis (Perlmutter 1978) allows for an account of the Halkomelem data in (20) and (21) above.

The two classes of predicates discussed above --agent-oriented and patient-oriented--would be syntactically distinguished under the Unaccusative Hypothesis. The former would be Unergative predicates which take an initial 1 (for example in (31) above); the latter Unaccusative predicates which take an initial 2, for example, *(67) as represented in (68).[23]

- (67) *ʔəwə cən ʔi.nʔ papəs- ʔəlʔmənʔ
neg lsub aux-lssub get hit-want
("I don't want to get hit.")

(68)



The initial 2 in (68) advances to 1 in the P1-sector, and then inherits in the P2-sector.[24] However, if SR-to-GR mapping with Halkomelem WANT proceeds as above--the agent of WANT maps to the initial 1 of the previous

P-stratum--mapping cannot take place in *(67) since there is no initial 1 --only an initial 2--as seen in (68) and thus the sentence is uninterpretable.[25]

Under this view of linking, Unaccusatives are predicted to behave differently in a language like Halkomelem which links to initial 1 and a language like Korean which links to entrant 1. Unaccusatives are, in fact, allowed in the previous P-sector in Korean, as in (69).[26]

- (69) John-+n neme-ci- ko siph-ci anh-ta.
 J. -TOP fall-become-cmp want-become not-ind
 'John doesn't want to fall.'

Although John is an initial 2 in (69), it advances to 1 and inherits that relation in the entrant stratum. The agent of WANT maps to the entrant 1 as expected in Korean.

4.1.3 Mapping to an Undefined Initial 1

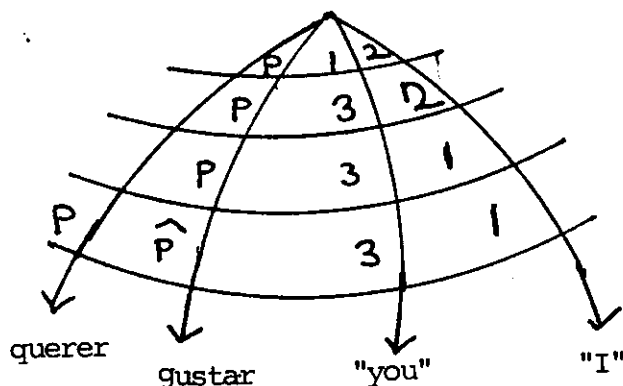
Finally, languages could exist where the condition on mapping the agent to an initial 1 makes no reference to the P-sector of the 1. In this case the agent could map to either the initial 1 or the entrant-stratum 1. Micmac, where either the initial 1 or the final 1 in a Passive can be taken as linking to WANT, could be such a case.

Data from Spanish querer discussed by Gonzalez (1985) may also exemplify this. She points out that, for some speakers of Chilean Spanish, (70) has two meanings.

- (70) Te quiero gustar.
 to you want-1sg like
 a. "I want you to like me."
 b. "You want to like me."
 /"You are starting to like me."

According to Gonzalez, constructions with gustar involve Inversion, that is, its initial 1 demotes to 3. Recast into the framework used here, (70) would be represented as (71).[27]

(71)



Under the claim that the agent of querer could map to any initial 1, then either the initial 1 'you' or the entrant-stratum 1 'me' could be taken as the agent, as in the (b) and (a) readings respectively.

4.2 Four Types of Inheritance Structures

The view of semantic role mapping in inheritance structures presented above provides a simple account of differences within and across languages without resorting to an overall weakening of the principle of SR-to-GR Mapping. Under this approach, four patterns of linking will be possible in inheritance structures, as summarized in (72); the agent will map to the initial 1, the entrant 1, both, or, in Free Desideratives, neither:[28]

(72)	agent maps to:	Example:
(i)	no agent	Halkomelem, Chilean Spanish
(ii)	initial 1	Halkomelem (WANT and motion aux), Tzotzil (motion aux)
(iii)	entrant 1	Korean, (Eskimo)
(iv)	either	Micmac, Chilean Spanish

Linking to the entrant 1, I believe, is the 'unmarked' case, both in the sense of being cross-linguistically most prevalent and also in being preferred by the theory. Under this view, is it no surprise the WANT in the Spanish example in (70) above is shifting to a future meaning under the (b) reading; the (b) reading is a case of linking to initial 1, which can be regarded as the less preferred reading. Therefore, it is a natural for the form to be interpreted as being agentless and hence a free Desiderative arises. This point of view leads me to expect that if a language uses a different form for initial 1 and entrant 1 marking, it is the former, not the latter, which will be a source for future in the language.

One of several formal devices could be used to instantiate the language specific information regarding linking in the grammar. One obvious approach is to stipulate the SR-to-GR mapping as part of the lexical entry of WANT, motion auxiliaries, etc.[29] Whatever mechanism is used, by placing the responsibility of the semantic

interpretation of inheritance structures outside of the syntactic representation, I allow for a maximally simple syntax. In fact, free and linked Desideratives will have identical syntactic structures.

5. Conclusion.

Taking the refined view of inheritance structures into account, I posit a revised typology for Desideratives in Table II:

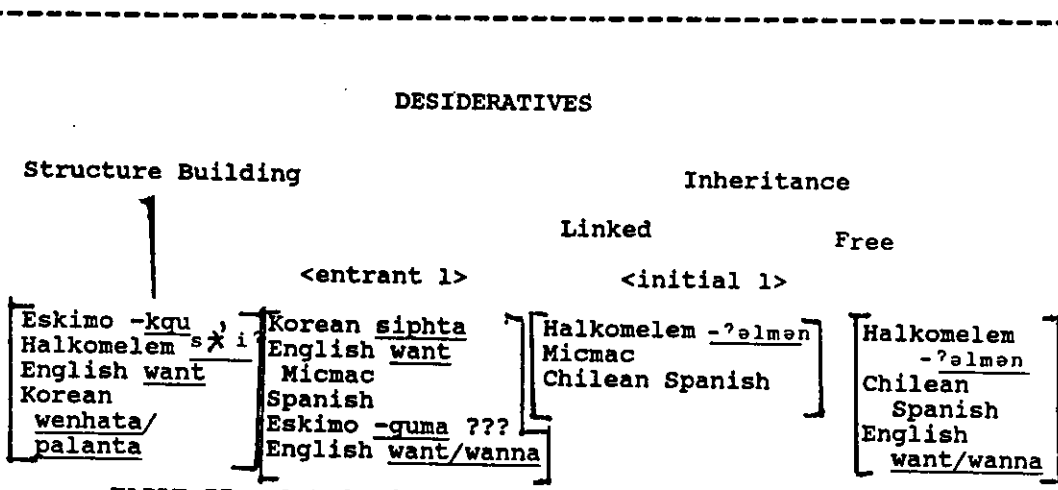


TABLE II. A Relational Typology of Desideratives

Several types of concepts are represented in Table II; each is taken to be a property assigned to the various WANTS within a language and cross-linguistically. Structure building vs. inheritance stipulates whether or not WANT increases the valence of the construction to which it is added. Linked vs. free is stipulated as part of the semantic information associated with WANT. Furthermore, Linked WANT requires a semantic statement stipulating precisely the initial 1 that the agent links to.

It is this last property of Desideratives that is straightforwardly accommodated under a relational treatment. A divorce of semantic linking to a predetermined syntactic level in the case of entrant predicates makes the parametricization of semantic linking possible. By including this information elsewhere in the grammar (e.g., the lexicon), the syntactic analyses will be maximally

simple: free and linked Desideratives will have identical syntactic structures.

NOTES

[1] These Eskimo data, taken from Grimshaw and Mester (1985), are ultimately from L. Smith; see Grimshaw and Mester for references and information concerning glosses.

[2] The Halkomelem data herein are from the late Arnold Guerin of the Musqueam Reserve, Vancouver, British Columbia. My work on Halkomelem has been supported by the Elizabeth and Melville Jacobs' Fund, the Phillips Fund, and the National Museum of Man, Ottawa.

The following abbreviations are used in the glosses of the Halkomelem data:

aux	auxiliary
cmp	complementizer
cs	causative
det	determiner
erg	ergative
inter	interrogative
intr	intransitive
nom	nominalizer
pos	possessive
obj	objective
obl	oblique marker
sub	subjective
ssub	subordinate clause subjective
tr	transitive
1	first person
2	second person
3	third person

See Gerdts 1981 for a general description of Halkomelem. Halkomelem is a verb initial language (predominantly VSO). Subjects, objects, and common noun possessors are unmarked for case. Other nominals--obliques, chomeurs, possessors--are flagged by the all purpose preposition ?a. Pronominal subject agreement is presented by clitics which appear in 2nd position in main clauses. Pronominal object agreement is suffixed to the verb. Halkomelem is a "pro-drop" language: independent pronouns are used only for emphasis. Halkomelem is a split ergative language; ergative agreement is marked only for 3rd person ergatives in main clauses (in all tense/aspects).

[3] I thank Sung-Yun Bak, Soon Ae Chun, and Cheong Youn for providing the Korean data.

[4] It is not clear what the analysis of Korean sentences like the following should be:

- (i) Na-n+n ka-ki-l+l pala-n-ta.
I-TOP go-cmp-ACC want-pr-ind
"I want to go."

Either palanta is not always structure building or sentences like (ii) underly (i):

- (ii) Na-n+n caki-ki-l+l pala-n-ta.
I-TOP self-cmp-ACC want-pr-ind
"I want myself to go."

I prefer the latter treatment, given the overall tendency toward ellipsis in Korean.

[5] This is quite a common process cross-linguistically, as Bybee and Pagliuca (1987) note. In fact, they claim that this is a major source of new future morphology, even more prevalent than the reanalysis of "go" to future. See Bybee and Pagliuca and references therein for examples.

[6] The use of "want to" here has not quite neutralized to a future meaning yet. There seems to be some personification involved. Such examples sound much better in the negative. Note that English will has already made the shift from desiderative to future.

[7] A formal account under the Unaccusative Hypothesis is given of this contrast in section 4.1.2 below.

[8] I take sentences like (i) to be inheritance structures, not control structures, i.e., want is like an auxiliary in these cases:

- (i) I want to go.

This could explain why sentences like (ii) seem odd:

- (ii) ?I want myself to go.

Thus the positions I take in English and Korean (see footnote 4) vary.

Under this analysis, there is a difference between structure building and inheritance WANT in English: the latter can contract to wanna but the former cannot, even if, as has been often noted, there is no overt lexical material between the want and to in the former case; e.g. (iii):

- (iii) *Who do you wanna go?

[9] I believe Periphrastic Desideratives to be uniformly structure building; footnotes 4 and 8 demonstrate how languages where this is not apparently so could be

reconciled to this generalization. Therefore, periphrastic Desideratives will never exhibit the range of semantic variation discussed in section 4, the analysis of which is the main purpose of this paper.

[10] See Gibson and Raposo (1986) and Davies and Rosen (to appear) for a history of the development of this formulation.

[11] Davies and Rosen (to appear) show that (29ii) is unnecessary in a multipredicate union analysis, since inheritance across P-sectors parallels inheritance within a P-sector; the latter has always been assumed in Relational Grammar.

[12] The major criticism leveled by Jensen and Johns (to appear) against Smith's (1982a,b) analysis of Eskimo Causatives and Desideratives is that it posits an initially bi-clausal structure. This criticism does not pertain to the present analysis, which is initially monoclausal.

[13] If we leave aside differences in the exact statement of the theory-equivalent of the Union rule (e.g. (29i)), this is the viewpoint taken in Smith (1982a,b), Grimshaw and Mester (1985) and Jensen and Johns (to appear).

[14] Jensen and Johns (to appear) argue that the analyses of -guma in both Smith (1982a,b) and Grimshaw and Mester (1985) are unnecessarily complicated since they involve the theory-equivalent of "Equi", i.e., there are two identical arguments; the second is deleted. Since an inheritance viewpoint is taken here, only a single argument is posited, and thus the relational analysis is not subject to the same criticism.

[15] Neither Grimshaw and Mester (1985) or Jensen and Johns (to appear) attempt to differentiate these two types of constructions; the former analysis is equivalent to a linked Desiderative, the latter to a free Desiderative. In the examples they present, it seems that there is an agent of WANT, and therefore -guma would be a linked WANT from my perspective. They present no information concerning a future tense use of -guma so I will tentatively assume that -guma is not a free WANT.

[16] Analysis (33) is equivalent to Equi Clause Union construction under a bi-clausal analysis; (34) would be Raising and Clause Union. Aissen and Perlmutter (1983) posit both for Spanish.

[17] See Gerdtts (1981, to appear b) for evidence for Passive in Halkomelem.

[18] The Satellite Principle has been replicated with minor differences in other theories, see Baker (1985) and Grimshaw (1986); therefore I assume that the argument presented here will be valid across frameworks.

[19] It is clear that -[?]elmen is a suffix, even though it

appears after all suffixes except ergative agreement (as in (9)) because of the form it takes in the continuative aspect. One marker of this aspect is that the glottalization of syllable final resonants to the end of the word containing the verb root. As seen in (9), this rule applies to the desiderative (cf. the completive form in (i), hence it is suffixial.

- (i) ni kʷən-ət- ʔəlmən-əs t^θə swəyʔqəʔ t^θə ʃəptən
 aux take- tr-want- 3erg det man det knife
 "The man wanted to take the knife."

[20] These data are not only problematic to a relational analysis; I detail the problems for other frameworks in a longer version of this paper (in preparation).

[21] This principle is discussed in Perlmutter (1978) and Rosen (1984).

[22] The Halkomelem Causative in (52), where the 2 is limited to a higher animate, is an example of the latter.

[23] See Gerdts (1981) and (to appear a) for evidence for Unaccusativity in Halkomelem.

[24] An analysis involving Union in the earlier P-sector then Unaccusative Advancement could also be posited here; I know of no Halkomelem evidence that would decide between these alternatives.

[25] If this analysis is to carry over without complication to motion auxiliaries in Tzotzil and Halkomelem, then they should not occur with Unaccusative predicates. I have no information on this with respect to Tzotzil. This generalization appears to be true from the data I have on Halkomelem, but I have not systematically tested intransitive verbs in this regard.

[26] Gerdts, et. al. (1984) argue that Passive morphology occurs on some Unaccusatives in Korean, e.g. nemecita "fall" in (69).

[27] The analysis given by Gonzalez (1985) makes use of the fact that Inversion has no verbal morphology associated with it. Translating her analysis into the current framework, she posits an analysis for the (a) reading with Inversion in the first P-sector but for the (b) reading in the second P-sector; thus the final 1 inherits in (a) but the initial 1 inherits in (b). I do not bring into the discussion here evidence which involves 3rd person experiencers given by Gonzalez to support an Impersonal Inversion analysis under the second reading.

[28] The parameterization of notions of initial 1 is obviously parallel to the different views of 1 available in Relational Grammar, e.g. see Perlmutter (1982).

[29] Davies and Dubinsky's (ms.) 'Extended Valence' theory of the lexicon within Relational Grammar develops a notation for expressing this information and gives principles for allowable cross-linguistic structures.

REFERENCES

- Aissen, Judith. 1984. "Control and Command in Tzotzil Purpose Clauses," in Proceedings of the Tenth Annual Meeting of the Berkeley Linguistics Society, 559-571.
- Aissen, Judith and David M. Perlmutter. 1983. "Clause Reduction in Spanish," in D. Perlmutter, ed. Studies in Relational Grammar 1, Chicago: University of Chicago Press, pp. 360-403.
- Baker, Mark. 1985. "The Mirror Principle and Morphosyntactic Explanation." Linguistic Inquiry 16:3, 373-416.
- Bybee, Joan and William Pagliuca. 1987. "The Evolution of Future Meaning," in A. G. Ramat, et.al, eds. Papers from the VIIth International Conference on Historical Linguistics. Amsterdam: John Benjamins.
- Davies, William and Stanley Dubinsky. ms. "Grammatical Relations in Lexical Representations."
- Davies, William and Carol Rosen. to appear. "Unions as Multipredicate Clauses." Language.
- Frantz, Donald. 1976a. "Equi-subject Clause Union." Proceedings of the Second Annual Meeting of the Berkeley Linguistics Society, 179-187.
- Frantz, Donald. 1976b. "Unspecified-Subject Phenomena in Algonquian," Papers of the Seventh Algonquian Conference, Ottawa.
- Frantz, Donald. 1986. "Parameters of Non-Causative Union," paper presented at the 2nd Biennial Conference on Grammatical Relations, Columbus, Ohio.
- Gerdtz, Donna B. 1980. "Antipassives and Causatives in Halkomelem." in Proceedings of the Sixth Annual Meeting of the Berkeley Linguistics Society, 300-314.
- Gerdtz, Donna B. 1981. Object and Absolutive in Halkomelem Salish, Ph.D. Dissertation, University of California, San Diego.
- Gerdtz, Donna B. to appear a. "Intransitive Verb Classes in Halkomelem Salish," in P. Munro and L. Hinton, eds. Festschrift for Margaret Langdon.
- Gerdtz, Donna B. to appear b. "Object Agreement in the Halkomelem Salish Passive: A Morphological Explanation." to appear in M.R. Key and H. Hoeningwald, eds.. Festschrift for Stanley Newman.
- Gerdtz, Donna B., Soon Ae Chun, and Cheong Youn. 1984. "Unaccusatives and Clause Union in Korean: The Downstairs Thaw." Paper presented at the Symposium on

- Grammatical Relations, State University of New York at Buffalo.
- Gibson, Jeanne D. and Eduardo Raposo. 1986. "Clause Union, the Stratal Uniqueness Law, and the Chomeur Relation," Natural Language and Linguistic Theory 4, 295-331.
- Gonzalez, Nora. 1985. Object and Raising in Spanish. Ph.D. Dissertation. University of California, San Diego.
- Grimshaw, Jane. 1986. "A Morphosyntactic Explanation for the Mirror Principle," Linguistic Inquiry 17:4, 745-750.
- Grimshaw, Jane, and Ralf-Armin Mester .1985. "Complex Verb Formation in Eskimo," Natural Language and Linguistic Theory 3:1, 1-20.
- Jensen, John T., and Alana Johns. to appear. "Morpho-syntax of Eskimo Causatives," in D. Gerdts and K. Michelson, eds. Theoretical Perspectives on Native American Languages. SUNY Press.
- Perlmutter, David M. 1978. "Impersonal Passives and the Unaccusative Hypothesis." Proceedings of the Fourth Annual Meeting of the Berkeley Linguistics Society, pp. 157-89.
- Perlmutter, David M. 1980. "Relational Grammar," in E. Moravcsik and J. Wirth (eds), Syntax and Semantics 13: Current Approaches to Syntax. Academic Press, pp. 195-229.
- Perlmutter, David M. 1982. "Syntactic Representation, Syntactic Levels and the Notion of Subject," in P. Jacobson and G. K. Pullum, eds., The Nature of Syntactic Representation. Reidel, pp. 283-340.
- Perlmutter, David M. and Paul M. Postal. 1983. "Some Proposed Laws of Basic Clause Structure," in D. Perlmutter (ed.) Studies in Relational Grammar 1. University of Chicago Press, pp. 81-128.
- Rosen, Carol. 1984. "The Interface between Semantic Roles and Initial Grammatical Relations," in D. Perlmutter and C. Rosen (eds.) Studies in Relational Grammar 2. University of Chicago Press.
- Smith, Lawrence R. 1982a. "An Analysis of Affixal Verb Derivation and Complementation in Labrador Inuttut." Linguistic Analysis 10, 161-189.
- Smith, Lawrence R. 1982b. "Labrador Inuttut (Eskimo) and the Theory of Morphology." Studies in Language 6, 221-244.