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The Focus Antipassive in Quiche Mayan*

Clifton Pye
The University of Kansas

The rule of passivization has played a central role in transformational grammar from its very beginning. Chomsky (1957) used the active/passive relation as one of his key arguments in favor of deriving the surface structure of sentences by means of a transformation of another structure. The passive rule has since figured prominently in Relational Grammar (Perlmutter & Postal 1977), Lexical-Functional Grammar (Bresnan 1982) and more recently, the distinction between lexical and syntactic rules (Wasow 1977; Borer & Wexler 1987). Although the Government and Binding (GB) model currently base-generates passive sentences separately from their active counterparts, the construction still figures prominently in the literature as a justification for the rule of NP-movement.

In fact, Jaeggli (1986) takes pains to show how constraints in various GB modules will account for the properties of passive constructions. Briefly, GB theory presupposes an asymmetry between the verb object (its 'internal' argument) and subject (the verb's 'external' argument). Jaeggli argues that this asymmetry is the reason the passive participle 'absorbs' the subject's thematic role so that no referential NP may be generated within this position. The passive participle also becomes adjectival and fails to assign accusative case to the following object NP. This NP must move to the subject position to receive case, but retains its θ -role from a coindexed trace in the [NP,VP] position. Jaeggli points out the ways in which this account may be extended to the passives of intransitive verbs in Dutch and German as well as passives with _____ in Turkish.

In their rush to produce a constrained account of the passive, GB theorists may have gone too far. In particular, their account of the passive appears to be so constrained that it fails to account for the antipassive. The antipassive is a detransitivizing rule like the passive except that it demotes the object of the clause, rather than the subject, to oblique position. Antipassive constructions are common among ergative languages. It is attested in Australian, Eskimo and Mayan languages in a variety of forms. In ergative languages, antipassive changes the agent np case from ergative to absolutive, at the same time adding an antipassive marker to the verb stem. The following sentences are examples of the absolutive antipassive in the Mayan language K'iche' which is spoken in the western highland region of Guatemala.

1.a. k- \emptyset -a-yoq' le: in-ta:t
 INCOMP-3A-2E-mock the 1E-father

'You mock my father.'

b. k-at-yoq'-on che: le: in-ta:t
 INCOMP-2A-mock-ABS at the 1E-father

'You mock my father.'

In the active form, shown in (1.a.), the first person agent is indicated by an ergative subject marker on the verb while the patient np appears as a direct object which agrees in person and number with the absolutive prefix on the verb. In the absolutive sentence (1.b.) the agent is marked with an absolutive verb prefix, while the patient appears in an oblique phrase headed by the relational noun *chi* with no agreement marking on the verb. The verb contains the additional absolutive antipassive suffix *-Vn*.

Antipassives appear to function in a way that is exactly opposite to the passive. To the degree that antipassives function as opposites of passives, they contradict current GB accounts of passive. There is no inherent reason why the passive morpheme should 'absorb' the external thematic role if the antipassive morpheme can absorb the internal θ -role while leaving the external θ -role untouched. Antipassives seem to operate in a fashion that directly contradicts the inherent asymmetry between external and internal arguments, an asymmetry that is now a core construct of GB theory (Williams 1981). It appears that this distinction may not be maintained if GB is to provide an adequate treatment of antipassives.

Of course things may not be so simple. Postal (1977:338) outlines four approaches to antipassives that have been taken in the past. The oldest (cf. Anderson 1976, Hale 1970, Silverstein 1976, and Woodbury 1975) treats transitive clauses in ergative languages as the output of an obligatory passive. This rule converts a nominative subject to an oblique position marked with the ergative case. At the same time it converts an accusatively marked object to the subject position and marks it with the absolutive case (corresponding to the nominative). The antipassive applied to this structure returns the former subject to the unmarked position where it again receives absolutive (i.e. nominative) case marking while demoting the original object to an oblique position. In this guise, the antipassive may be treated as a passive since it apparently promotes the nominal with the marked case to the subject position where it receives the unmarked case. Such a 'passive', however, would violate GB constraints which prohibit the application of passive to the output of passive.

Another approach simply treats agent nominals of ergative clauses as oblique nominals and takes the patient nominals to be initial subjects. Postal labels this approach the Oblique Analysis. The account of antipassives under the Oblique Analysis is substantially the same as that of the first approach. In other words the antipassive becomes just another form of the passive, 'moving' one nominal to the subject position while demoting the initial subject (the logical object) to an oblique nominal position. It must still justify promoting nominals from an oblique position to subject since the GB description only permits the nominal directly governed (and hence casemarked) by the verb to assume subject position.

A more radical approach is to assume that ergative languages have an inverse mapping of thematic roles to grammatical positions. Under this approach patient nominals are initial subjects of transitive clauses while agent nominals are initially direct objects. This is apparently the approach taken by Dixon (1972) in his analysis of Dyirbal, and is the approach advocated by proponents of GB theory (Levin 1983, Marantz 1984, Wexler & Culicover 1974). The Inverse Analysis directly incorporates antipassives into the account of the passive since the antipassive in such 'syntactically ergative' languages promotes the direct object to subject position while demoting the initial subject to an oblique position. This approach is only feasible where independent evidence suggests there is an inverse mapping of thematic roles to grammatical positions (cf. Dixon 1978, Levin 1983, Marantz 1984 for further discussion). The Inverse Analysis is not applicable to antipassives in languages which are not syntactically ergative.

In effect, all of these approaches account for the antipassive by reducing it to a passive which promotes a nominal to the subject position while demoting the initial subject to an oblique relation. They have in common the necessary correlate that passive and antipassive constructions should be in complementary distribution (cf. Silverstein 1976:140). As Postal points

out, however, there are many languages (such as the Eskimo and Mayan languages) which have both passive **and** antipassive constructions. No matter what the initial mapping between thematic roles and grammatical relations for these languages is assumed to be, passive and antipassive rules will have to be treated in equal and opposite fashion. Any attempt to treat the antipassive as simply a mirror of the passive is mistaken.

There seems to be no alternative to a direct account of the antipassive. Postal outlines one approach using the Relational Grammar framework. In Postal's account, the demotion of the direct object to chomeur status is motivated by the demotion of the initial subject to a direct object. The new direct object is then promoted back to subject. As implausible as this sounds (Pullum 1976 dubs it the 'Duke of York gambit') Davies (1986) finds some evidence for it in Choctaw.

Such an approach is not possible within GB since it requires the initial demotion of the subject to the [NP,VP] position, which is prohibited by Theta theory and the asymmetry between the internal and external arguments.

Postal's approach to the antipassive is still essentially a 'passivist' approach since once the subject is demoted to the object position regular passive mechanisms (absence of case marking) will insure its return to the [NP,S] position. It remains to be seen whether a more direct means of accounting for antipassives is available with the GB framework. In the remainder of this paper I will attempt such an account for antipassives in the Mayan language K'iche'. To my knowledge no one except Larsen (1987) has attempted to analyze an antipassive construction within this framework.

K'iche' contains two distinct forms of passive as well as two forms of antipassive. The passive constructions in K'iche' divide naturally into a syntactic and a lexical passive (cf. Norman 1978). Mondloch (1981) labels the syntactic passive in K'iche' simply *passivel*, which is the term I will adopt. An example of *passivel* in K'iche' is shown in (2)¹.

(2) x-∅-q'alu-x ri: ak'al w-uma:l
 PERF-3A-hug-PASS1 the child 1E-because

'The child was hugged by me.'

The underlying direct object (*ri: ak'al*) has become the subject as shown by the agreement morphology on the verb. The underlying subject has been demoted to an oblique phrase which is headed by the relational noun *-uma:l*. The verb has become morphologically intransitive since it only allows a subject agreement marker from the absolutive set of inflections. All of these changes can be explained in the standard way in GB theory.

An antipassive construction on the other hand operates in the opposite manner. Examples of focus antipassive constructions in K'iche' are shown in (3).

3 a. jachin x-∅-poq'ow-isa-n ri: joro:n
 who PERF-3A-boil-CAUSE-FOC_AP the water

'Who boiled the water?'

b. k-∅-in-ch'ob' ri: ixoq
 IMPERF-3A-1E-know the woman

[(ri) x-∅-k'am-ow b'i ri: si:']
 that PERF-3A-carry-FOC_AP here the firewood

'I know the woman who brought the firewood.'

c. are: ri: at x-at-riq-ow ri: ak'al
FOCUS the you PERF-2A-find-FOC_AP the child

'You were the one who found the child.'

In each of these examples the subject comes into focus in some way: either in a question as in (3a), a relative clause (3b) or in a sentence cleft (3c). The antipassive verb only has one person marker prefix and becomes morphologically intransitive as indicated by the presence of an intransitive termination marker when the verb occurs in clause-final position. Compare the antipassive construction in (4a) with the regular intransitive phrase in (4b) and the regular transitive phrase in (4c).

4 a. jachin k-∅-ch'ay-ow-ik
who IMPERF-3A-hit-FOC_AP-TERM

'Who hits?'

b. jachin k-∅-b'e:-ik
who IMPERF-3A-go-TERM

'Who is going?'

c. jas k-∅-u:-riq-oh
what IMPERF-3A-3E-found-TERM

'What did he find?'

Superficially, the focus antipassive construction appears to directly contradict current GB accounts of the passive. The passive suffix absorbs the agent θ -role and the verb becomes intransitive whereas the focus antipassive appears to absorb the patient θ -role to make the verb intransitive. Jaeggli's appeal to the distinction between external and internal θ -roles to explain the operation of the passive could not be maintained if a construction such as the focus antipassive showed it was possible for the internal θ -role to be absorbed rather than the external one.

Larsen (1987) argues that the focus antipassive in K'iche' does not absorb the internal θ -role. First an overt object NP can freely appear in focus antipassive constructions (cf. the examples in 2), one indication that the verb still assigns a θ -role and case to the direct object position. Secondly, focus antipassive verbs sometimes agree with their object rather than the subject. The focus antipassive actually agrees with the NP that is highest on the hierarchy shown in (5).

(5) non-third person > 3pl > 3sg

An example of object agreement in the antipassive is shown in (6).

(6) jachin x-at-ch'ay-ow-ik
who PERF-2A-hit-FOC_AP-TERM

'Who hit you?'

Thus, person and number features from the object NP must still be available to the verb at some level.

Larsen points out one other fact about the focus antipassive that will have to be accounted for. It is subject to the weak crossover phenomenon. In (7) the wh-phrase is not interpreted as being coreferential with the possessor of the object phrase.

(7) *jachin*_i x-∅-ch'ay-ow *ri*: *r*_j-achala:l
 who PERF-3A-hit-FOC_AP the his/her-relative
 'Who_i hit his/her_j relative?'

Larsen explains this outcome by assuming the underlying structure shown in (8).

(8) [*jachin*_i [*PRO*_i[[INFL[[x-∅-ch'ay-ow[e_i]][*ri*: *r*_j-achala:l [e_j]]][e]]]]
 S' S' S VP VP NP NP NP NP

In Larsen's analysis PRO moves out of the leftmost NP position, which is assigned the agent role, into COMP, where it is ungoverned² and is coindexed with *jachin* in a higher clause. He further assumes that there is no subject agreement inflection (SAGR) in INFL to assign case to the subject position [NP,S], so an overt NP may not appear there. An object agreement inflection (OAGR) remains in INFL, and assigns its case to the agreement marker which passes its case to the direct object NP. Since the leftmost subject NP and the possessor of the head of the object NP do not c-command each other, they cannot have the same referent.

This analysis faces a number of problems. First, it assumes that K'iche' verbs assign the agent θ -role to an NP in [NP,VP] position. This would abolish the distinction between internal and external arguments and thus undermine any account of passives in the language. Second, the analysis requires an arbitrary connection between the [NP,VP] position which receives the agent θ -role and the [NP,S] position which receives ergative case. Ordinary transitive verbs in K'iche' would require the subject NP to move from the [NP,VP] to the [NP,S] without any change in verb morphology. There is no explanation why the object NP in [NP,VP] position would be casemarked by the OAGR while the subject NP in [NP,VP] would not be casemarked by the SAGR. Third, his analysis may explain why the absolute set of verb prefixes is used for the objects of transitive verbs and the subjects of intransitive, but it misses the fact that objects of transitive verbs have a theme θ -role while subjects of intransitive verbs have a different θ -role. Fourth, this analysis contradicts his analysis of another example of weak crossover in K'iche' shown in (9) (Larsen's example 25).

(9) *jachin*_i x-∅-u:-ch'ay *ri*: *r*_{i/j}-achala:l
 who PERF-3A-3E-hit the his/her-relative
 'Who_i did his/her_j relative hit?'

Here the possessor of the direct object also has a different referent from the wh-phrase. Yet the underlying structure for (9) according to Larsen's final analysis would be that shown in (10).

(10) [*jachin*_i[[INFL[[x-∅-u:-ch'ay[*ri*: *r*_i-achala:l][t_i]]][e]]]³
 S' S' S VP VP NP NP NP

In this case the subject NP (*ri r*-achala:l) would receive its θ -role from the verb and then move to the [NP,S] position to be casemarked by the SAGR. The wh-trace in the object position, however, would c-command the possessor of the subject NP when it was in its original position. Thus, Larsen's analysis predicts coreference between the wh-phrase and the possessor of the subject NP contrary to what K'iche' speakers state.

It therefore seems reasonable to look for another approach to analyzing the focus antipassive. I think the best solution would be to base generate the subject NP in [NP,S] position. This preserves the distinction between internal and external arguments and the different θ -role assignments for subjects and objects. It creates a problem in accounting for the different subject prefixes used with transitive and intransitive verbs which I will address presently. At

this point, however, I want to discuss how this structure can account for the features of the focus antipassive that we have seen.

I will assume that the underlying structure of the focus antipassive question in (7), repeated below, is that shown in (11).

- (7) jachin_i x-∅-ch'ay-ow ri: r_j-achala:l
 who PERF-3A-hit-FOC_AP the his/her-relative
 'Who_i hit his/her_j relative?'

- (11) [jachin_i [SAGR_OAGR [x-∅-ch'ay-ow [ri: r_j-achala:l]] [e]]]
 S' S VP NP NP

In this sentence, the antipassive suffix absorbs the agent θ -role in exactly the same way the passive suffix does. This being the case, the [NP,S] position remains empty. This empty category is governed by the SAGR inflection in INFL so no violation of the ECP occurs. In the focus antipassive construction, however, the OAGR inflection is retained and transmits case to the object NP in [NP,VP] position. This means that the object NP is not free to move to the [NP,S] position since it would violate the Case Filter if it did so. There is no possibility of coreference between the possessor of the object NP and the subject NP because nothing occupies the subject NP position. The antipassive suffix transmits the agent θ -role to the wh-phrase by some mechanism which I haven't determined yet.

A similar analysis will account for Larsen's other examples. The underlying structure for (9), repeated below, would be that shown in (12).

- (9) jachin_i x-∅-u:-ch'ay ri: r_{i/j}-achala:l
 who PERF-3A-3E-hit the his/her-relative
 'Who_i did his/her_j relative hit?'

- (12) [jachin_i [SAGR_OAGR [x-∅-u:-ch'ay [t_i]] [r_j-achala:l]]]
 S' S VP NP NP

In this case a regular transitive verb assigns a θ -role and case to the subject NP. The possessor of the subject NP does not c-command the wh-trace in the direct object position so there is no possibility of coreference between them.

The sentence in (9) is actually ambiguous. Another possible interpretation would be 'Who_i hit his/her_i relative?'. Mondloch (1981:233-238) notes that sentences where the subject and possessor of the direct object are coreferent are exceptions to the requirement that the focus antipassive be used for subject focus. This fact would also be accounted for under my analysis. The underlying structure of the second interpretation for sentence (9) is shown in (13).

- (13) [jachin_i [SAGR_OAGR [x-∅-u:-ch'ay [ri: r_i-achala:l]] [t_i]]]
 S' S VP NP NP

Here, the variable and the possessive marker are both free in the necessary environments, but the variable in the subject position c-commands the possessive marker explaining their coreference. As I discussed above, there would be no possibility of a coreference interpretation in the focus antipassive because there would not be anything in the [NP,S] position.

The variable agreement of the verb in the focus antipassive must still be accounted for. I think Larsen's account (56-57) is essentially correct although there are a few details which must be changed to make it consistent with my analysis. Unlike Larsen, I assume that both the SAGR and OAGR inflections are still present in the focus antipassive. However, another consequence of the absorption of the agent θ -role is the removal of the

show	k'ut	k'ut-un	break	raqi	raqi-n
scold	yax	yax-an	split up	pa7i	pa7i-n
order	taq	taq-an	make wet	ch'aqab'a	ch'aqab'a-n
decorate	wiq	wiq-on	close	tz'api	tz'api-n
unravel	sol	sol-on			
look for	tzuku	tzuku-n			
love	loq'o	loq'o-n			
wait for	iye7	iye7-n			

Thus, the absolutive antipassive cannot be analyzed as a form of the conative alternation.

Another possibility would be to analyze the absolutive forms as a form of 'object deletion'. Hale & Keyser (1986:32) note that such a process applies to verbs such as sing, speak, talk, eat, and drink in English:

- (20) a. John sang a song.
 b. John sang.

Hale & Keyser propose that these verbs are basically transitive and that the intransitive forms assign a θ -role 'internally' at LS (lexical structure) on condition that the object is suitably constrained. The object-deletion rule substitutes a constant of the verb's selectional restriction clause in the appropriate argument position of the LCS:

- (21) [x SING TUNE]

Once again, the productivity of the absolutive antipassive in K'iche' defeats such an analysis. The absolutive is not limited to verbs with such limited selection restrictions as shown in the list in (19). Furthermore the absolutive construction allows the direct object to appear in an oblique position, which is not possible in the case of the object deletion construction:

- (22) John sang (*in/at) a song.

Both the conative analysis and object-deletion analysis as well as other passive analyses cited above fail to account for the restrictions and variable interpretations on the absolutive alternation in K'iche'. Mondloch (1981) observes two essential restrictions. First, while the absolutive is a fairly productive process, there are verbs which do not undergo this alternation. I have assembled a partial list of such verbs from the available literature:

- (23) Transitive verbs in K'iche' which lack absolutive forms

b'i	say
cha:ji	guard/take care of
ch'a:b'e	talk
esa	take out
il	see
k'is	finish
oq'e	cry over
qumu	drink
ya7	give

Second, while the absolutive typically converts a transitive verb into an intransitive verb whose subject is also the logical subject, some verbs in the absolutive have subjects that are logical objects. Mondloch (1981:196-7) gives the following examples:

- (24) Absolutive forms with logical objects as grammatical subject

- a. k-∅-raqi-n le: pu:puh
 INCOMP-3A-break-ABS the balloon
 'The balloon will break.'
- b. x-∅-wuli-n le: choma:l aw-uma:l
 COMP-3A-wreck-ABS the meeting 2E-cause
 'You wrecked the meeting.'
- c. na k-∅-tz'a:pi-n ta le: u-chi: jah
 NEG INCOMP-3A-close-ABS NEG the 3E-mouth house
 'The door will not close.'
- d. jampa: k-∅-paj-an le: aw-eqa:7n
 how much INCOMP-3A-weigh-ABS the 2E-load
 'How much does your load weigh?'
- e. a: x-ix-ch'aj-an mye:r
 Q_{y/n} COMP-5A-wash-ABS earlier
 'Did you wash earlier?'

Finally, some absolutive verb forms have a different meaning than their active counterparts. Mondloch (1981:) provides these examples:

(25)	tij	'eat'	tij-on	'eat people'
	k'am	'carry'	k'am-an	'receive, become habitual'
	riq	'find'	riq-on	'catch up, suffer'
	elesa	'rob'	elesa-n	'take after, resemble'
	ch'aj	'wash'	ch'aj-an	'wash (oneself), run (colors)'
	tzaq	'drop'	tzaq-an	'abort'

Any account of the absolutive should explain these phenomena.

It is somewhat surprising that GB theory can illuminate so many features of the focus antipassive in K'iche'. Perhaps the most striking feature of this analysis is the way the antipassive may be assimilated to previous analyses of passives. My analysis, however, leaves the ergative nature of this syntactic operation firmly in place. It only applies to the subjects of transitive verbs.

Notes

*I have relied primarily upon the K'iche' data in Larsen 1987 and Mondloch 1981 for this paper. It is consistent with my own data from speakers of K'iche' from Zunil.

¹I have altered Larsen's spellings to reflect the Zunil dialect with which I am the most familiar. All K'iche' words are shown in the practical orthography developed by the Proyecto Linguístico Francisco Marroquin (Kaufman 1976) with a single exception: the use of <'> rather than <7> for the glottal stop. The other orthographic symbols have their standard IPA values except: <tz> = /ts/, <ch> = /tʃ/, <b'> = /b/, <tz'> = /ts'/, <ch'> = /tʃ'/, <x> = /ʃ/, <j> = /x/. I use the colon <:> to indicate long vowels. I have also used the following morphological abbreviations: PERF = perfective aspect, IMPERF = imperfective aspect, 3A = third person singular absolutive person marker (what Mayanists refer to as 'set B'), 1E = first person singular ergative person marker (or 'set A'), CAUSE = causative, PASS = the passive suffix, FOC_AP = the focus antipassive suffix, TERM = the clause-final termination marker.

²I have followed Larsen in using Reinhart's (1983:18) definition of 'c-command' and Aoun & Sportiche's (1983) definition of 'government' (cf. Chomsky 1981:164). 'Proper government' is defined in Chomsky (1981:250,273-274).

³I have suppressed the full structure of the possessed NP since it is not relevant to my argument. It should be understood in this and the following examples that the possessed NP has an empty possessor NP node following it licensed by the possessive prefix on the head NP. The full structure of the possessed NP would be:

[ri [r_j-achala:l] [e_j]]
 NP N' NP

References

- Aoun, J. & Sportiche, D. 1983. On the formal theory of government. *The Linguistic Review* 2. 211-236.
- Chomsky, N. 1981. *Lectures on government and binding*. Dordrecht: Foris.
- Dayley, J. P. 1981. Voice and ergativity in Mayan languages. *Journal of Mayan Linguistics* 2(2). 6-82.
- Jaeggli, O. A. 1986. Passive. *Linguistic Inquiry* 17. 587-622.
- Kaufman, T. 1976. *Proyecto de alfabetos y ortografias para excribir las lenguas mayances*. Guatemala: Ministerio de Educacion.
- Kaufman, T. 1977. Some structural characteristics of the Mayan languages with special reference to Quiche. ms. The University of Pittsburgh.
- Larsen, T. W. 1987. The syntactic status of ergativity in Quiche. *Lingua* 71. 33-59.
- Larsen, T. W. & Norman, W. M. 1979. Correlates of ergativity in Mayan grammar. In F. Plank (Ed), *Ergativity: Towards a Theory of Grammatical Relations*. London: Academic Press.
- Mondloch, J. L. 1978. *Basic Quiche Grammar*. Institute for Mesoamerican Studies, No. 2. Albany: State University of New York.
- Mondloch, J. L. 1981. *Voice in Quiche-Maya*. Unpublished dissertation, State University of New York, Albany.
- Norman, W. 1978. Advancement rules and syntactic change: The loss of instrumental voice in Mayan. *Berkeley Linguistics Society* 4.458-476.
- Reinhart, T. 1983. *Anaphora and Semantic Interpretation*. Chicago, IL: University of Chicago Press.
- Smith-Stark, T. 1978. The Mayan antipassive: Some facts and fictions. In N. England (ed.), *Papers in Mayan Linguistics*, 169-187. Studies in Mayan linguistics no. 2 (University of Missouri miscellaneous publications in anthropology no. 6) Columbia: University of Missouri.
- Trechsel, F. R. 1982. A categorial fragment of Quiche. *Texas Linguistic Forum* 20. Department of Linguistics, The University of Texas.