

## On Predication and Identity within NPs

There are at least two major approaches to predication theory in recent work within GB.

One approach takes subjects and predicates to stand in the relationship of sister nodes that form a constituent together (perhaps with some adjuncts or adverbials as additional sisters within that constituent) at SS (see LGB, among others). With this analysis the subject and predicate mutually c-command each other. The debates with this approach center around what category this constituent is (S, AP, PP, ...) in a given construction.

A second approach takes subjects to c-command and to be external to the maximal projection of their predicates with the predicates c-subjacent to their subjects but with no stipulation that the subject and the predicate form a constituent, all of these conditions holding at SS (see Williams 1980, among others). A variation on this general approach takes subjects and predicates to be sister nodes, that is, to mutually c-command each other, but again not necessarily to form a constituent (see Schein 1982). I lump these two approaches together since both of them take the theta criterion as limiting any given NP to receiving at most one theta role from any single predicate, but they allow an NP to have more than one theta role if it is an argument of more than one predicate.

Below, I analyze an instance of predication for which both approaches above are inadequate with respect to the configurational demands they make on subjects and predicates and for which the theta criterion must be taken as Williams and Schein propose it. Specifically, in the construction analyzed here, the subject argument of the predicate is not external to the maximal projection of the predicate. Also, given a particular analysis of the external structure of NPs that are complements to N (where the relevant question is whether such NPs are inside PPs or are simple NPs with a Case marker that is homophonous to a P), the subject

argument of the predicate may not c-command that predicate. Furthermore, the subject argument of the predicate may receive a theta role both from the predicate in question and from some other predicate.

The analysis of the construction here is consistent with the theory of predication in Napoli 1987. In this theory there are two kinds of predication: primary and secondary. Primary predication is between the first XP sister to INFL (assuming the X Bar theory of Chomsky 1986) and its structural subject (that is, [NP, S]). Secondary predication is all instances of predication other than primary predication. In certain structures the subject argument of a secondary predicate must receive a theta role from some other source, as well as from the secondary predicate. For our purposes the relevant point is that in this theory the only configurational restriction on all predication is that in S5 a subject argument must not be separated by any of its barriers (in the sense of Chomsky 1986) from the lexical head of its predicate.

Throughout this paper the term subject is used in two ways. A syntactic subject is the structural entity [NP, S]. A subject argument is that entity specially marked in the lexical structure of some item as its subject argument. In the N the subject argument is 'that argument by virtue of which the N is used predicatively when it appears in predicative position, and by virtue of which it is used referentially when it appears in referential position...'. (This is a quote from Williams 1984b, p.613, who is writing with respect to external argument. I have thus applied his definition to the concept of subject argument.) For PP the subject argument is that argument by virtue of which the PP is used predicatively when it appears in predicative position.

This paper is organized as follows. In section 1 I show that phrases like *quel matto di Giorgio* 'that madman George' are externally NPs. In section 2 I show that the internal breakdown of these NPs has *matto* as the head N and *di Giorgio* as a PP sister to the head N. Thus *Giorgio* neither c-commands nor is external to the maximal projection of *matto*. In section 3 I show that *matto* is a predicate taking on *Giorgio* as its subject argument, where the initial specifier on the whole NP specifies the whole NP. Section 4 concludes with some remarks about the consequences of the analysis given here for grammatical theory.

# 1. The External Structure of Phrases like *quel matto di Giorgio*

I argue here that the external structure of these phrases is NP. In doing this, I discuss semantic properties these phrases have as well as syntactic properties. First, they occur in all and only those positions that NPs can occur in.

- (1) *Quel matto di Giorgio mise il libro nell'armadio.*  
'That madman George put the book in the wardrobe.'
- (2) *Avvicinati quel matto di Giorgio alla finestra.*  
'I brought that madman George to the window.'
- (3) *Hanno mandato la lettera a quel matto di Giorgio.*  
'They sent the letter to that madman George.'
- (4) *Oreste ha organizzato con quel matto di Giorgio di andare al cinema.*  
'Oreste arranged with that madman George to go to the movies.'
- (5) *Tuo fratello, quel matto di Giorgio, assomiglia ad un grillo.*  
'Your brother, that madman George, resembles a cricket.'

Second, they can undergo NP movement, as in raising, passive, ergative constructions, *si* constructions, and inversion.

- (6) *Quel fesso di Paolo sembra lamentarsene.*  
'That dumbbo Paul seems to be complaining about it.'
- (7) *Quel fesso di Paolo è sprezzato da tutti.*  
'That dumbbo Paul is discounted by everyone.'
- (8) *Quel fesso di Paolo è arrivato.*  
'That dumbbo Paul has arrived.'
- (9) *Quel fesso di Paolo non si vede più.*  
'That dumbbo Paul isn't seen anymore.'

- (10) L'ha fatto quel fesso di Paolo.  
'That dummy Paul did it.'

Third, they trigger subject-verb agreement.

- (11) Quei coglioni dei suoi fratelli non ci vengono/  
pl. pl.

\*viene.  
sg.

'Those jerks of her brothers aren't coming.'

Fourth, they are non-propositional. Thus, they cannot bear a propositional sense when they are complements of verbs.

- (12) Trovo quell'imbrogliona di Marta.  
only 'I find that cheater Marta.'  
not 'I find Marta a cheater.'  
(cf. Trovo Marta un'imbrogliona.  
'I find Marta a cheater.'

Fifth, they behave like R-expressions with respect to the Binding Conditions. Thus they can bind an anaphor or a pronoun, but they must themselves be free.

- (13) a. Quel matto di Giorgio parla fra sè e sè.  
'That madman George talks to himself.'  
b. [Quel matto di Giorgio]<sub>i</sub> vuole che io lo<sub>i</sub>  
inviti.  
'That madman George wants me to invite him.'  
c. \*Gli<sub>i</sub> ho detto che [quel matto di Giorgio]<sub>i</sub>  
non poteva venire.  
'I told him that that madman George couldn't  
come.'

I conclude that phrases like quel matto di Giorgio are NPs.

## 2. Internal Structure

The internal structure of these phrases is the following:

- (14) N<sup>u</sup> [quel N<sup>i</sup> [N<sup>i</sup> matto] PP [di N<sup>u</sup> [Giorgio]]]]

This is precisely the structure we would expect with X Bar Theory.

The evidence that di Giorgio in (14) is a PP sister to the head N is scarce. Like other PP complements to N, this PP cannot extrapose.

- (15) \*Quel ficcanaso non si vede più di Stefano.  
'That busybody isn't seen anymore of Stephen.'  
(cf. \*Quel libri non si vedono più di quello  
scrittore.  
'Those books aren't seen anymore by that writer.')

Like other instances of the P di, we find complementary distribution with the corresponding inflected P (see Napoli and Nevins 1986 for an analysis of inflected Ps in Italian). In (16) del is the inflected P.

- (16) Quei cretini dei ragazzi non ci sono.  
'Those cretin boys aren't here.'

Like other Ps, the di governs oblique Case. To see this we must use a phrase containing a pronoun after the di since Italian, like English, does not show audibly distinguishable Case on nonpronominal NPs. However, not all Italians find these phrases perfectly acceptable with a pronoun following the di. Still, all agree that if a pronoun is present, it must be oblique and never nominative.

- (17) Quel cretino di te/\*tu!  
obl/nom  
'That cretin you!'

The di phrase here, however, does not have the syntactic flexibility of many other di phrases. I list some characteristics that our di phrase lacks. None of these characteristics are defining characteristics for di PPs, however, since none of these characteristics are common to

all di PPs, even excluding from consideration the di phrase at issue.  
It cannot be questioned.<sup>1</sup>

- (18) \*Di chi è quel furbo?  
'Of whom is that sneak?'  
(cf. Di chi è quel libro?  
'By whom is that book?')

It cannot correspond to a clitic ne.

- (19) \*Ne ho visto quel matto.  
'I saw that madman him.'  
(cf. Ne ho visto la foto.  
'I saw that photograph of him.')

It cannot appear across the copula from the N and its specifier.<sup>2</sup>

- (20) \*Quello stupido è di Franco.  
'That stupid person is (of) Frank.'  
(cf. Quel libro è di Franco.  
'That book is by Franco.')

It cannot prepose.

- (21) \*Di Giorgio non si vede più quel matto.  
'George one doesn't see anymore that madman.'  
(cf. Di quello scrittore non si vedono più i libri.  
'By that writer one doesn't see books anymore.')

In all four of these properties, our phrase is similar to NPs such as la città di Sassari 'the city of Sassari.'

- (22) \*Di cosa è la città?  
'Of what is the city?'  
\*Ne ho visto la città.  
'I saw the city of it.'  
\*La città è di Sassari.  
'The city is of Sassari.'

\*Di Sassari mi piace la città.  
'Of Sassari I like the city.'

It is significant that the di phrase in quel matto di Giorgio and the di phrase in la città di Sassari are syntactically inflexible in the same ways since I argue in Napoli 1987 that NPs like la città di Sassari also involve predication and I attribute the syntactic inflexibility to this fact.<sup>3</sup> Thus the data in (18) - (21) do not offer evidence against the analysis in (14).

The most likely alternative to a PP analysis of the di phrase in these NPs is one in which the di is a Case marker and not a true preposition (see Stowell 1981 for one side of this argument with respect to English of, but others, such as Zubizarreta 1985, for the other side). This alternative is interesting to this paper only insofar as one could argue with the Case marker analysis of di that the external analysis of the di phrase is NP, instead of PP, since in that instance the NP which is the maximal projection headed by Giorgio would be di Giorgio and, thus, the maximal projection of Giorgio would, in fact, c-command the head N matto. The Case marker analysis is not viable, however. As we noted above with respect to (16), the di of our phrases appears in complementary distribution with the corresponding inflected P, just as the true preposition di does. Now since the inflected P is a true preposition and not a Case marked article (see Napoli and Nevils 1986 for arguments to this effect), we need to admit the structure in (14) as the proper analysis of sentences like (16), with the inflected P. But given that a PP can follow the head N of our NPs in some instances (like (16)), we gain nothing from a theoretical point of view by arguing that di in other examples is a Case marker and not a true P. Furthermore, since Italian has a true preposition homophonous with the di of these phrases, in the spirit of avoiding proliferation of homophonous items that have similar distribution, I choose to analyze the di here as a preposition. Throughout this paper I point out all places where the choice between the analysis of di as a Case marker and di as a preposition is relevant, for the benefit of the reader who wishes to pursue the Case marker analysis.

Evidence that the material between the initial specifier and the di phrase in a structure such as (14) is an N is offered by four facts. First, the types of specifiers that

occur before this material are those that Ns typically take.<sup>4</sup> Second, a PP complement (which is what the di phrase in (14) is) is a typical type of N complement. Third, the lexical items that can appear in this slot are only those that can appear as the head of regular NPs (see also Milner 1978, p. 175). Thus, adjectives that can appear in regular NPs in the absence of an N only with an elliptical sense cannot appear in this slot, nor can Vs or Ps.

(23) *Preferisco il verde.*

'I prefer the green (one/color/thing/...).'

(24) *\*una verde di frutta*

'a green of a fruit'

Fourth, the material in this slot can be filled by more than one word, in which case we always get an N plus a complement that is the typical type of complement an N takes. In (25) we have the AP *ripulito*. AP appears as a complement only to N unless it is used as a predication.

(25) *quel cafone ripulito di Giorgio*

'that polished up bumpkin George'

I conclude that the material between the initial specifier and the di phrase in (14) is an N.

Other empirically based arguments for the structure in (14) are hard to come by. However, there is a good theoretical reason for positing 14: there is simply no other reasonable structure available. Notice that if the first N of the construction was not the syntactic head, we would have no way of assigning Case to it. That is, if the first N were the head of an NP inside the overall NP, as in (26), there would be no Case assigner for the contained NP.

(26) *N' [ N' [quel matto] pp[di Giorgio]]]*

In (26), the highest N' would protect the NP *quel matto* from outside Case assignment, since maximal projections are barriers to government and Case can be assigned only by a governor.<sup>5</sup> Furthermore, if *quel matto* were a maximal projection, then *Giorgio* would have to be the head of the whole NP. We now have a question as to what *di* is doing here. If *di* is a preposition, it surely should not be introducing a nonmaximal projection of NP (but see Napoli

and Nevins 1986). On the other hand, one could argue that the obvious function of the *di* in our phrases is to assign Case to the NP which follows it (see the discussion following (22) in the text above). But if the material following *di* in these phrases were not an NP, but simply an N which was the head of the overall NP, there would be no need for the *di*, since the Case governor for the overall NP would assign Case to this N by percolation. Alternatively, if the material following the *di* were not the head N but a full NP, the construction in (26) would be headless, contrary to X' theory (but see Napoli 1985 and Williams 1974, p. 139). In fact, the material following the *di* is a full-fledged NP, which can have its own specifier and other complements.

(27) *quella carogna del tuo dottore*

'that scoundrel of your doctor'

(26) cannot be correct.

Another alternative I raise simply because it comes up in the literature is that in (28).

(28) *N' [ N' [quel matto di] N' [N[Giorgio]]]*

(This is the structure of the pseudopartitive in Selkirk 1977, who labels the top node N'. Instead of N'. This is also one of the two possible structures proposed in Janda 1980 for the NPs studied there - see note 3 above.) Once more this structure fares no better with respect to how to assign case to the N' *quel matto di* and as to why we find a *di* at all. Furthermore, (27) shows that *Giorgio* cannot have N' as its highest analysis, but must have N' as its highest analysis, since we can get a specifier on the material following *di*. Also, the structure in (28) is completely inadequate for handling examples like (16), repeated here as (29), in which we find the inflected preposition.

(29) *quei cretini dei ragazzi non ci sono.*

'Those cretin boys aren't here.'

There is still another argument against (28), based on the fact that (28) analyzes the nominal that follows the *di* as the head N of the construction. We expect with this analysis that this N will manifest the Case that is assigned to the overall NP. However, as mentioned above with respect to

(17), we never get nominative Case even if the overall NP is in subject position of a tensed S, the position typically assigned nominative.<sup>6</sup>

(30) quel cretino di te/\*tu ha rovinato tutto di nuovo.  
obl/nom

'That cretin you ruined everything again.'

(28) cannot be correct.

I conclude that (14) is the correct analysis of these NPs. Given (14) we can see that Giorgio neither c-commands nor is external to the maximal projection of *matto* in the phrase *quel matto di Giorgio*.<sup>7</sup>

### 3. Semantics

The semantic properties of these NPs are complex. I will first discuss those properties in common among all NPs of this type. Then I will discuss properties that only some NPs of this type have.

#### 3.1 Semantic Properties in Common

The head N of the overall NP in (14) acts as a predicate to the NP introduced by *di*, which acts as its subject argument, and the initial specifier, as expected, specifies the entire NP.

The claim about the specifier is simpler to justify, so I will begin with it. When the specifier of these NPs is definite, the entire NP is interpreted as definite. In (31) - (32) the subject of the subordinate clause must be indefinite when it is understood as coreferential with the subject of the matrix clause. The initial specifier satisfies this requirement, whether the NP following *di* is definite, as in (31), or indefinite, as in (32).

- (31) Per quanto quel cretino di Giorgio sembra onesto,  
non lo è.  
'Honest though that cretin George may seem, he  
isn't.'

- (32) Per quanto quella carogna di dottore sembra  
intelligente, non lo è.  
'Intelligent though that scoundrel of a doctor  
may seem, he isn't.'

Likewise, when the initial specifier of these NPs is indefinite, the entire NP is indefinite. In (33)-(34), if the position following Antonio is filled by an NP, it must be a predicative NP. In general indefinite NPs are potential predicates whereas some uses of definite NPs are not, with context being the relevant factor for potential interpretation of definite NPs as predicates.<sup>8</sup> The initial specifier on our NPs satisfies this requirement. Thus (33), with *una*, the indefinite article, is good, whereas (34), with *quella*, the definite demonstrative adjective, is not.

- (33) Considero Antonio una bellezza di marito.  
'I consider Antonio a beauty of a husband.'

- (34) \*Considero Antonio quella bellezza di marito.  
'I consider Antonio that beauty of a husband.'

Notice that in both (33) and (34) the NP following *di* is indefinite. Thus the indefiniteness of the overall NP is due to the initial specifier, not to the specifier of the NP following *di*.

I will now argue that the head N of our NPs, as analyzed in (14), functions as a predicate taking the NP following *di* as its subject.

My first three arguments all have the same form: I show that the N I am calling a predicate and the NP I am calling its subject exhibit properties that typically occur only between predicates and subjects.

First, as Alinei 1971 has pointed out, there must be a matching of selectional restrictions between the N predicate and the NP subject which is identical to the matching of selectional restrictions we would find in the corresponding sentences with the copula.

- (35) \*quella lagna di monumento  
'that complainer of a monument'  
(cf. quella lagna di tua sorella  
'that complainer of your sister')

- (36) \*quel polpettone di motore  
'that confused mess of a motor'  
(cf. quel polpettone di articolo  
'that confused mess of an article')

- (37) \*quella bruttura di organizzazione  
'that filth of an organization'  
(cf. quella bruttura di mobile  
'that filth of a piece of furniture')

Second, if the predicate is one that may vary for gender and/or number, it must agree with the NP for those features, just as it would in a copula construction, as Milner 1978 (p. 192) has pointed out for French.

- (38) quello stronzo di Mario  
m.s. m.s.  
'that shit Mario'

- (39) quella stronza di Giuliana  
f.s. f.s.  
'that shit Giuliana'

- (40) quel coglione di suo fratello  
m.s. m.s.  
'that jerk of his brother'

- (41) quei coglioni dei suoi fratelli  
m.p. m.p.  
'those jerks of his brothers'

Third, the N is understood to assign a property to the NP in the same way that predicates assign properties to their subjects in more familiar predicational structures (such as clauses). Milner 1978 says that the NP "apparaît en quelque sorte comme le sujet logique de l'ensemble" (p. 174-5). Thus in (42a) we understand that the dress in question is shabby and in (42b) we understand that the doorman in question is rude.

- (42) a. questo straccio di vestito  
'this rag of a dress'

- b. quello sgarbato del portiere  
'that rude person doorman'

If the NP following di were an argument of the head N but not a subject argument (as has been argued, for example, for the ergative verb constructions in Burzio 1981), we would have no explanation for why the same theta role is assigned to the NP following di as that assigned to the external argument of these same predicates in copular constructions or elsewhere.

- (43) a. quel fesso di Paolo  
'that dumb Paolo'

- b. Paolo è un fesso.  
'Paolo is a dumbbo.'

- c. Considero Paolo un fesso.  
'I consider Paolo a dumbbo.'

Fesso assigns the same theta role to Paolo in all three examples of (43). If we claim that Paolo is the subject argument of fesso in (43b) and (43c) but not in (43a), we give up correlating theta roles with particular arguments of given predicates in D-5. Furthermore, if fesso is a predicate in (43a) and if all predicates must have subjects (as argued in Rothstein 1983), then Paolo must be the subject of fesso by default.

A fourth argument for the predicate status of the head N is that only Ns which can function as predicates are accepted in this position (see also Milner 1978, p. 175). While almost any N can be interpreted as a predicate given an appropriate context (see note 8 above), proper names and pronouns are extremely resistant to being interpreted as predicates. As expected, proper nouns and pronouns cannot occur in head N position.

- (44) \*quello Carlo d'uomo  
'that Carlo of a man'

- (45) \*un tu/te di persona  
nom/acc  
'a you of a person'

One might object to 44 and 45 being taken as evidence for the predicate status of the head N of our NPs by noting that 44-45 could be out for the extraneous reason that proper names and pronouns do not take specifiers. There are other classes of nouns, however, that can easily occur with specifiers but that do not lend themselves to being interpreted as predicates in these NPs. The head N of these NPs is interpreted as an evaluative judgment of the NP following di (see section 3.2 below). The names of inanimate objects which are typically used for specific purposes are not generally employed as predicates with the sense of an evaluative judgment. Therefore, these classes of nouns are also barred from head N position in our NPs.

- (46) \*una chiave di attrezzo  
'a wrench of a tool'

\*una lampada di mobile  
'a lamp of a piece of furniture'

\*un quadro d'opera d'arte  
'a picture of a work of art'

As expected, those inanimate objects which are colloquially used with the sense of an evaluative judgment can appear in head N position in our NPs.

- (47) un fiore di moglie  
'a flower of a wife'  
una rosa di moglie  
'a rose of a wife'  
(cf. \*un tulipano di moglie  
'a tulip of a wife')

The same selection of head N occurs in the English counterpart to the NP in 47 (see also Napoli 1987).

- (48) a pistol of a lecturer  
(cf. \*a revolver of a lecturer)

On the other hand, Ns which easily lend themselves to being interpreted as predicates of the appropriate type easily appear as the head N in our NPs. Any of the good examples in this paper can attest to this point.

The next two arguments that our NP consists of a predicate and its subject have the same form: I show that with the analysis here expectations about reference and agreement phenomena arise and, indeed, are realized.

First, if the NP following di is the subject of the head N we should expect the referent of the overall NP to be more closely related to the meaning of the NP following di than to the meaning of the head N. That is, the meaning of the overall NP is the meaning of the NP following di with the property assigned to it by the predicate head N. This is the case. In (49) we understand the subject of the sentence to want to marry a special kind of girl (one who is as fine as a flower) rather than to want to marry a special kind of flower.

- (49) Vorrei sposare un fiore di ragazza.  
'I'd like to marry a flower of a girl.'

Even more convincing examples occur in the comparable English construction. In (50) we certainly don't mean that the subject of the sentence says anything about hell.

- (50) He tells one hell of a good story.

(49) and (50) are telling, as well, with respect to the theta role of the whole NP. We see that the NP following di must meet the selectional restrictions that the larger context imposes on the whole NP, as Milner 1978 points out for French. Thus it is the NP following di which can be said to bear the theta role of the whole NP. In (49), for example, ragazza bears the theta role of theme with respect to sposare.

Second, given the meaning of these NPs we might expect speakers to treat them as though the N of the NP following di is the real syntactic head in grammatical processes that involve semantic features of the syntactic head. For example, agreement processes in Italian are sensitive to the features of person, number and gender - all features which correlate closely to semantic properties of the referent of the NPs undergoing agreement. Let us look, then, at agree-



ment processes.

Subject-Verb Agreement in Italian makes agreement for person between a tensed verb and its syntactic subject (that is, [NP, S]). In Italian morphological person on the verb is correlated with semantic person of the referent of the verb's syntactic subject except in formal speech (where a morphological third person correlates to a semantic second person) and in the indefinite subject *si* construction (where a morphological third person can correlate with various semantic persons, see Napoli 1973). However, Subject-Verb Agreement takes place between all syntactic subjects and their tensed verbs, whether the syntactic subject is an argument of that verb or not (witness passives involving idiom chunks, and, of course, dummy subjects in languages like French and English). Thus Subject-Verb Agreement is not based on a semantic relationship between the syntactic subject and its VP, but is merely a mechanical process involving features (person and number) which irrelevantly (with respect to Subject-Verb Agreement) have semantic correlates. Therefore, I predict that Subject-Verb Agreement will take person strictly off the syntactic head N of our NPs. To test this we must find an NP of the type in (14) in which the two Ns have different person, and see whether this overall NP as the syntactic subject of a verb calls for person agreement with the head N or with the NP that follows the *di*. Since NPs in Italian are all third person except for pronouns, we must use a pronoun either as the head N or as the NP following *di* in order to allow for a contrast in person. However, pronouns cannot appear in head N position, as explained above with regard to (45). And, as we saw above with (17), pronouns are rejected by many Italians in the position following *di* in these NPs. Thus, unfortunately, we must test with sentences which are not acceptable to all speakers. Still, all speakers agree that the morphological marking on the verb in these cases must be third person. We can use (30), repeated here as (51), to see this.

(51) *Quel cretino di te ha/\*hai rovinato tutto di nuovo.*

3 2 3 2  
'That cretin you ruined everything again.'

Subject-Verb Agreement, as predicted, picks out the syntactic head of our NPs, regardless of a contrast in person between head N and the NP following *di*.

There is another feature that figures in Subject-Verb Agreement in Italian: number. The analysis here predicts that if we find NPs in which the head N and the NP following *di* have different number, number agreement will be strictly with the syntactic head N. This prediction holds, as John Swales (personal communication) has pointed out to me. Thus while an NP such as those in (52a) has two readings, on both readings Subject-Verb Agreement is with the syntactic head, as in (52b).

(52) a. *I cretini della Mafia*

'the cretins of the Mafia'  
nonpredicational reading: the cretins who are  
(restrictive) part of the Mafia  
predicational reading: the Mafiosi, all of whom  
(nonrestrictive) are cretins

*quei fessi della Chiesa*

'those dumbos of the Church'  
nonpredicational reading: those dumbos who are  
(restrictive) clerics  
predicational reading: those clerics, all of  
(nonrestrictive) whom are dumbos.

b. *I cretini della Mafia non capiscono/\*capisce*

pl. sg. pl. sg.  
'I'more.'  
'Those cretin Mafiosi don't understand honor.'

*Quei fessi della Chiesa oppongono/\*oppone ancora*

pl. sg. pl. sg.  
*il divorzio.*  
'Those dumbos clerics still oppose divorce.'

On the whole, then, Subject-Verb Agreement treats our NPs as we would expect it to.

There is yet another feature for which agreement can be made, and that is gender. This feature does not show up on a tensed verb, but rather on certain participles and almost all adjectives. Certainly with respect to adjectives, the fact that they agree with an N or NP is related to the fact that they modify or, in the case of predicate adjectives, predicate, the N or NP. Thus this agreement process is truly semantically based, unlike Subject-Verb Agreement. We

predict, therefore, that speakers might make gender agreement with the NP following *di* rather than with the head N in our NPs when it is modified or predicated by some adjective outside the overall NP. If we could find an NP of the type in (14) in which the head N and the NP following *di* contrasted in gender, we could test whether an element outside the NP which is to agree in gender with that NP takes the head N or the NP following *di* to agree with. We can, in fact, find examples where the head N and the NP following *di* contrast in gender.

(53) quell'angelo di tua moglie

m. f.

'that angel of your wife'

una peste di bambino

f. m.

'a wretch of a boy'

When such NPs are used in sentences where gender agreement with some adjective or participle outside the NP is called for, speakers are not happy. They typically hesitate in giving a judgment on a prepared sentence or in producing the required sentence on their own. Then more often than not they choose agreement with the NP following *di*. Milner (1978, p. 193) likewise reports for French that agreement is with the NP following *de* in these instances.

(54) a. Un gioiello di moglie non sarebbe incinta/  
??incinto continuamente.

'A jewel (m.) of a wife (f.) wouldn't be  
pregnant (f./??m.) continually.'

b. Questo straccio di gonna è troppo ?lungo/lunga.

'This rag (m.) of a skirt (f.) is too long  
(?m./f.).'

c. Una bestia di avvocato è arrivato/?arrivata.

'A fool (f.) of a lawyer (m.) has arrived  
(m./??f.).'

d. Quel diavolo di Maria è ?arrivato/?arrivata.

'That devil (m.) of Maria (f.) has arrived  
(?m./??f.).'

One might object that the oddity of *incinto* 'pregnant' in the masculine adds to the problem in (54a). Such an objection does not hold, however, since sentences like (55) are perfectly acceptable.

(55) Il donnone è incinto per la quinta volta.  
'The big woman is pregnant for the fifth time.'

The problem in (54a-d), then, is due to the contrast between genders of the two Ns within the NP, where the overall NP's referent is determined more by the referent of the NP that follows *di* than by the head N. While not all speakers may give precisely the acceptability judgments I have indicated in (54a-d), no speakers feel completely at ease with whatever choice of agreement they make in these examples. And all speakers say they'd avoid using such sentences. The confusion speakers feel at sentences like (54a-d) is expected, given the analysis here.

### 3.2 Other Semantic Properties

First, when the NP following *di* within the overall NP is indefinite, that NP is understood as having a referent picked out by the fact that it bears the property which it itself describes by definition (that is, by the sense of the N) and it is in the capacity of having this property that it is assigned the additional property of the sense of the head N. The overall NP, therefore, can be used itself as a predicate assigning a property to some argument, as well as being used referentially.

(56) Maria è un fiore di moglie.

'Maria is a flower of a wife.'

Un fiore di moglie è una meraviglia.

'A flower of a wife is a marvel.'

In either use in (56), it is in the property of being a wife that the NP following *di* is assigned the added property of being flowerlike. The NP following *di*, then, typically does not have a specifier of its own, just as it typically would not in the corresponding sentence with a copula (see Gunnarson 1986, p. 35, for French). Consider (57), suggested to me by Giulio Lepschy (personal communication).

- (57) a. quell'ignorante di dottore  
'that ignorant of a doctor'

- b. quell'ignorante del dottore  
'that ignorant doctor'

The referent of (57a) is that person who in the property of being a doctor is ignorant. In other words, he doesn't know his job, but perhaps as a musician he's a cultured person. (57a) contrasts with (57b). Here the NP following the inflected P *del* is definite and the whole NP is understood as having as its referent someone who is a doctor but the property of being a doctor is accidental to the assignment of the additional property of being an ignoramus. It may well be that he's a very fine doctor, but he's culturally a jerk. In (57a), then, the property of being a doctor is crucial to the assignment of the property of being an ignoramus. But in (57b) the property of being a doctor is accidental to the overall NP and is merely one way of identifying the person who happens to be an ignoramus.<sup>9</sup>

We expect, then, that if the sense of the indefinite NP following *di* is not an appropriate property to be assigned the additional property of the predicate N preceding *di*, the overall NP will be rejected. This is the case, as pointed out to me by Peter Hook (personal communication).

- (58) a. \*un fesso di neonato  
'a dummy of a newborn'

- ?un fesso di ragazzino  
'a dummy of a little boy'

- un fesso d'uomo  
'a dummy of a man'

- b. ??quel fesso del neonato  
'that dummy newborn'

- c. ?\*un donnaiuolo di dottore  
'a womanchaser of a doctor'

- d. il donnaiuolo del dottore  
'the womanchaser doctor'

In (58a) we see that in someone's property of being a newborn it is absurd to assign the property of being a dummy. That is, we don't typically characterize the behavior of newborns as being like that of dummies or not. But the absurdity decreases as the person's age and ability to be a dummy at that stage of life increases. Thus characterizing little boys as being dummies is not so silly and characterizing adults as being dummies is utterly normal. The NP following *di* in (58b), however, is definite, and while (58b) is certainly odd, it is not absurd in the same way as the first sentence of (58a). With the definite following *di* we are picking out that newborn that happens to be a dummy. The oddness is in the judgment: how on earth might someone come to the conclusion that a given newborn is a dummy? But the possibility arises that this newborn may have done something which is stupid, even for a newborn. Such a situation is odd but not definitionally absurd, in contrast to the idea of setting up classifications for newborns into dummies and nondummies.

In (58c), with an indefinite following *di*, we see that the property of being a doctor is most probably unrelated to the property of being a womanchaser. That is, it is hard for us to imagine a context in which in the capacity of a doctor a certain person is a womanchaser. But (58d) shows us that a doctor can happen to be a womanchaser, just probably not as a result of his capacity as a doctor.

We are now in a position to explain the following array of data. Our NPs can be definite or indefinite overall and the NP following *di* can be definite or indefinite (see the discussion of (31)-(34)). There are four logically possible combinations of definiteness on the specifiers in these NPs, then. But only three of them occur.

- (59) quell'egoista del direttore  
'that egotist director'

- (60) quell'egoista di direttore  
'that egotist of a director'

- (61) \*un'egoista del direttore  
'an egotist director'

- (62) un'egoista di direttore  
'an egotist of a director'

Given that when the NP following di is a definite NP it is understood as a referential NP, and given that the referent of the overall NP is determined more by the referent of the NP following di than by the head N, we can see that if the NP following di is definite, the entire NP must be definite or we will be assigning contradictory features to the referent of the overall NP. Thus (61) is unacceptable because we know we are talking about the referent of del dottore as though it is anaphoric to the discourse but at the same time the indefinite specifier un' tells us we are talking about the referent of the overall NP as though it is new to the discourse.<sup>10</sup> Thus when the NP following di is definite, the entire NP must be definite.<sup>11</sup>

When the NP following di is indefinite, however, we have a different type of situation because the NP following di now functions to pick out a referent in its capacity of having a certain property rather than as just happening to be identifiable by that property. Since it is a property assignment we are dealing with, there is no information given us by this NP as to its anaphoricity or lack of anaphoricity within the discourse. And, as noted above, we typically have no specifier on the NP following di at all. Thus the specifier of the overall NP is the only specifier, or, at least, the only specifier which indicates the feature of discourse anaphoricity. Therefore, if the overall NP is new to the discourse, an indefinite specifier in initial position is appropriate and if the overall NP is anaphoric to the discourse, a definite specifier in initial position is appropriate. No potential for contradiction internal to the overall NP arises.

Another semantic property of our NPs is that the head N gives an evaluative judgment of the NP following di. Typically this judgment is negative, but it can be positive (see Alinei 1971). If the overall NP is definite, the most likely reading is of negative judgment, so that (63), for example, out of context would favor an ironic reading (see Lepschy and Lepschy 1977).

- (63) quel tesoro di Giorgio  
'that treasure George'

If the overall NP is indefinite, the tendency for a negative judgment disappears, so that (64)-(65) have no ironic flavor.

- (64) un gigante d'uomo  
'a giant of a man'

- (65) un gioiello d'amico  
'a jewel of a friend'

I have no explanation for these facts.

Another semantic property of these NPs is that some speakers can have a complement on the head N which semantically belongs to the NP following di. All such speakers that I found are also speakers of English, and since English does this rampantly (see Hall 1973), I do not know if there is interference here. Milner 1978 gives many examples which display the same phenomenon in the comparable French construction.

- (66) il tuo cretino di fratello  
'your cretin of a brother'

- (67) your asshole of a sister  
French: mon crétin de mari  
'my cretin of a husband'

Notice that the phenomenon in (66)-(67) may be taken as one more indication of the strength of the NP following di/of with respect to the determination of the referent of the overall NP. (See the discussion around examples (49)-(56) above.)

#### 4. Conclusion

We have seen a particular structure, NPs like quel matto di Giorgio in Italian, in which the subject argument of a predicate neither c-commands the predicate nor is external to the maximal projection of that predicate. I conclude that the c-command and externality requirements on predication found in the linguistic literature are wrong.

Many questions arise now. First, one might wonder what led linguists to propose the c-command and externality requirements on the subject argument of a predicate. In Napoli 1987 I argue that the crucial evidence comes from the fact that many objects of prepositions are not available as subject arguments to predicates outside their PP. I show there that the relevant restriction is that in most

instances of secondary predication the subject argument of the secondary predicate must receive a theta role from some source other than the secondary predicate in addition to the theta role assigned by the secondary predicate.<sup>12</sup> With that restriction in mind, we can see that those objects of prepositions which do not receive theta roles independently of the secondary predicate cannot serve as the subject argument to that secondary predicate. But those objects of prepositions which receive theta roles independently of the secondary predicate can serve as the subject argument to that secondary predicate.

Second, if one were to follow the lead of Safir 1985 and propose that there is only one kind of indexing in grammar, then one would want to have predication indexing and binding indexing be sensitive to the same constraints. There is evidence that, in fact, predication and binding present the same sorts of questions for indexing theory (see Zubizarreta 1985 and Napoli 1987).

Third, the relevance of the notion of c-command and of the external/internal distinction to grammar is now open to question. I suggest in Napoli 1987 that c-command is a necessary notion in grammar, but that its applications are much more restricted than originally proposed in early GB literature (such as Chomsky 1981). Furthermore, I argue that the external argument notion is not the useful notion, but, rather, should be replaced in GB by the notion of subject argument (contra Williams 1984b), a notion which cannot be identified by any structural position.

These results, if correct, are perhaps not welcome but at least not unexpected. Predication is a semantic phenomenon involving the semantic relationship of property assignment. That predication should allow a wide range of syntactic relationships between a predicate and its subject argument may be taken as symptomatic of the proper division between semantic phenomena and syntactic phenomena.

#### NOTES

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1 I exclude from consideration here the irrelevant and grammatical reading of (18) in which the *di* phrase is a possessive, as in (i), suggested to me by Marcel Danesi.

- (i) Guarda quanto è furbo quel bambino. Di chi è quel furbo?  
'Look how sneaky that child is. Whose is that child?'

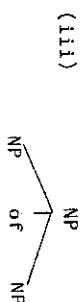
2 Again I exclude from consideration the irrelevant and grammatical reading of (20) in which the *di* phrase is a possessive, parallel to the situation in note 1 above.

3 The English counterparts to both of these types of Italian NPs are also syntactically inflexible, as noted in Janda 1980, p. 332.

- (i) \*Who did Mary invite that fool of *t*?  
(cf. Mary invited that fool of a doctor.  
but: Who did Mary invite the sister of *t*?)  
(ii) \*What did Mary see the city of *t*?  
(cf. Mary saw the city of Taormina.  
but: What did Mary see the destruction of *t*?)

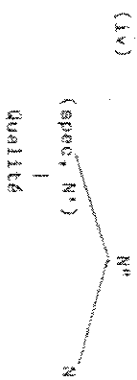
Napoli 1987 argues that the English NPs in (i) and (ii) also involve internal predication. In these examples it is the NP that follows *di/of* that bears the theta role assigned to the whole NP from its outside context (see the discussion of (49)-(50) below in the text). Thus the NP that fool of *t* in (49)-(50) below in the text). Therefore the NP that fool of *t* is not L-marked (in the sense of Chomsky 1986). Therefore the NP node dominating that fool of *t* is a barrier for the *t*. Therefore we have a violation of subadjacency in (i), and similarly in (ii) and in (18), (19), (21), and (22) in the text.

Janda 1980, on the other hand, takes the syntactic inflexibility of examples like (i) and (ii) as evidence that the *of* and the NP that follows it do not form a PP. He examines NPs like a friend of John's and argues that they have an analysis either like that in (28) below in the text or like that in (iii).



He explains the inability to move of the NP following of by appealing to the A/A principle, since this NP would be immediately dominated by another NP node in either analysis. Since he compares his NPs to NPs like those in (1) and (11), I assume he would propose the same two possible analyses for these NPs. The real issue here with respect to the position of (as in (14) or (28) or Janda's (11)), it seems to me, is whether of is a P in (1) and (11) or a Case-marker. For English I take no stand on this issue, since neither analysis of of crucially affects my claim that a subject argument need not c-command its predicate, given that of isn't present in some of the types of predication structures that I use to make my point in Napoli 1987. And notice that even in Janda's two possible analyses, the subject argument would not be external to the maximal projection of its predicate. For Italian I take the stand that di is, in fact, a preposition, for reasons given immediately below in the text.

Milner 1978 also observes the syntactic inflexibility of the comparable French construction and partly because of it he argues that in  $N_1$  de  $N_2$  the de  $N_2$  is not a PP and that the  $N_2$  is an N' and not an N'. The structure he offers is given in (iv) (see his p. 190), where  $N_1$  is under the specifier slot and  $N_2$  is under N'.



For Italian it is clear that  $N_2$  is an N' not an N'; see (27) below in the text and many other such examples. However, Milner gives no French examples comparable to (27). It may be that Italian and French differ on the crucial data here. (See also Milner's ungrammatical example 6.23 on p. 235, whose Italian counterpart is perfectly grammatical.)

4 Marta Lujan and Osvaldo Jaeggli (personal communication) told me that in Spanish *very* can appear with the head N in these NPs. In general *very* and its Italian counterpart, *molto*, do not appear with Ns, but with As. However, *molto* may appear with an N which is used predicatively, as can *very* in Spanish.

- (1) E molto uomo.  
'He's very much a man.'

Thus I do not take the ability of *very* to appear in these NPs in Spanish as evidence against the claim that the head of the whole phrase is an N.

5 Italian, unlike English, does not have a rule assigning genitive Case to NPs in specifier position of NP.

6 Again, as with (17), some speakers reject (30) since they reject all pronouns from these constructions. However, as with (17), all say *tu* is much more awful than *te*.

7 If one argued that the di of these phrases is a Case-marker and if Case-markers are not Ps but inflections on NP (so that in (14) we have an NP sister to the head NP rather than a PP sister), then Giorgio would c-command *molto*. I take di to be a P rather than a Case-marker for reasons already stated in the text. Therefore, I accept (14) here, let me point out, however, that if one could defend the proposal that the PP in (14) is actually an NP, this analysis would still be consistent with the theory of predication in Napoli 1987.

8 Rohrbach (1983, p. 104) says that when an NP contains evaluative material it is more likely to be open to the interpretation as a predicate. See also Hawkins 1978, Williams 1980, Koisetschlaeger 1983, and Safir (1985, p. 170).

9 The remarks on the interpretation of (57b) hold for Italian only. For a discussion of the semantics of the complex nominal used in the English gloss of (57b), see Napoli 1987.

10 See Rando and Napoli 1978 for a discussion of this notion of anaphoricity.

11 This is, as far as I know, a new explanation for the matching of specifiers, traditionally accounted for with Bembo's rule of corresponding articles.

12 This claim is close to being in complete opposition to that of Bresnan 1982. The differences are discussed and evaluated in Napoli 1987.

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