

Partitive MOST and the two-NP Hypothesis¹

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1 The puzzle. The contrast (1)b-c shows that MOST can combine with a collective predicate only if it occurs in a partitive construction (van der Does 1993):

- (1) a. Most students in my class are blond.
b. *Most students in my class met yesterday.
c. Most of the students in my class met yesterday.

Beyond partial disagreement, this generalization has been explained (Crnič 2009, Dobrovie-Sorin 2015) by assuming that **(i)** a ‘collective’ quantifier Q_{coll} (i.e., a Q that has a collective predicate in its scope) must have an entity in its restrictor; **(ii)** partitive MOST has an entity-denoting restrictor (which seems straightforward, since partitive most has an (of-)DP complement and DPs denote entities). The puzzle to be addressed in the talk is the ungrammaticality of (2)c, which is built with the Romanian counterpart of English *most* ((1a),(2a)). [Note: It can be shown that the morphosyntactic complexity of *cei mai mulți* ‘the more many’, meaning ‘(the) most’ is irrelevant for the issues at hand]. Despite the partitive configuration, a collective predicate is ruled out in the nuclear scope of (2)c :

- (2) a. Cei mai mulți studenți din clasa mea sunt blonzi.
the more many students of class my are blond. 'Most students in my class are blond'
b. *Cei mai mulți studenți din clasa mea s-au înfîlnit ieri.
the more many students of class-the my met yesterday.
c. *Cei mai mulți din studenții din clasa mea s-au înfîlnit ieri.
the more many of students-the of class-the my met yesterday.

My solution will preserve assumption **(i)** but revise assumption **(ii)**: overt partitivity is not a sufficient condition for a Q to have an entity-denoting restrictor. The proposal will rely on a revised version of the ‘two NP-hypothesis’ (Jackendoff 1977, Milner 1978, Cardinaletti & Giusti 2006, Magri 2008), which will allow me to maintain the ‘null hypothesis’ concerning syntactic category-semantic type correspondences: NPs denote sets, DPs denote entities. The proposal will be compared to alternatives that do not assume the two-NP hypothesis but instead must resort to type-shifting operations (de Hoop 1997, Shin 2016).

2. The two NP-hypothesis. According to Jackendoff 1977, Milner 1978, Cardinaletti & Giusti 2006, partitive configurations involve a null N-head. Thus, a DP of the form (3)a has the syntax shown in (3)b :

- (3) a. three of these students b. three $[[N^{\circ}\emptyset] [[of [these\ students]]]]$

If this analysis applied necessarily to all partitives, the examples in (1)c and (2)c would have the same underlying syntax and the contrast between them would remain unexplained. My solution will be to assume that a null N° obligatorily heads the complement of *cei mai multi*, whereas *most* can take an *of*-DP complement (no null N°):

- (4) a. [Most [of the students in my class]]
b. [Cei mai mulți $[_{NP}[N^{\circ}\emptyset]]$ [din $[_{DP}$ studenții din clasa mea]]]
the more many of students-the of class-the my

This syntactic assumption solves our problem: because of the presence of the null N° , the complement of *cei mai mulți* is an NP, hence set-denoting, and a set-restrictor Q cannot be a collective Q (see assumption (i)). This solution involves an important revision of the ‘two NP-hypothesis’ : only some of the partitive DPs have a null N° . If we want this revision to be more than just a stipulation, we need to answer the following questions: Which partitives may/cannot/necessarily have a null N° ? Does the presence of a null N° depend on the upstairs Det (cardinals vs proportionals, etc.) or on some characteristic of the *of*-DP constituent (e.g.,

¹ Work presented at the QUAD (Quantifiers and Determiners) ESSLI workshop, Toulouse, July 17-21 2017.

mass vs count) ? We will first propose answers to these general questions and then we will show that the difference postulated in (4)a-b follows without stipulation from the general theory.

3. The null N° of partitives is a sortal N. In support of the two NP-hypothesis, Selkirk (1977) observed that relative clauses attached to partitives yield ambiguous readings, depending on whether the relative restricts the overall DP or just the of-DP: *In the Uffizi they saw many of the famous paintings, several of which were by Sienese artists*. Magri 2008 observed that relatives attaching to singular partitives (*some of that book*) are not ambiguous, and my own observation is that mass partitives pattern with singular partitives. The purely syntactic null N° analysis (Jackendoff 1977, Cardinaletti&Giusti 2006) does not predict the difference between mass/singular and plural partitives: in both cases, a silent copy of the lexical N would be inserted. Magri is thus led to revise the standard analysis by postulating a null N° only for plural *of-DPs*. Which means that the null N° is not a mere ‘copy’ of the lexical N° (in this case a mass N° would have to be postulated on a par with a count N°) but rather a ‘sortal’ N°, e.g., something like [N°one] or [N°atom] (see also Kobuchi-Philip 2007), a proposal that I will adopt here. I nevertheless depart from Magri’s theory, according to which such a sortal null N° is needed in order to be able to pick up the atoms alone (rather than both atoms and parts of atoms such as legs or arms) from the denotation of definite plurals. This theory is problematic as soon as we take into account exact proportionals, e.g., *20% of the students*. Arguably (and this will be demonstrated in the talk), exact proportionals do not have a null N° (in de Hoop’s 1997 classification – which does not rely on the null N° hypothesis – exact proportionals are necessarily ‘entity-partitives’) and yet, we disregard parts of atoms when we compute them. A viable refinement of Magri’s proposal is that the null sortal is needed in order to pick up atoms as opposed to groups: *three Ø of these students vs three groups of these students*. Note that proportionals are incompatible with lexical sortal Ns/classifiers, **20% groups of the students*, which supports the absence of a null sortal N°. In sum, mass *of-DPs* are incompatible with a null sortal N°, whereas plural *of-DPs* are compatible with it, but do not require it.

4. Types of Det’s and the null N°. Our initial problem is not yet solved, since in both the Romanian and the English examples in (1)c-(2)c the of-DP is plural, and therefore a sortal N° could be postulated in both cases. To solve the problem we need to correlate the presence vs absence of a null N° in partitives with the type of Det. Ideally, we should be able to find correlations between the selectional properties of Det’s in non-partitive configurations and the presence/absence of a null N° in partitives. The following correlations will be proposed and motivated: (i) Det’s that cannot take an NP complement (e.g., exact proportionals, **20% students arrived yesterday*) => no null N° in partitives; (ii) Det’s that can take both mass and plural NPs (*some*) => null N° in partitives is possible, but not compulsory; (iii) Det’s that can take only plural NPs => obligatory null N° in partitives.

5. MUCH, MANY and their Superlatives. Our initial puzzle is now solved. In the positive form, both English and Romanian distinguish between MUCH and MANY, which respectively require mass and plural NP complements. The distinction is preserved in Romanian for the superlative form, which - given the correlations in §4 above- forces the presence of a null N° in partitives, as proposed in (4)b above. The English *most*, on the other hand selects both mass and plural NPs, which allows it to take either an NP or a of-DP complement.

Selected References. Cardinaletti & Giusti (2006) "The Syntax of Quantified Phrases and Quantitative Clitics", in *The Blackwell Companion to Syntax*; Kobuchi-Philip 2007 "Semantics of the Partitive Construction", SuB11; de Hoop (1997) "A semantic reanalysis of the partitive construction", *Lingua*. Magri (2008) "The Sortal Theory of Plurals", SuB12; Milner (1978) *De la syntaxe à l'interprétation*, le Seuil. Shin (2016) "Quantifiers in English partitives", NLLT 34.

Abstract: Whereas *most*+NP_{pl} disallows collective predicates in both English and Romanian, *most*+*of*+DP_{pl} behaves differently in the two languages, allowing collective predicates in English but not in Romanian. I explain this difference by proposing that partitives headed by MOST contain a null N in Romanian (*cei mai mulți* [_N∅] *din*+DP) but not in English. I derive this difference from the morphosyntactic properties of the determiners: whereas Engl. *most* is unmarked for number, its Ro. counterpart *cei mai mulți* is plural. I argue that a null sortal N is required by those determiners that are marked as plural.