

Pseudo-Partitives in English

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Pseudo-partitives are $[N_1 \text{ of } N_2]$ sequences in which N_1 denotes a quantity or measure and in which N_2 is a bare plural or a singular mass noun, as in *a lot of things*, *a liter of water* and *a group of volunteers*. There are two types of such sequences. The regular ones share the number value of N_1 , and the idiosyncratic ones share the number value of N_2 . We first address the question of how both types can best be analyzed in terms of HPSG and then turn to the issue of which factors steer the choice between the regular and the idiosyncratic use.

1 Analysis

Some examples of regular pseudo-partitives are the italicized phrases in (1).

- (1) a. *A pound of cucumbers* yields about a pint of pickles. (COCA)
- b. *Roughly five billion pounds of carpet* end up in landfills each year. (COCA)

The finite verb is singular if N_1 is singular, also if N_2 is plural, as in (1a), and it is plural if N_1 is plural, also if N_2 is singular, as in (1b). To model this we assume a right branching structure, as in $[a \text{ [pound [of [cucumbers]]]]]$, in which N_1 takes a PP[*of*] complement. We assume that the PP is a complement of N_1 , rather than an adjunct, since the choice of the preposition is not free (*a pound of/*for/*on cucumbers*), and since the PP[*of*] has to precede PP-adjuncts.

- (2) a. This was another big piece of evidence in the case. (COCA)
- b. *This was another big piece in the case of evidence.

Examples of idiosyncratic pseudo-partitives are the italicized phrases in (3).

- (3) a. *A lot of things* happen and change over the years. (COCA)
- b. *Lots of power* is necessary to churn heavy soil. (COCA)

The finite verb is plural if N_2 is plural, also if N_1 is singular, as in (3a), and it is singular if N_2 is singular, also if N_1 is plural, as in (3b). To model this Huddleston and Pullum (2002) assigns the same right branching structure as for the regular pseudo-partitives, but with “the grammatical number percolating upwards from the oblique rather than being determined by the head” (Huddleston and Pullum

2002, 352). This sharing of grammatical number between a phrase and one of its non-head great-granddaughters does not mesh well with the localist nature of HPSG. To amend this one would need to allow

- *of* to inherit the number value of its NP complement
- N_1 to inherit the number value of its PP complement

This, however, has the effect that N_1 is treated as plural in *a lot of things* and as singular in *lots of power*, contrary to fact. Besides, it complicates the treatment of the combination of N_1 with the article, for if *lot* is plural in *a lot of things*, it should not be compatible with the indefinite article (**a things*), contrary to fact.

An alternative is to treat N_2 as the head of the NP and N_1 as part of its determiner. This is proposed in Selkirk (1977), who assigns a structure with a phrasal determiner that also includes *of*, as in $[[a \text{ lot of}] [\textit{obstacles}]]$. A variant of this treatment is the one of Jackendoff (1977) and Keizer (2007, 149), who treat *of* as a linking element, assigning a ternary structure, as in $[[a \text{ lot}] [\textit{of}] [\textit{obstacles}]]$. Huddleston and Pullum (2002, 352) dismiss such structures with the argument that *of* forms a constituent with N_2 , as illustrated in (4).

- (4) a. We called a meeting of the first-year students, [of whom a number __] had complained about the assessment system.
- b. Most students like continuous assessment but [a number __] prefer the old examination system.

Our aim now is to provide an analysis that fits in with the localist nature of HPSG, that treats N_2 as the head of the NP, as proposed by Selkirk, Jackendoff and Keizer, and that treats *of* as forming a constituent with N_2 , as proposed by Huddleston and Pullum. For this purpose we adopt a binary branching structure, as in $[[a \text{ lot}] [\textit{of} [\textit{obstacles}]]]$, in which N_2 is the head of both the combination with *of* and the combination with *a lot*. Let us zoom in on the details, using Figure 1 for illustration.

First, *of* is not treated as the head of a PP, but as a functor: It selects a bare nominal as its head sister and its MARKING value is *of*, as spelled out in Figure 2.¹ Its COMPS value is the empty list, since this is not a complement selecting use of *of*. In Figure 1 the SELECT value of the preposition is unified with the SYNSEM value of the head sister (②) and the MARKING value is shared with the mother (③). Other uses of *of* which have been argued to require a functor treatment include those in the *kind/sort/type* Construction (*those kind of problems*) (Maekawa 2015), and in the Binominal Noun Phrase Construction (*her nitwit of*

¹Both *bare* and *of* are subtypes of *unmarked*.

a husband) (Van Eynde 2018). Examples of prepositional functors in Dutch are discussed in Van Eynde (2004).

Second, N_1 is the head of a phrasal determiner and the internal structure of that phrase is that of a normal NP. Notice, for instance, that N_1 may be modified by adjectives or APs, as in *an awful lot of people* and *an unusually large number of obstacles*. Notice also that the combination of N_1 with the determiner shows the usual co-occurrence restrictions: *a lot of obstacles* vs. **a lots of obstacles*. A distinctive property of N_1 is that it selects a nominal that is introduced by *of* and that denotes a parameter. The selection may also involve a restriction on the number value of N_2 . *number*, for instance, only combines with plural N_2 s (**a number of traffic*). This is made explicit in its AVM in Figure 3. Since N_1 is the head of the determiner phrase, it shares its HEAD|SELECT value with the phrase (4).

Third, the indefinite article selects an unmarked singular nominal (5) and shares its MARKING value with the phrase (6). The relevant MARKING value is *a*, which is a subtype of *marked*. The need for such a specific value can be illustrated with examples that contain a more complex phrasal determiner, such as those in (5), quoted from Huddleston and Pullum (2002, 350).

- (5) a. How large a number of students have enrolled, did you say?
- b. A hell of a lot of people are going to be disappointed.

(5a) is an instance of the Big Mess Construction, in which *how large* combines with *a number*. This combination is only allowed if the nominal is introduced by the indefinite article: **how large some/any/the number*. (5b) is an instance of the Binominal Noun Phrase Construction, in which *a hell* combines with a phrase that is introduced by *of* and that contains the indefinite article: **a hell of some/any/the lot*.

Fourth, N_2 is the head in the combination with *of* and also in the combination with the phrasal determiner. Given the Head Feature Principle, it shares its HEAD value with the NP as a whole (7). As a consequence, the NP is plural if N_2 is plural and it is singular if N_2 is singular. Moreover, since the phrasal determiner shares its MARKING value with the NP, the latter is marked as well (8).

This treatment can be extended straightforwardly to the combinations with *few*, *many* and *little* in (6).

- (6) a. A few hands go up when he asks if there are valid excuses. (COCA)
- b. A great many things depend on that outcome. (COCA)
- c. A little caution makes great sense in such a volatile environment.

They select a bare N_2 , rather than one that is introduced by *of*, but the combinations can be analyzed along the same lines, with N_2 as the head and N_1 as part of its phrasal determiner.

2 Usage

Whether a pseudo-partitive is regular or idiosyncratic depends on a variety of factors. A major one concerns the lexical content of N_1 . Combinations with *pound* and *piece*, for instance, typically qualify as regular. By contrast, combinations with *lot* and *number* typically qualify as idiosyncratic. A count in COCA, for instance, yields 614 instance for the idiosyncratic pattern [lot of N-pl V-pl] and only one for the regular pattern [lot of N-pl V-sg]. Combinations with nouns that denote a collection, such as *group*, show more variation.

- (7) a. A group of police cruisers is speeding across the bridge with light and sirens. (COCA)
- b. A group of immigrants move in and, seemingly, overnight, they're far more successful than native residents. (COCA)

COCA has 150 instances of the regular pattern [A group of N-pl V-sg] and 111 of the idiosyncratic one [A group of N-pl V-pl]. The lexical content of N_1 is, hence, not the only factor. This is also clear from the fact that *number* occasionally occurs in sequences of the regular type, as in (8).

- (8) The number of people living on the city's streets is on the rise.

The full paper will contain more quantitative data of this kind and will identify a number of factors which steer the choice.

References

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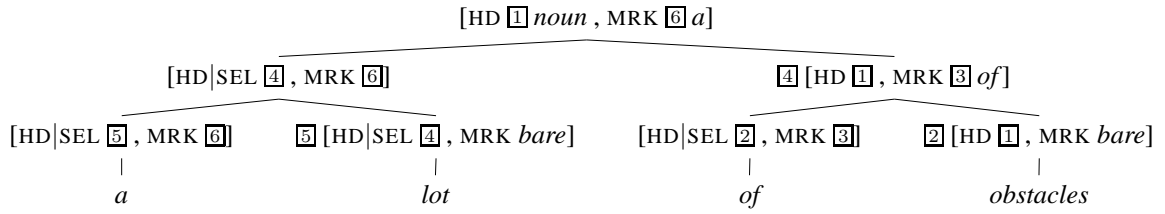


Figure 1: Tree with CATEGORY values for *a lot of obstacles*

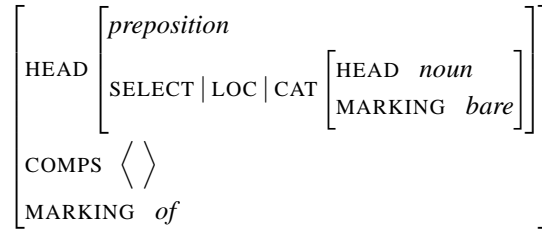


Figure 2: The CATEGORY value of the prepositional functor *of*

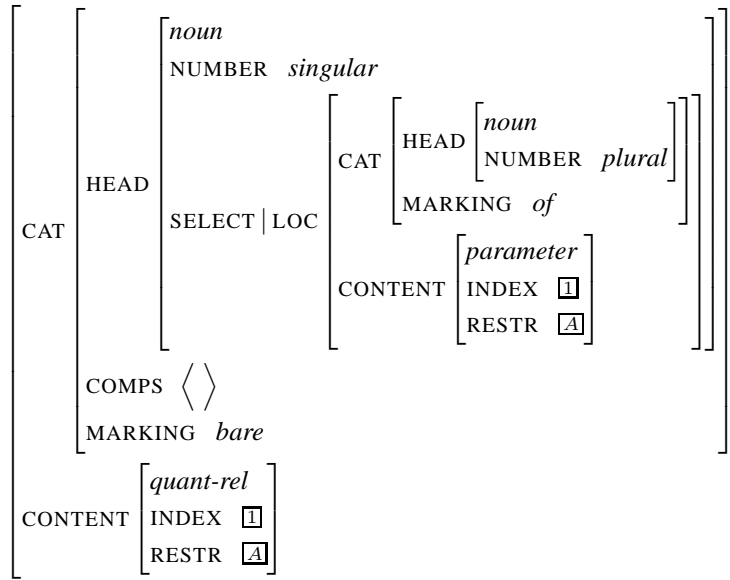


Figure 3: The LOCAL value of the nominal functor *number*