

A Note on (*a/the*) *Few*

Kayono Shiobara*

Abstract

In this paper, I examine the possible interpretations of English sentences which contain a quantificational DP, (*a/the*) *few* N. Based on the semantic and syntactic differences between quantificational sentences involving the quantifier *a/the few* on the one hand and the quantifier *few* on the other, I argue that they have different syntactic structure. In particular, I propose that *few* raises to the head D position within the DP when it is not preceded by an article, whereas there is no such movement in the DP with *a/the few*. The proposed analysis is conceptually welcome in that it points to the parallelism between the nominal projection DP and the clausal projection CP, in that the head serves to determine the semantic type of the phrase in both cases.

1. Introduction

Compare (1) and (2):

- (1) a. Chris agrees.
b. Jill knows Kate.
- (2) a. No man agrees.
b. Every man admires some woman.

The sentences in (1) are simple ones involving singular referring terms and predicates. On the other hand, the sentences in (2) are often called “quantified” or “quantificational” since they purport to describe how many things of a certain sort are such and such: how many men are also agrees, how many men admire how many women, and so on. Formatives like *every*, *no*, *some*, *two*, etc., are called “quantifier” and the determiner phrases (DPs) that contain them, such as *every man* and *no woman*, are called “quantified” DPs.

I am indebted to Chris Tancredi for helpful discussin on the topic of this paper. Needless to say, I am solely responsible for any remaining error or misunderstanding of the data.

* 准教授／言語学

Formatives such as *few* and *a few* are also quantifiers because they describe the amount of entities denoted by the following noun. In this paper, I examine the semantic properties of quantificational sentences involving *a few*, *few*, or *the few*, and consider how their semantic differences are analyzed syntactically.

2. Quantificational Sentences with (*a/the*) *Few*

2.1. *A Few* vs. *Few*

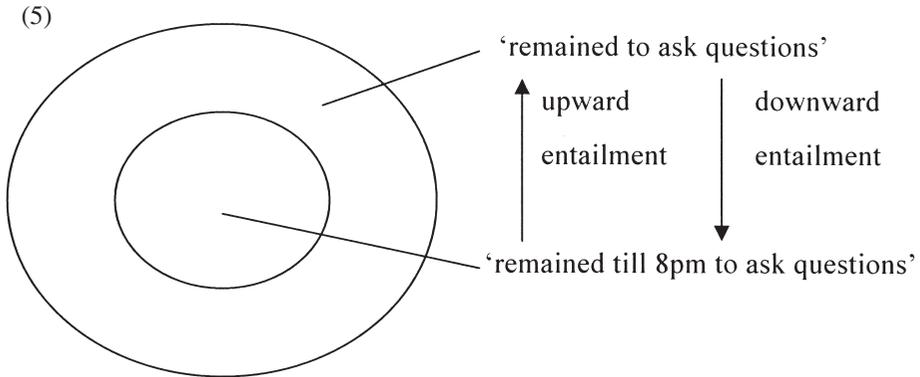
Compare the sentences in (3) which contain (*a*) *few*:

- (3) a. A few students remained to ask questions
- b. Few students remained to ask questions.

The sentence in (3a) entails that there are a small number of students (e.g. two or three) who remained to ask questions, and the sentence in (3b) entails that there are a small proportion of students (e.g. two or three percent) who remained to ask questions. The semantic difference between the quantificational sentences with *a few* and *few* becomes clear when we compare (3) with (4), for example: (4a) entails (3a), whereas (3b) entails (4b).

- (4) a. A few students remained till 8pm to ask questions.
- b. Few students remained till 8pm to ask questions.

In formal semantic terms, the quantifiers *a few* and *few* differ in that the former induces “upward entailment” whereas the latter induces “downward entailment.” Upward entailment is the one from a subset to a superset, and downward entailment is the one of the opposite direction. Other formatives that induce upward entailment include *many*, *some*, *a little*, *at least n* ($n = \text{number}$), *no less than n*, and *as many as n*; and other formatives that induce downward entailment include *no*, *little*, *at most n*, *no more than n*, and *as few as n* (Ikeuchi 1985: 220-224 and the references therein).



Thus, the quantifiers *a few* and *few* are opposite semantically, and the difference should be due to the presence of the infinite article *a* in *a few*, or the absence of such an article in *few*. In the next section, I will examine the interpretation of quantificational sentences involving *few* preceded by another article, *the*.

2.2. *The Few*

The quantifier *few* may be preceded by a definite article (or a determiner) such as “the” while *a few* may not be preceded by it or have it in between:¹⁾

- (6) a. the few
 b. *the a few, *a the few

The few forces upward entailment regardless of whether the entity denoted by the following noun is in a small number or in a small proportion. For example, in (7), the number of the students who came to the office to ask questions was small (only three), and in (8), the proportion of the students who came to the office to ask questions was small (only six out of two hundred, i.e. three percent). Both of the quantificational sentences in (7) and (8) entail that “the (few) students remained,” but not that “the (few) students remained till 8pm or even later than that.”

- (7) [Context: Three out of five students in my class came to my office to ask questions.]
 The few students remained till 8pm.
- (8) [Context: Six out of two hundred students in my class came to my office to ask questions.]

The few students remained till 8pm.

That is to say, the DP *the few students* is the same as the DP *those students* with respect to entailment property.

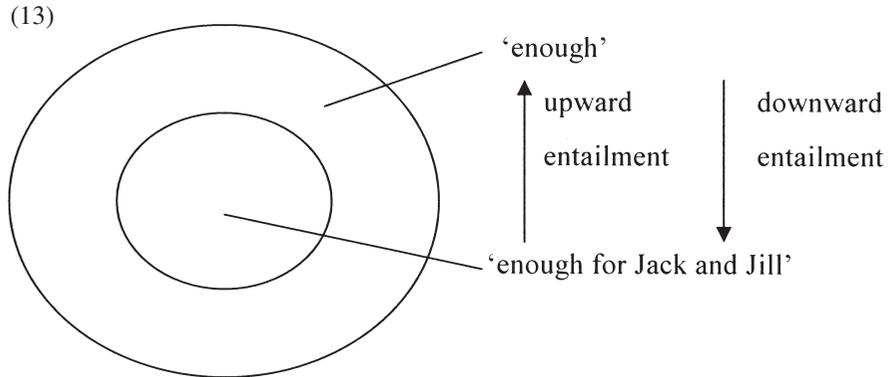
More pieces of evidence that *a few* and *the few* behave the same and differently from *few* are found in (9) and (10): *a few* and *the few* do not license the negative polarity item *ever* whereas *few* does; and *a few* and *the few* take the “*too* tag” whereas *few* takes the “*either* tag” exhibiting the characteristics of sentential negation. (Examples in (9) and (10) are due to Solt 2006: 382, 384)

- (9) a. *A few Mormons I know have ever had a cigarette.
b. *The few Mormons I know have ever had a cigarette.
c. Few Mormons I know have ever had a cigarette.
- (10) a. A few students came to the party, and a few professors did ✓*too*/**either*.
b. The few Greek students came to the party, and the few Greek professors did ✓*too*/**either*.
c. Few men like Brussels sprouts, and few women do, **too*/✓*either*.

Thus, the semantic difference between *a few* and *the few* on the one hand, and *few* on the other should be due to the presence or absence of the preceding article. To be more specific, what seems to force upward entailment in the sentences with *a few* and *the few* is the presence of the indefinite article *a* or the definite article *the*, and what seems to force downward entailment in the sentences with *few* is the obligatory absence of such an article. If this is true, the word *few* itself has nothing to do with whichever entailment.²⁾

Note further that the contrast between upward and downward entailment is maintained regardless of the quantifier is followed by *more* or not. For example, (12a) entails (11a) whereas (11b) entails (12b):

- (11) a. A few more glasses of beer will be enough.
b. Few more glasses of beer will be enough.
- (12) a. A few more glasses of beer will be enough for Jack and Jill.
b. Few more glasses of beer will be enough for Jack and Jill.



Therefore, it seems that the item which precedes the quantifier *few*, not the one that follows it, determines whether the quantified DP is upward entailing or downward entailing.

In the next section, I will consider the implication of the above observations for the syntax of quantified DPs.

3. Syntax of (*a/the*) *Few*

Recall that *a few* and *the few* do not license the negative polarity item *ever*, whereas *few* does, as is seen in (9) (reproduced below).

- (9)
- a. *A few Mormons I know have ever had a cigarette.
 - b. *The few Mormons I know have ever had a cigarette.
 - c. Few Mormons I know have ever had a cigarette.

Note here that the overtly negative *not many* exhibits the same behavior as *few* with respect to the licensing of the negative polarity item, as exemplified in (14a). If it is preceded by the definite article *the*, however, the negative polarity item is unavailable, as is seen in (14b).

- (14)
- a. Not many Mormons have ever had a cigarette.
 - b. *The not many Mormons I know have ever had a cigarette.

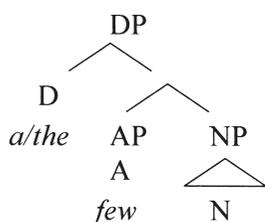
(Solt 2006: 388)

Given the parallelism between (9c) and (14a), I would like to propose, in line with the conjecture in Solt (2006: 388), that *few* occupies the DP-initial position as a result of movement. Since *few* exhibits adjectival characteristics (as noted by Partee 1989, for example), in that it has comparative and superlative forms as in (15a), may appear in predicate position as in (15b), and

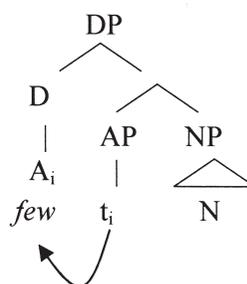
may be conjoined with adjectives as in (15c), I assume that the movement operation is that of head-movement from A(djective) to D(eterminer).³⁾ This is illustrated in (16).

- (15) a. fewer, fewest
 b. His good qualities are few.
 c. The flowers are few and small, but readily identifiable by their uniquely marked lip. (Solt 2006: 381)

- (16) a. *a/the few*

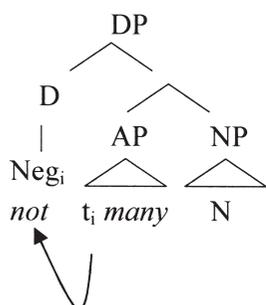


- b. *few*

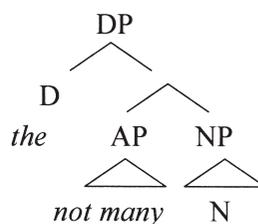


Though the detailed structure is yet to be examined, *not* in (14b) is too embedded to license the negative polarity item *even*, whereas *few* in (9c) and *not* in (14a) are in D, which is high enough to license the negative polarity item:

- (17) a. *not many*



- b. *the not many*



One of the implications of the proposed structures of the DPs, *a/the few* NP and *few* N, is that it is the head D that determines the semantic property of the DP: the article *a/the* in the head D serves to determine that the whole DP is upward entailing in (16a); and *few* in the head D serves to determine that the whole DP is downward entailing in (16b). In other words, the syntactic difference of DPs corresponds to the semantic difference of the DPs. In particular,

what sits in the head D determines the semantic property of the whole DP. This is a welcome result because it points to the parallelism between the nominal projection DP and the clausal projection CP, in that the head encodes the “type” of the whole phrase (cf. Cheng 1991).

REFERENCES

- Cheng, Lisa (1991) *On the Typology of Wh-questions*. Doctoral thesis, MIT. [published by Garland in 1997]
- Ikeuchi, Masayuki (1985) *Meishiku no Gentei Hyogen*. Tokyo: Taishukan.
- Partee, Barbara. H. (1989) “Many quantifiers,” *ESCOL* 89: 383-402.
- Solt, Stephanie (2006) “Monotonicity, closure and the semantics of *few*,” *WCCFL* 25: 380-389.

NOTES

- 1) Note that *a* and *few* can be separated by an adverb (*a very few students*) or by an adjective modifying the head noun (*a lucky few students*) (Solt 2006: 384).
- 2) Alternatively, we might assume that *few* can be compatible with both entailment. See Solt (2006) for an analysis of the lexical entry of *few* as decomposable into a positive one-place cardinality predicate and a negation operator.
- 3) I assume here that head-movement is substitution, not adjunction, just for simplicity.