



## **WESTERN LINGUISTICS: AN HISTORICAL INTRODUCTION**

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For the formalists, language is a formal system describable in terms of rules for the acoustic or visual expression of meanings, and whatever appears to go against the system tends to be regarded as a nuisance, attributable to deplorable interference from outside sources. Formalists tend to play down the fact that language occurs as a natural faculty of the human race and is therefore an empirical object to be approached by hypotheses that aim at empirical adequacy. They prefer to approach the task of analysing language with a formal system that has been developed elsewhere, usually in logic or mathematics, and tend to impose their a priori, preconceived system on what they perceive as the facts of language. Keen observation of facts is not their strongest point. Instead, they usually underestimate the difficulties posed by natural languages. And when these are pointed out to them they are prepared to take them into account only to the extent that their system is not messed up too badly. Facts that might show the unviability of their approach are usually ruled out of order and attributed to the weakness (or dumbness) of the humans who use language. For them, language is a product of ingenuity,

'something which we could have cooked up ourselves . . . had this not, in effect, already been done (perhaps none too well)' (Travis 1981:1).

In the ecologicistic approach, on the other hand, language is primarily seen as a product of nature, and hence as an object for empirical research. The expectation is that language, like nature, will manifest itself in all kinds of unexpected variations on and deviations from an as yet largely unknown rule or norm system. Regularities are wonderful, but, as in the rest of nature, they are not always readily detectable and they tend to leave room for idiosyncrasies or, as they are commonly called, exceptions. For an ecologist, language is an object of wonder, a 'storehouse of unimaginable complexities and surprises, to be discerned by looking very closely' (Travis 1981:1), and, we may add, by exerting patience and mulling over the facts in our minds until a bright idea springs up and shows them in their true light.

[. . .]

## 6.2.3 Presuppositions

We shall now pass on to a discussion of presuppositions, a phenomenon in the semantics of language that does not fit at all into the established logical mould and is a prime example of how an ecologicistic method of analysis can supplement, and to some extent supplant, the purely logical analysis.

### 6.2.3.1 History of the presupposition problem

#### 6.2.3.1.1 EUBULIDES OF MEGARA

##### The Megarian school of philosophy

Presuppositions already caused Aristotle trouble. The trouble came from Megara, a town about thirty miles west of Athens. Megara had a small philosophy school that had been founded by a follower of Socrates called Euclides ( $\pm 450-380$  BC). His successor at the school was Eubulides, who originated from Miletus in Asia Minor. Little is known about Eubulides' life. He is said to have offered hospitality to Plato and some of his fellow Socratics immediately after Socrates' death in 399, when, for political reasons, they thought it safer to leave Athens (Plato, in fact, exiled himself from Athens till 387). It is also said that he took over the Megarian school in 380. Tradition has it, moreover, that he taught rhetoric to Demosthenes (384-322), the great Athenian public orator and politician who was the main obstacle to Macedonian power over Athens. If these reports are reliable he must have been Aristotle's senior by at least thirty-five years.

The links with Socrates, Plato and Demosthenes are relevant in that they show a political affiliation. Eubulides apparently sided with the Athenian nationalist party, who opposed Macedonian domination and were thus set against Alexander's reign, and also against Aristotle's presence in Athens.\*

##### Eubulides' paradoxes

Eubulides is known in the history of philosophy for his so-called paradoxes, four in number. The most famous one is the *Liar Paradox*, which comes about, in its simplest form, when a sentence says of itself that it is false, or when two sentences say of each other that they are false. The paradox is that when such sentences are true they are at the same time false, and when they are false they are at the same time true. This paradox was a well-known riddle in Antiquity, and a frequent source of worry to Medieval as well as modern logicians. Tarski

considered it important enough to set up his famous distinction between object language and metalanguage to get rid of it, adding the injunction that the two should never be mixed.

The paradox is also found in St. Paul's Epistle to Titus (I. 12–13). In a diatribe against the evil Cretans, he writes, apparently unaware of the paradox:

One of their own prophets said: 'Cretans always lie, the wicked beasts and lazy bellies', and he spoke the truth.

The 'prophet' in question is usually identified as the half-mythical Cretan poet Epimenides (6th century BC), which is why the paradox is also often called the *Epimenidan Paradox*.

Another paradox is the *Electra Paradox*,\*\* also called the *Paradox of the Hooded Man*. [. . .]

Then there is the *Paradox of the Heap*, or the *Sorites* (from the Greek word *sōrós* 'heap'). It runs as follows. One grain of sand in an hourglass does not make a heap. Two grains do not make a heap. Ten grains do not make a heap. Five hundred grains, however, do make a heap. At what stage does it become true to say that there is a heap of sand? The implication is that there is an intermediate 'grey' area where it is neither entirely true nor entirely false to say that there is a heap. This paradox would seem to call into doubt the Aristotelian Principle of Bivalence, in particular the Principle of the Excluded Middle. It is a plea for recognition of the inherent vagueness of many common predicates.

Finally, we have the *Paradox of the Horns*, expressed as a somewhat salacious joke about cuckolds (unappreciated by Aristotle, one presumes):

What you have not lost you still have. But you have not lost your horns. So you still have horns.

If this reasoning were correct one could argue that every person who has never worn horns wears them. It is this paradox that will occupy us in the present section. Kneale and Kneale's comment is as follows:

[Paradoxes] of the fourth type show that if a statement (e.g. 'You have lost horns') involves a presupposition (e.g. that you once had horns) it may be negated either in a restricted way with acceptance of the same assumption or in an unrestricted way without acceptance of that presupposition.

Kneale and Kneale (1962:114)

We shall see below that this comment is precisely right.

[. . .]

### 6.2.3.1.3 FREGE'S APPROACH TO PRESUPPOSITIONS

The modern history of presupposition theory probably starts with a footnote in Frege (1884),<sup>1</sup> [. . .] For Frege, the use of a definite term normally presupposes ('setzt voraus') the real existence of its reference object. When we say *The moon is smaller than the earth* we presuppose that there is a real moon and a real earth, and we say of the former that it is smaller than the latter (Frege 1892: 31). Only if this presupposition is fulfilled can the sentence have a truth value. If it is not fulfilled the sentence may still have a sense or meaning, as happens in fictional, often literary, contexts but it lacks a truth value. Most sentences in Homer's *Odyssey*, for example, are without a truth value:

Why is the thought not sufficient for us? Because and to the extent that we care about its truth value. This is not always the case. When we listen to an epic poem, for example, it is, besides the euphony of the language, only the sense of the sentences and the images and feelings evoked by them that will captivate us. But as soon as we ask if it is all true we take leave of the artistic pleasure and embark on a scientific investigation. For that reason it is a matter of total indifference to us whether the name *Ulysses*, for example, has a reference as long as we take the poem to be no more than a work of art. It is, therefore, the effort to achieve truth that pushes us forward everywhere from the sense to the reference.

Frege (1892: 33)

This argument is part of Frege's vision of a compositional calculus. [. . .] [T]he truth value of a simple sentence is computed by feeding the term extensions into the function denoted by the predicate. Since predicates denote characteristic functions, the resulting value is a truth value. Now, clearly, if one of the terms lacks an extension there is no, or a deficient, input to the predicate function and no truth value can result.

The notion of presupposition is not at all prominent in Frege (1892). The term *presuppose* ('voraussetzen') is not a technical term in that article. It is used in its ordinary, natural meaning, only to support the thesis that truth values can be computed compositionally by means of a categorial calculus. It is not until Strawson takes up the issue again, more than half a century later, that presupposition theory takes off as a serious part of semantics.

Meanwhile we note that Frege and Strawson discussed only *existential presupposition*. The presupposition that Eubulides presented in his Paradox of the Horns was of a different kind, to do with the lexical predicate *have lost*. And the presuppositions associated with terms like *only*, as studied by Peter of Spain and Walter Burley, are different again.<sup>†</sup> [. . .]

#### 6.2.3.1.4 GEACH ON PRESUPPOSITIONS

There is a curious little article of 1950, written by Peter Geach, then at Cambridge, where the concept of presupposition is used in, let us say, the old-fashioned way, not restricted to existential presupposition. The article is a critique of Russell's Theory of Descriptions (see 6.1.2.3), first on account of its failure to recognize presuppositions in ordinary language, then on account of Russell and Whitehead's defective definition of the iota operator in *Principia Mathematica*. About the former, Geach writes:

On Russell's view 'the King of France is bald' is a false assertion. This view seems to me to commit the fallacy of 'many questions'. To see how this is so, let us take a typical example of the fallacy: the demand for 'a plain answer – yes or no!' to the question 'have you been happier since your wife died?' Three questions are here involved:

1. Have you ever had a wife?
2. Is she dead?
3. Have you been happier since then?

The act of asking question 2 presupposes an affirmative answer to question 1; if the true answer to 1 is negative, question 2 *does not arise*. The act of asking question 3 presupposes an affirmative answer to question 2; if question 2 does not arise, or if the answer to it is negative, question 3 *does not arise*. When a question does not arise,

the only proper way of answering it is to say so and explain the reason; the 'plain' affirmative or negative answer, though grammatically possible, is *out of place*. (I do not call it 'meaningless' because the word is a mere catchword nowadays.) This does not go against the laws of contradiction and excluded middle; what these laws tell us is that *if* the question arose 'yes' and 'no' would be exclusive alternatives.

Similarly, the question 'Is the present King of France bald?' involves two other questions:

4. Is anybody at the moment a King of France?
5. Are there at the moment different people each of whom is a King of France?  
And it does not arise unless the answer to 4 is affirmative and the answer to 5 is negative.

Geach (1950: 84–5)

We shall see below that Geach is wrong in saying that this does not violate the law of excluded middle. What Geach has in mind is a gapped bivalent logic, which does violate PET, and hence the law of excluded middle. But the interesting thing about this article is that it takes us back to Peter of Spain and Walter Burley, with the additional benefit that the existential presupposition is brought in line with other kinds of presupposition. [. . .]

#### 6.2.3.1.5 STRAWSON'S ANALYSIS OF PRESUPPOSITIONS

[. . .]

##### **Occasion sentences restored**

Strawson begins with restoring occasion sentences to their rightful position. Russell had undertaken to make them disappear by analysing definite descriptions in terms of quantifiers. His basically Aristotelian programme, which was later continued by Quine, consisted in reducing all occasion sentences to eternal sentences. Strawson pointed out that it is much more sensible to say that sentences as such, that is as types, do not have a truth value and should not be expected to have one. Only assertive sentences that are actually uttered, or conceived, in an appropriate context, statements in his terminology, can be expected to have a truth value.

The normal or prototypical sentence has to be anchored in discourse to acquire a truth value. Suppose I produce the sentence (to hark back to Geach's example) *He has been happier since his wife died* out of the blue, for example in an English language class to discuss its grammatical and semantic properties. I would make myself look ridiculous if I asked the students if this sentence is true or false. I can ask what the subject is, what the meaning is of the present perfect tense *has been*, etc. But I cannot reasonably ask whether the sentence is true or false. That is possible only if the sentence is properly anchored in discourse, so that it is known who is meant by *he* and in such a way that it is also understood that that person is a widower. Or, as Strawson has it, if the sentence is used as a statement.

[. . .]

Strawson, however, like Geach quoted above, goes further. It may be found that one of the anchoring points of a well-anchored occasion sentence is unsound, or false. If such falsity passes undetected nothing happens: the story goes on untrammelled, as when I spin a yarn about a non-existent duke of Lombardy, saying all sorts of things about him, and am believed by my gullible audience. But the moment I introduce the fictitious duke my story radically departs from reality in that subsequent sentences will fit into a context that has long lost its correspondence with the world as it is.

In Strawson's (and Geach's) view a sentence which is otherwise well-anchored but whose contextual anchoring is false in one or more respects, also lacks a truth value, no matter whether the falsity of the anchoring point or points in question is known or unknown to the discourse participants. [. . .]

[A] sentence, which is well-anchored but with a faulty context, is normally said to suffer from presupposition failure. For these sentences it is not obvious at all that they lack a truth value. They can be used to express a propositional commitment, and the question of their truth or falsity, therefore, most certainly does arise.

### Now the Bivalence Principle is affected

Strawson's argument is [. . .] about sentences suffering from presupposition failure. He does recognize that they express a propositional commitment, and concludes that they must be taken into account in propositional logic, [. . .] Yet he also stresses repeatedly that 'the question of their truth or falsity simply does not arise', which is odd given the fact they do contain a real well-anchored proposition.

It seems that we must accept that the question of the truth or falsity of sentences suffering from presupposition failure does arise. The very history of presupposition theory, where this question keeps arising, proves the point. But if we disregard this detail and look at Strawson's analysis as it is, we see that he envisages a logic where propositions are allowed to lack a truth value, besides being either true or false. This idea makes perfect sense and is implementable as a system of propositional logic, known as a *gapped bivalent logic*. Now a gapped bivalent logic violates the Aristotelian Principle of the Excluded Third or Bivalence Principle. Geach's reassuring statement, quoted above, that this Principle is not at issue is therefore incorrect. The question of truth and falsity does arise, and the lack of a truth value is a third option, not admitted by the Aristotelian principle.

[. . .]

If Strawson's theory of presupposition is to cover not only cases of existential presupposition but all other cases as well, which is certainly what is intended, there are questions to answer. One serious question certainly arises if the other, non-existential presuppositions resist treatment in terms of a truth-value-gap. If for those cases it appears more fruitful to set up, for example, a three-valued logic, with the third value for sentences with presupposition failure, a way will have to be found to escape from the Fregean conclusion that failure of existential presupposition necessarily leads to the lack of a truth value.

### Presupposition and negation in Strawson's analysis: Eubulides' paradox still unsolved. The Bivalence Principle is now seriously at risk

Quite apart from the logical aspects of non-bivalent logics, which must remain undiscussed here, let us consider Strawson's analysis of negation. Natural language negation, in Strawson's view, is presupposition-preserving. That is, if a sentence  $B$  presupposes, and therefore entails,  $A$  (that is,  $B \gg A$  and  $B \vdash A$ ), then  $not-B$  still presupposes, and therefore entails,  $A$  ( $not-B \gg A$ ;  $not-B \vdash A$ ). Thus, let  $B$  be the sentence *You have lost your horns*, which presupposes  $A$ : *You had horns before*, and asserts that the possession of horns by the addressee has come to an end. For Strawson, the negation of  $B$ , *You have not lost your horns*, still presupposes *You had horns before* but asserts that the possession of horns by the addressee has not come to an end: *not* negates only the assertive content of a sentence, but leaves the presuppositional entailment intact.

Since this goes for anything one may have lost or not lost, Strawson can say, with Eubulides, *What you have not lost you still have*. But the minor of Eubulides' Paradox of the Horns runs:

*You have not lost your horns.* If this preserves the same presupposition *You had horns before*, the paradoxical conclusion that the addressee still has horns will hold. In order to undo the paradox it is necessary to accept that the negation in *You have not lost your horns* is not presupposition-preserving. Hence the comment by Kneale and Kneale [. . .], that ‘if a statement involves a presupposition . . . it may be negated either in a restricted way with acceptance of the same assumption or in an unrestricted way without acceptance of that presupposition’. In order to solve the paradox we must accept that the negation in *You have not lost your horns* is of the ‘unrestricted’ kind.

Strawson’s presupposition theory is thus unable to solve the Paradox of the Horns. To solve that it seems necessary to assume a distinction between a ‘restricted’ and an ‘unrestricted’ negation, as proposed by Kneale and Kneale. If that distinction is incorporated into the logic any variety of bivalence, whether strict or gapped, must be given up.

### **Does the definite article induce an existential presupposition?**

Another problem with Strawson’s presupposition theory is the following. If the definite article *the* and the universal quantifier *all* (as is proposed in Strawson 1952: 174–6) carry with them an existential presupposition, then it should not be possible to deny the existence of a supposed entity by using a sentence of the form *The so-and-so does not exist*. Let us agree that there is nothing in this world that corresponds to the *Monster of Loch Ness*. It follows from Strawson’s theory that the sentence *The Monster of Loch Ness exists* not only asserts but also presupposes the existence of that mysterious entity, and must be deemed to lack a truth value because *The monster of Loch Ness exists* is false! Likewise, the sentence *The Monster of Loch Ness does not exist* asserts its non-existence but presupposes its existence, and should suffer from a lack of truth value because it is true! But these sentences are simply false and true, respectively, if the *Monster of Loch Ness* does not exist, and the theory should account for that (see Atlas 1989: 91–119 for a perceptive discussion).<sup>2</sup>

[. . .]

### **6.2.3.2 The projection problem and the entailment analysis**

[. . .]

#### **Karttunen’s treatment of the projection problem**

Around 1970 the Finnish-American linguist Lauri Karttunen drew attention to what has since been called the ‘projection problem’ of presuppositions (see esp. Karttunen 1973, 1974). The problem consists in determining under what conditions, in what form and why a presupposition *P* carried by a carrier sentence *C* is ‘projected’ upwards when *C* is placed under a higher operator.

Some operators are ‘holes’: they preserve the presupposition *P* in an undiminished, fully entailing form. These operators generally preserve entailments, and hence also presuppositional entailments. The factive predicates, such as *know*, *realize*, *have forgotten*, *regrettable*, fall under this category. They induce the presupposition that the embedded *that*-clause is true. But other entailing operators, such as the conjunction *and*, belong to this group of operators as well.

Other operators are ‘filters’. These generally let presuppositions of embedded clauses through but in a weakened form, no longer as full entailments but as more or less strong suggestions, invited inferences, or default assumptions (DAs). For example, a sentence like:

(32) Joe believes that his son lives in Kentucky.

does not entail, but it strongly suggests that Joe has a son. This suggestion can be undone by preceding context, for example when (32) is uttered in a context where it has been established that Joe has no son. In such a case the listener will draw certain conclusions about Joe's mental soundness.

The predicate *believe* is thus a filter. So are *or*, *if*, *not*. The sentence:

(33) Either Joe's son lives in Kentucky or Joe doesn't like travelling

does not entail but does suggest that Joe has a son. Yet the operator *or* does not always let presuppositions of its argument propositions through as DA's. In:

(34) Either Joe's son lives in Kentucky or Joe has no son

no suggestion is left that Joe has a son. Similar phenomena occur with implications, and with *not* (as we shall see in an instant).

A third category of higher operators is called 'plugs': they stop all presuppositions of the embedded clause C, even in the weakened form of a DA. Examples are predicates like *try to convince*, *suggest* or *say*. A sentence like:

(35) Joe says that his son lives in Kentucky

does not even suggest that Joe has a son, since he may spin any yarn he likes.

For about ten or fifteen years the projection problem of presuppositions dominated the literature on presupposition theory. No satisfactory solution, however, was presented. The 'filters', especially, proved resistant to all attempts at getting them under control. Nowadays it is felt that a solution to the projection problem will have to be an integral part of a general discourse-oriented theory of presupposition. Attempts at treating it in isolation have met with failure.

### The entailment analysis of presupposition

Meanwhile, around 1975, an attempt was made to ban presupposition from semantics altogether and relegate it to pragmatics. The main authors were Wilson (1975) and Boër and Lycan (1976).

Taking Strawson's thesis that presuppositions are preserved under negation as their point of departure, they argued that this is not so, since negation is, in Karttunen's terms, a filter: it lets presuppositions through merely as a DA and not as a full entailment. This is shown by the consistency of sequences like:

- (36)a. The King of France is NOT bald. There is no King of France!  
 b. David is NOT divorced. He has never been married!

Admittedly, there is a suggestion or DA that France has a king and that David once entered matrimony, respectively, but these are not entailments.

Since suggestions or default assumptions are not the business of logic, logic has nothing to do with presuppositions and can carry on as before, unperturbed. Logically speaking, presuppositions are just entailments. Whatever is presuppositional is to be accounted for by pragmatics, one way or another. This analysis was dubbed the entailment analysis of presupposition.



[. . .] [A]lthough in most cases the negation word *not* can, apparently, override the DA whereby the presupposition is left intact, there are uses of sentence negation where the presupposition of the non-negated sentence cannot be overridden and is left intact as a full entailment. Consider, for example:

- (37)a. Only Trevor was caught.      » Trevor was caught.  
 b. Not only Trevor was caught.    » Trevor was caught.

The standardly accepted analysis is that (37a) presupposes, and thus entails, that Trevor was caught, and asserts that no-one else was. The normal negation of (37a) is (37b).<sup>3</sup> But (37b) still presupposes, and entails, that Trevor was caught. [. . .]

The same is found when sentence negation is morphologically incorporated (and not standing immediately over an existential quantifier, as in *nobody*, *never*). In such cases, too, presuppositions are preserved. Turkish, for example, normally incorporates negation, and such negations preserve presuppositions:

- (39) !Ben Kemal-in araba-sı-nı al- ma- dı- m.      Kemal-in araba-sı yok  
 I    Kemal's car-his-ACC buy-not-PAST-1sg. Kemal's car-his is-not  
 'I didn't buy Kemal's car. Kemal has no car.'

The presupposition is that Kemal had a car. If he did not have one (39) cannot serve as a corrective answer to the inappropriate question (40), no matter how much emphasis is given to the negation morpheme *-ma-*:

- (40) Sen Kemal-in araba-sı-nı al-dı-n-mı?  
 you Kemal's car-his-ACC buy-PAST-2sg-question particle  
 'Did you buy Kemal's car?'

Turkish has no direct translation of *I did NOT buy Kemal's car: he had no car*. The Horns Paradox, in other words, does not translate into Turkish.

Thirdly, factive clauses and nominalizations in subject position keep their presuppositions:

- (41)a. That Trevor died did not surprise her    » Trevor died.  
 b. Trevor's death did not surprise her        » Trevor died.

The conclusion must, therefore, be that there are natural language sentences where the negation does preserve presuppositions as full entailments, without the presuppositions in question being necessary truths (which are entailed by any sentence). This conclusion is fatal for the entailment analysis, which claims the adequacy of standard logic for the logical analysis of natural language, and it necessitates a revision of standard ideas about the logic of natural language. Such a revision will have to bear on the very foundations of the logical system, as it involves a violation of the age-old Aristotelian Bivalence Principle.

### 6.2.3.3 *The discourse nature of presupposition*

[. . .]

#### **Presupposition is to be defined as a discourse phenomenon**

The defining feature of presupposition seems to be the fact that a sentence  $B_A$  (i.e.  $B$  presupposing  $A$ ) is fit for use only in a discourse that already contains the information carried

by A. A discourse or, more properly, a discourse domain is seen as a cognitive 'working space' for the interpretation of new incoming utterances. The information carried by each new utterance is added to the information already stored in the discourse domain. The technical term for this specific form of 'adding' information to a given discourse domain is *incrementation*. How exactly incrementation is best considered to take place is still very much a question of ongoing investigation: hypotheses and mechanisms are being tried out in various quarters. What counts here is that a sentence  $B_A$  is considered unusable in a discourse not allowing for the incrementation of A.

### **Negation is presupposition-preserving: the Negation Principle**

When a sentence  $B_A$  is fit for a given discourse D, then not- $B_A$  is likewise fit for incrementation in D, where *not* is the normal unmarked sentence negation of natural language and not the highly marked radical negation (see e.g. Seuren 1988) or Horn's (1985) metalinguistic negation. That is, we establish the Negation Principle:

Negation Principle: if  $B \gg A$  then also not-B  $\gg A$

thereby matching the Logical Property just given. When not-B is incremented to D this means that B's papers, so to speak, are in order yet it is rejected because that is how the speaker chooses to tell his story. Given the defining property of presupposition, which says that a sentence  $B_A$  is fit for use only in a discourse that already contains the incrementation of A, and given the Negation Principle, which says that if B presupposes A then so does not-B, it follows that if A is disallowed in the discourse at hand, then both B and not-B must likewise be considered disallowed.

### **Criteria of usability of sentences in a discourse**

As far as can be judged at the present state of the enquiry, there are two possible reasons for the incrementation of a sentence A, or of a sentence B entailing A, to be disallowed in a discourse D, a logical and a cognitive reason. A is blocked for logical reasons if D already contains information entailing the non-truth of A, in which case the incrementation of A would make D inconsistent. A is blocked for cognitive reasons if D fails to represent a recognizable state of affairs that makes functional sense in a given context. [. . .]

In any actual discourse where a sentence B is used, the presuppositions of B thus restrict the 'universe of interpretation' or 'setting' in terms of which B is to be interpreted. In this respect presupposition differs radically from ordinary entailment. For there is no requirement for ordinary entailments to precede their carrier sentences in discourse, whereas for presuppositions there is.

### **Accommodation or post hoc suppletion of presuppositions**

The fact that presuppositions restrict the 'setting' in terms of which their carrier sentences are to be interpreted makes for a hugely important phenomenon in verbal communication. The point is that it is not necessary for A to be explicitly pronounced before B can be uttered. What happens normally is that a sentence  $B_A$  is uttered without A having occurred yet in the discourse. A is then quickly slipped in post hoc, so as to make  $B_A$  interpretable. This process is known as *accommodation* (Lewis 1970) or *post hoc suppletion* (Seuren 1985).

To use an example given in Karttunen (1974), a speaker may say:

(43) We regret that pets are not allowed in the precinct.

He may do so without first having to actually utter the factive presupposition that goes with the verb *regret*, which would have resulted in the stilted:

- (44) Pets are not allowed in the precinct, and we regret that.

*Post hoc* suppletion is extremely common. It is made possible by the fact that presuppositions are systematically retrievable from the sentences that carry them. Although there is as yet no generally accepted analysis of the structural source of presuppositions in their carrier sentences, enough is known to trace them back to so-called presupposition inducers, which are often *lexical verbs*, sometimes expressions like *only* or *even*, and sometimes constructions like clefts or pseudoclefts. This means that anyone with a sufficient command of the language in question will grasp the presuppositions of a sentence on hearing or reading the sentence. If one or more of its presuppositions have not been actually uttered in preceding discourse the competent listener will simply supply them cognitively *post hoc*. This makes it unnecessary for a presupposition to be pronounced in full: owing to the fact that sentences carry presuppositions, a speaker may say things without actually saying them. Not only does this make for an enormous saving of energy in the verbal transmission of information, it also opens the way towards all kinds of communicative and literary devices, ranging from the coarse to the extremely subtle. This, however, is an aspect we must regrettably leave undiscussed in this context.

[. . .]

## Notes

- \* Aristotle was a Macedonian by birth who tutored, and was later favoured by, Alexander the Great.
- \*\* Orestes returns to Argos in disguise to avenge the murder of his father, Agamemnon. His sister, Electra, provides him with hospitality without recognizing him. Under these circumstances, is the sentence *Electra knows that her brother Orestes is in the kitchen* true or false?
- † The thirteenth century Portuguese philosopher, Peter of Spain, and Walter Burley, an English philosopher and logician who straddled the thirteenth and fourteenth centuries, explored the presupposition inducing properties of *only*. Thus, the sentence *Only Pragmatics is interesting* is held to presuppose that Pragmatics is interesting and to assert that nothing is interesting except Pragmatics.
- 1 The expression 'the largest real fraction', for example, has no content because the definite article has a claim to the possibility of pointing at a unique object. . . . If one were to determine, by means of this concept, an object that falls under it, two things would no doubt have to be shown first:
1. that there is an object falling under this concept;
  2. that there is no more than one object falling under it.
- Since the first of these assertions is already false, the expression 'the largest real fraction' makes no sense.
- (Frege 1884: 87-8)
- 2 A solution to this problem is given if it is assumed that the definite article does not induce a presupposition of existence but requires uniqueness of the discourse address to be selected by the definite description at issue. Then real existence does not follow from the word *the* but from the extensional character of the predicate in question with regard to the term in question.
- 3 Note that *Only Trevor was not caught* is not the negation of (37a): it presupposes that Trevor was not caught, and asserts that every-one else was. Curiously, Peter of Spain and Walter Burley deny the validity of (37b), no doubt because they saw trouble ahead.



## POST-READING

- 1 To what extent is each of the following amenable to (a) formalist and (b) ecolinguistic explanation: *existential presupposition, the projection problem, negation and presupposition*? If you are unsure, reread the appropriate part of the text and then try to make your mind up.
- 2 Do you think it makes sense to argue that presupposition is an entailment, either from the formalist position or from the ecolinguistic position?
- 3 'A speaker may say things without actually saying them'. How do you react to Seuren's stating about presupposition what we are accustomed to claiming of implicature?