

Abominable Conjunctions and Gricean Maxims of Conversation

Corine Besson

(forthcoming in the *Lauener Library of Analytical Philosophy*'s volume
in honour of Fred Dretske)

Abstract. On a Dretske-style sensitivity account of knowledge, the Epistemic Closure Principle for knowledge fails. One upshot is that the account has to countenance the truth of so-called 'abominable conjunctions' – conjunctions of the form 'I know that I have hands and I do not know that I am not a handless brain in a vat'. Dretske (2005) claims that the abomination is merely pragmatic, explainable in terms of Gricean Conversation Principles. I argue that no such Gricean explanation is forthcoming.

Introduction

On a Dretske-style sensitivity account of knowledge, a proposition is known only if one's belief in that proposition is sensitive to the facts. On such an account, the Epistemic Closure Principle for knowledge fails: knowledge is not closed under known implication. This means for instance that while you cannot know that you are not in a sceptical scenario, you may enjoy much ordinary knowledge about the external world. The account thus has to countenance the truth of so-called 'abominable conjunctions' (see DeRose 1995) – conjunctions of the form 'I know that I have hands and I do not know that I am not a handless brain in a vat'. These are abominable in that they *look* in some way incoherent. Since Dretske's account entails that they are in fact coherent – they involve no *semantic* incoherence – an explanation of why they do not look so is required.

Dretske has recently (2005) suggested that the abomination is indeed not semantic but *pragmatic*, and that it can be explain in terms of conversational features, more precisely in terms of Gricean Conversation Principles (see Grice 1975).

This paper argues that no such Gricean explanation is forthcoming; if so an explanation of what makes abominable conjunctions seem incoherent is still wanting. One is needed, since the credibility of Dretke's account of knowledge is greatly diminished by such unexplained, seemingly incoherent consequences. In Section I, I outline how abominable conjunctions arise on Dretske's account of knowledge and in Section II I briefly sketch key elements of the Gricean framework. Then in Section

III, I apply this framework to abominable conjunctions and argues that it cannot be used to explain their abominable nature.¹

I. Relevant Alternatives and Abominable Conjunctions

Dretske (1970) offers a ‘relevant alternative’ or ‘sensitive’ account of knowledge, where knowing a proposition requires one to rule out the relevant alternatives incompatible with it:

(RA) To know that P, one has to rule out/be able to rule out *relevant alternatives* Q, R, S, ... which are incompatible with P.

For example, supposing that there is only one item in the fridge, to know that P: there is gruyère in the fridge, you have to rule out the alternatives Q: there is cheddar in the fridge, or R: there is Camembert in the fridge. These alternatives are relevant because Camembert and cheddar form a natural ‘set of contrasts’ (1970: 1022) to gruyère – they are cheeses and thus go in the fridge, and they are incompatible with there being gruyère in the fridge: nothing is both gruyère and cheddar. However, grand pianos, Xerox machines, and cats are not natural contrasts to gruyère: they are neither cheese nor do they go in the fridge. Although there being a grand piano in the fridge is incompatible with there being gruyère, the former is not an alternative relevant to the latter.

If knowing requires ruling out relevant alternatives, only ‘sensitive beliefs’ are known. Thus one knows P only if:

(Sensitivity) If P were not the case (some relevant alternative Q is the case), one would not believe P.

If you know that there is gruyère in the fridge, your belief that there is gruyère in the fridge is sensitive: if there were no gruyère in the fridge (but in fact cheddar), you would not believe that there is.²

(RA) and (Sensitivity) can be used to articulate a solution to scepticism about knowledge of the external world. Consider Dretske’s famous zebra example (1970: 1016). Suppose that you are at the

¹ Dretske is of course not the only philosopher to reject closure, Nozick (1981) is another famous example. Since only Dretske explicitly endorses a Gricean explanation of abominable conjunctions, I only focus on his account.

² I omit here Dretske’s (1971) refinement of his sensitivity account in terms of *conclusive* reasons as nothing will turn on it in the argument that follows.

zoo looking at various cages, you see a zebra, and come to believe that there is a zebra in the cage in front of you simply on the basis of this perception. Now, consider these three propositions:

- (1) This (in the cage) is a zebra.
- (2) This (in the cage) is not a cleverly disguised mule.
- (3) This (in the cage) is a cleverly disguised mule.

Dretske thinks that you know (1). The sceptical scenario (3) is not an alternative relevant to (1), which you would have to rule out to know (1). The presence of a horse in the cage would be such a relevant alternative, since horses are natural contrasts to zebras; but not that of a cleverly disguised mule or a zebra-robot tele-commanded from Mars, etc., which are not natural contrasts to zebras. So while (1) is incompatible with (3), given that (3) is not an alternative relevant to (1), knowing (1) does not require ruling out (3). Notice that (1) entails (2), where (2) is the denial of (3). According to Dretske, (3) is a relevant alternative to (2): the negation of a proposition is a natural contrast to that proposition. Thus, not-P is *eo ipso* a relevant alternative to P and *vice-versa*; but not-P is not *eo ipso* a relevant alternative to things that *imply* P. Knowing P requires ruling out not-P but knowing things that entail P doesn't require ruling out not-P: (3) is a relevant alternative to (2), but not a relevant alternative to (1), even though (1) implies (2).

One upshot is that you know (1) even if you cannot rule out the sceptical scenario (3). You can know ordinary propositions about the external world, even if you do not know that sceptical scenarios do not obtain. This means that the Epistemic Closure Principle for knowledge fails.³ Dretske (2014: 33) states it as follows:

(CPK) If S knows P and S knows P implies Q, then, evidentially speaking, this is sufficient for S to know Q.⁴

Suppose that you know that:

- (1) This (in the cage) is a zebra.

Suppose also that you come to know through reasoning that:

- (4) If this is a zebra, then this is not a cleverly disguised mule.

³ Note that Dretske (1970) rejects all closure principles for many other epistemic operators.

⁴ See Dretske (2005: 26). See Hawthorne (2005) for discussion of different formulations of the Epistemic Closure Principle for knowledge.

While you know (1) and (4), you do not however thereby come to know – it is not, evidentially speaking, sufficient for you to know that:

(2) Thus is not a cleverly disguised mule.

This is because sensitive beliefs, e.g. the belief in (1), are known but insensitive beliefs, e.g. the belief in (2), are not known. Closure is not valid because competent deduction can yield insensitive conclusions from sensitive premises – i.e. unknown conclusions from known premises.⁵ This, in turn, entails the existence of true abominable conjunctions, such as:

(5) I know that this is a zebra and I do not know that this is not a cleverly disguised mule.

Abominable conjunctions are the conjunction of a statement of ordinary knowledge about the external world and of a statement of lack of knowledge that a sceptical scenario does not obtain – where, *prima facie*, not knowing that that sceptical scenario does not obtain *undermines* the knowledge claim in the first conjunct. Such conjunctions are abominable because they do not seem to be the sort of things that should be *true* or *assertable*: they are not straight contradictions but they are in some sense incoherent.

II. Gricean Conversation

Dretske's explanation of the nature of abominable conjunctions is brief but it indicates how it is to be developed:

Why is it ridiculous [t]o say one knows one has hands but doesn't know one isn't a handless brain in a vat? The second conjunct introduces possibilities normally assumed to be irrelevant (not counted as possibilities) by someone who asserts the first conjunct. This is only to say (Grice, 1975) that there are logical abominations (self-contradictory) and conversational abominations (perfectly consistent, and therefore possibly true statements, that violate conventional expectations). (Dretske 2005: 32)

⁵ Dretske (2005: 30ff.) distinguishes between 'heavyweight' and 'lightweight' implications of what one knows: through Closure, you may know the lightweight implications of your knowledge there is a zebra in the cage (e.g. it's not a rhinoceros), but not the heavyweight ones (it's not a cleverly disguised mule).

Thus, abominable conjunctions are pragmatic, conversational abominations that are to be explained in terms of H.P. Grice's 'Logic and Conversation'. To see whether that is the case, let us first rehearse some key elements of Grice's view.

According to Grice, the Cooperative Principle regulates ordinary conversation:

Make your conversational contribution what is required, at the stage at which it occurs, by the accepted purpose or direction of the talk exchange in which you are engaged.

The Principle encapsulates the notion that speakers cooperate to make their conversational exchange successful, by making *appropriate* (e.g. not random, in disorderly, or incoherent) contributions to the goal, topic, nature, tone, or evolution, etc., of the conversation. This Principle is fleshed out in a (possibly non-exhaustive) series of maxims regulating successful conversation (1975:45-46):

Maxims of Quantity

1. Make your contribution as informative as required.
2. Don't make your contribution more informative than is required.

Maxims of Quality: Be truthful

1. Don't say what you believe to be false.
2. Don't say what you lack adequate evidence for.

Maxim of Relation: Be relevant

Maxims of Manner: Be perspicuous

1. Avoid obscurity of expression.
2. Avoid ambiguity.
3. Be brief (avoid unnecessary prolixity).
4. Be orderly.

According to Grice, a cooperative speaker S – someone who wants a successful conversational exchange – follows these Maxims in conversation and thereby also adheres to the Cooperative Principle. We can think of these as presuppositions of the conversation: the conversation proceeds with the implicit assumption that the maxims are being adhered to by its participants.

It can happen that speaker S does not *seem* to cooperate, perhaps because S *violates* some Maxim. If we are in fact in a cooperative scenario, the hearer H will still assume that S is still cooperating. H tries to work out *why* S *said* what they did, which was inappropriate; and *what* S might have *meant*, which would be appropriate; that is, despite S's violation of a Maxim, H reinterprets what S said as making an appropriate contribution to the conversation. This apparent lack of cooperation can thus give rise to 'implicatures': inferences that H draws in the process of working out what S might have meant by what they said. We can think of this process as an application of a charity principle: each cooperating participant does their utmost to ensure that the other participants come out as cooperating, given the goal and topic of the conversation, even in light of countervailing evidence, when it seems that the Cooperative Principle is not respected. Thus suppose that I ask you whether you enjoyed the film (to which I had invited you) and you answer: 'The popcorn was tasty'. You have violated the Maxim of Relation: what you said is not relevant to whether you liked the film. Assuming that you are cooperating, I work out that this is your polite way to say that you did not like the film – by mentioning something else that you liked.⁶

III. Abominable Conjunctions and Gricean Maxim Violation

The Gricean framework can explain abominable conjunctions if, despite their apparent infelicity they can be made to conform to the Cooperative Principle. It is natural to appeal to the violation of one or more Conversational Maxims to explain their abominable character: given the pervasiveness of the abomination, it is natural to look for a systematic explanation in terms of Maxim violation, that works across contexts. We thus expect an explanation of the following form: S utters an abominable conjunction as part of a conversation with a specific goal and topic; they thereby flout a Maxim, which *explains why* there is abomination. H figures out why S said what they said and what they might have *meant* (implicature) so that S comes out as cooperating.

The success of this Gricean explanation of abominable conjunctions rests on two aspects: first, S violates a Maxim; second, H is able to reinterpret what S meant by the abominable conjunction as an

⁶ I do not address here the many refinements and modifications of the Gricean framework, which would lead us to far.

appropriate contribution to the conversation. I now argue that this Gricean explanation fails on both counts.⁷

The first problem is that the second aspect of the Gricean explanation – that H is able to reinterpret what S meant – does not fit the phenomenon of abominable conjunctions. The Gricean model of cooperation works with the idea that once H understands what S really meant, what S initially said should no longer sound inappropriate. For instance, the statement ‘The popcorn was tasty’ should no longer strike me as an inappropriate answer to my question whether you liked the film: I simply interpret it as a negative answer to my question. Abominable conjunctions do not seem to work in the same way, for two reasons: first, they *always* feel incoherent and so unassertible; second, and more importantly, their incoherence does not call for an implicature to recover what was in fact *meant*. Dretske (sincere and cooperating) might say, ‘I know that I have hands and I do not know that I am not a headless brain in a vat’. While the Gricean framework invites us to look for a reinterpretation of what Dretske said, from a Dretskean standpoint no implicature need be derived to recover what Dretske might have meant: Dretske meant what he said. Abominable conjunctions are not in need of reinterpretation, and so this second aspect of the Gricean explanation, in terms of implicatures, does not apply to them.

Consider now the first aspect of the Gricean explanation, which requires us to identify the violation of a Maxim to explain how abominable conjunctions arise. Consider our example (5) again:

(5) I know that this is a zebra and I do not know that this is not a cleverly disguised mule.

Here are the candidate Maxims that a true utterance of (5) could possibly be violating:

- (a) The Maxim of Relation;
- (b) Both Maxims of Quality;
- (c) Both Maxims of Quantity;
- (d) The first two Maxims of Manner.⁸

⁷ John Hawthorne (2005: 44) also expresses doubt about the possibility of a Gricean strategy to handle abominable conjunctions such as (5). But he does not develop his insight into a full-fledged criticism.

⁸ I take it to be obvious that the last two Maxims of Manner are inapplicable here, so I set them aside.

I consider these in turn and show that none can help explain why abominable conjunctions are abominable.⁹

(a). Abominations and the Maxim of Relation

This is the option favoured by Dretske, who says:

The second conjunct introduces possibilities normally assumed to be irrelevant (not counted as possibilities) by someone who asserts the first conjunct. (2005: 32)

For Grice, whether a contribution to a conversation is appropriate crucially depends on its goal (what we are trying to achieve in the exchange) and topic (what the exchange is about). We thus need some context. Consider a conversation in which it would be appropriate to utter ‘I know that this is a zebra’. Suppose that we are at the zoo playing the game where you tell me what you know about the animals you are looking at. The normal expectation is that if you say ‘I know that this is a zebra’, and you follow the Maxim of Relation, what you say next is something that is *conversationally relevant* to the goal and topic of our conversation: you do not change the goal or topic – at least not without some kind of flagging. Suppose then that you immediately add to your previous utterance: ‘and I don’t know that this is not a cleverly disguised mule’. If this is a violation of the Maxim of Relation, this must be because saying ‘and I don’t know that this is not a cleverly disguised mule’ is not a conversationally relevant addition to saying ‘I know that this is a zebra’.

However, this explanation is implausible: *conversationally speaking*, the second conjunct is relevant to the first – you haven’t changed the goal or topic of conversation. If we are at the zoo, aiming to discuss what animals are in the cages or what we know to be in the cages, or what we know about the world of the zoo, etc., it seems that by asserting the second conjunct you have asserted something that is relevant to the first. Consider a different context, where we are discussing Dretske’s views on closure, or the topic of relevant alternatives. In this context too, the second conjunct would be

⁹ I do not consider variants of (5) to assess whether they would be any less abominable: one could consider the effect of replacing ‘and’ by ‘but’, or of having two consecutive sentences rather than a conjunction, or of working with third-person ascriptions rather than first-person ones, or of inverting the two conjuncts. One could also consider whether the oddity remains if we use different epistemic operators from ‘know’, or consider conjunctions that are odd but do not involve skepticism. Although doing all of this would certainly be illuminating, the key brief is to account for the abominable character of (5) in its current dress. My claim that the Gricean strategy fails is confined to such cases as (5), and that this gives ground enough for pessimism.

conversationally relevant to the first. It thus seems that ‘conventional expectations’ are not violated by uttering the second conjunct, and yet there is abomination.

Dretske and Grice manifestly use ‘relevant’ in different ways, and that is the heart of the problem. On Grice’s account, the second conjunct is *relevant conversationally* to the first, where that is cashed out in terms of conversational goal and topic. On Dretske’s account, the second conjunct is not *relevant epistemologically* to the first, where that is cashed out in terms of relevant alternatives and natural sets of contrasts: given that (3) is not an alternative relevant to (1), you do not have to know (3) is not the case to know (1). But epistemological irrelevance cannot simply be cashed out as conversational irrelevance. They are different phenomena, explained differently. A violation of the Maxim of Relation is thus not suited to explain the abominable character of abominable conjunctions.

At this point, we could imagine much more *recherché* goals/topics for our conversation: where we aim to talk about what’s at the zoo using only (positive) assertions of knowledge or not using negation or with no reference to mules, or with no allowed Dretske-style second conjuncts. We can thus stipulate very fine-grained ways of characterising relevance in a given conversational context that are such that, almost by definition, abominable conjunctions involve conversational irrelevance. However, first, these stipulations do not clearly generate conversational irrelevances: they entail that certain things should not be mentioned, or are banned from the conversation, but that is different from entailing that these would not be relevant. Second, these *recherché* contexts would not explain the pervasiveness of the abomination across contexts, which is just a fact of abominable conjunctions. Finally, these contexts do not capture the idea of ‘normal’ conversational expectations, which is what Dretske is after.

(b). Abominations and the Maxims of Quality

Appealing to the Maxims of Quality is tempting, especially the second one, because it has an epistemological flavour. The problem is that, given Dretske’s account, neither Maxim is flouted in asserting an abominable conjunction: both conjuncts in (5) are true and both are supported by adequate evidence – they are entailed by his account of knowledge. So the abomination cannot be explained in this way.

Of course, in our zoo exchange, upon hearing your second conjunct, I might take a Maxim of Quality to have been violated (or behave as such). Concerning the first one, I might think you have said

something that you believe to be false when you asserted the first conjunct: in light of claiming not to know that this is not a cleverly disguised mule, you cannot also believe you know that this is a zebra. Concerning the second Maxim of Quality, I might think that when you asserted your first conjunct, you said something for which you lacked adequate evidence: in light of claiming not to know that this is not a cleverly disguised mule, you cannot take yourself to have adequate evidence for knowing that this is a zebra. However, the fact remains that, if you are Dretske, the abomination cannot be traced back to a violation of the Maxims of Quality: if you are Dretske, you take yourself to *know* that (5) is true, and can assert it as sincerely as anything else.

(c). Abominations and the Maxims of Quantity

Here too, by Dretske's lights, none of the Maxims of Quality is flouted when you assert an abominable conjunction: in uttering (5), a speaker is portraying the situation exactly as it is from an epistemological standpoint, with respect to their knowledge of what is in the cage. So it cannot be that either of these maxims is flouted and so the abomination cannot be explained in this way.

Consider the zoo context again. You assert: 'I know that this is a zebra'. Your contribution is adequately informative and I take it to be so. Then your utter: 'and I do not know that this is not a cleverly disguised mule'. I am puzzled. If I appeal to a violation of the Maxims of Quantity, it must be because you have either said too much or not enough. But it is hard to see why that would be. For instance, it is hard to see why saying 'and I do not know that that this is not a cleverly disguised mule' would be adding too much information. Perhaps this could be so if we had stipulated that you are not allowed to talk about things that you do not know. But then 'I know that that this is a zebra' but I do not know what the animal next to it is' should present us with the same kind of abomination, and this is not the case. Thus, again the Maxim of Quality cannot be appealed to in order to explain the abomination.

(d). Abominations and the first two Maxims of Manner

In our zoo exchange, for you to have flouted one of the first two Maxims of Manner in uttering (5), you would have had either to use an ambiguous word or express yourself in an unclear way, perhaps using unfamiliar words or familiar words in an unfamiliar or unobvious way.

Consider the first Maxim of Manner. The only plausible way (5) could be to be unclear would concern some kind of unclarity in the use of 'know'. But for Dretske it is not the case that 'know' is used in

an unclear way or differently in the two conjuncts. There is nothing that is obscured in the way the verb occurs in (5). Consider the second Maxim of Manner. The only plausible candidate for ambiguity would be the word ‘know’. But on Dretske’s view, ‘know’ is not ambiguous, and it is used with the same meaning in both conjuncts.¹⁰ So neither Maxim of Manner is violated.

IV. The Failure of the Gricean Explanation

To explain the abominable character of abominable conjunctions in Gricean conversational terms, I have considered avenues (a), (b), (c) and (d). None of these can help explain the phenomenon and no other Gricean Maxim could plausibly be appealed to here. I therefore conclude that abominable conjunctions cannot be explained in terms of the Gricean framework of Maxim violations and implicatures. In particular, Dretske’s favoured choice of explanation, in terms of a violation of the Maxim of Relation, is inadequate as his is an the Gricean notion of relevance work in completely different ways.

Thus as far as the Gricean framework goes, the abominations are left unexplained. There might be other ways of giving a pragmatic explanation of the abominable conjunctions: perhaps alongside so-called ‘Moorean Paradoxes’ (see Moore 1942), provided that these are not in turn given an explanation in Gricean terms, as they sometimes are (and by Grice himself). But as things stand, abominable conjunctions are still waiting for a pragmatic explanation, indeed for any explanation, of their natures. The Dretske-style sensitivity account of knowledge badly needs one if it is to be credible. In the absence of such a pragmatic explanation, one might naturally be inclined to think that the problem is not pragmatic but semantic, and that either such conjunctions are not in fact true or that they involve some kind of semantic ambiguity (presumably in the word ‘know’).¹¹ Both would be anathema to the account.¹²

¹⁰ Dretske makes this very clear in his criticism of contextualism in his (2005).

¹¹ The latter would of course lead to a kind of contextualism. See De Rose (1995).

¹² I am extremely grateful to the Lauener Foundation for awarding me a prize on the same day as Fred Dretske, at the Lauener Awards Ceremony in Bern on June 26, 2014 – I could not have dreamt of better company. I was sad not to be able to meet Fred Dretske, but also was very pleased to meet many members of his family as well as some of his friends. I am also grateful to the audience at Lauener Symposium in Honour of Fred Dretske held at the University of Bern on June 27, 2014, especially to Quassim Cassam, Martha Gibson and Dennis Stampe. I would also like to thank the audiences at the Mind, World and Action Summer Course 2014, IUC, Dubrovnik, at the University of Sussex Philosophy Society, and at the Birkbeck College’s 2015 Cumberland Lodge Study Weekend, where I was honoured to be invited to give the keynote address. Many thanks also to Andrew Hudson and Ofra Magidor for helpful comments on the penultimate draft of this paper.

References

- DeRose, Keith. (1995). 'Solving the Skeptical Problem', *Philosophical Review* 104: 1-52.
- Dretske, Fred. (2005). 'Is Knowledge Closed Under Known Entailment? The Case Against Closure', in Matthias Steup & Ernest Sosa (eds), *Contemporary Debates in Epistemology*, Oxford: Blackwell 13-26.
- (1971). 'Conclusive Reasons', *Australasian Journal of Philosophy*, 49 (1): 1-22.
- (1970). Epistemic Operators, *Journal of Philosophy* 67 (24):1007-1023.
- Grice, H. Paul Grice. (1978). 'Further Notes on Logic and Conversation', in *Syntax and Semantics: Pragmatics*, v 9, P. Cole (ed.), New York: Academic Press, 183–97. Reprinted in 1989, *Studies in the Way of Words*, Cambridge MA: Harvard University Press.
- (1975). 'Logic and Conversation', in *The Logic of Grammar*, D. Davidson and G. Harman (eds), Encino, CA: Dickenson, 64–75. Reprinted in 1989, *Studies in the Way of Words*, Cambridge MA: Harvard University Press.
- Hawthorne, John (2005). 'Is Knowledge Closed Under Known Entailment? The case for Closure', in Matthias Steup & Ernest Sosa (eds), *Contemporary Debates in Epistemology*, Oxford: Blackwell: 26-42.
- Moore, G. E. (1942). 'A reply to my critics', in P.A. Schlipp (ed.), *The Philosophy of G. E. Moore*, Evanston, IL: Northwestern University: 535-677.
- Nozick, Robert. (1981). *Philosophical Explanations*, Cambridge, MA: Harvard University Press.
- Steup, M. and Sosa, E. (eds). (2005). *Contemporary Debates in Epistemology*, Malden, MA: Blackwell.