

*Forthcoming in Analysis*

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### Knowledge-To-Fact Arguments Can Deliver Knowledge

*Abstract.* In a recent paper, Murali Ramachandran endorses a principle that he thinks can help us solve the surprise test puzzle and cause problems for a Williamsonian argument against KK principles. But in this paper I argue that his principle is false and as a result it cannot do either.

*Keywords.* Bootstrapping; Surprise Test Puzzle; KK Principles

In a recent paper, Murali Ramachandran endorses a principle that he thinks can help us solve the surprise test puzzle and cause problems for a Williamsonian argument against KK principles. But in this paper I argue that his principle is false and as a result it cannot do either.

Ramachandran motivates his principle by examples and by theoretical considerations. One of his examples involves someone coming to have the belief that it is around 4pm by looking at their watch, and then running through the following argument:

Premiss 1: I know that it is around 4 pm.

Premiss 2: I know that it is around 4 pm only if my watch is reliable.

Premiss 3: If my watch is reliable, I will not miss my interview tomorrow.

Conclusion: Hence, I will not miss my interview tomorrow. (Ramachandran 2016: 143).

Ramachandran thinks there is something amiss about the reasoning in this example; it seems to him that one cannot come to know one will miss one's interview tomorrow in this way (Ramachandran 2016: 143). I will grant this for the sake of argument.

He then generalises from this and other related examples. First he defines a *knowledge-to-fact (KF) argument for S* as a valid argument of the form:

$$K_S(P), P_1, \dots, P_n \models Q$$

where  $K_S(P)$  stands for 'S knows that P', Q is a proposition that does not involve knowledge, and where Q does not follow from simply P and  $P_1 - P_n$  (Ramachandran 2016: 144). He then hypothesises the following about KF arguments for S:

Ramachandran's Principle: No subject S can use a KF argument for S to acquire knowledge of the argument's conclusion. (Ramachandran 2016: 144).

Ramachandran argues that his principle can solve the surprise test puzzle and refute a Williamsonian argument against KK principles.

In brief, the surprise test puzzle arises because from an announcement that there will be a coming exam and an announcement that it will be a surprise, a student appears to have a sound argument available for the conclusion that she cannot be set the exam at all (Ramachandran 2016: 146–7). As Ramachandran points out, for the first stage of the student’s argument to be sound, three things must happen: first, she must gain knowledge that she knows there will be an exam, second, she must gain knowledge that the exam will be a surprise, and third, she must use these two pieces of knowledge to deduce, and thereby come to know, a conclusion about a certain matter of fact — in particular that there won’t be a Friday exam. As Ramachandran points out, if his principle is right, then the student will not gain knowledge via this deduction, seeing as the argument she invokes will be a KF argument for her.

In addition, Ramachandran’s principle allows him to offer a critique of a reductio argument that Timothy Williamson has offered against KK principles. (KK principles say that if one knows some proposition, one is in a position to know that one knows it.) The argument describes a character, Mr. Magoo, who is looking out his window at a tree that is 666 inches tall. Through seeing it, he knows that he knows it is not 0 inches tall. As Ramachandran presents the argument, Magoo then proceeds on a long string of deductions, a set of deductions that requires

various principles, including a KK principle, and which ultimately yields the false conclusion that the tree is not 666 inches tall.<sup>1</sup> As Ramachandran points out, if his principle is right, then Mr. Magoo will not gain knowledge via this deduction, seeing as Magoo's argument will be a KF argument for him, and thus Williamson's reductio argument against KK principles will fail.

Unfortunately, Ramachandran's Principle is false; here's a counter-example:

TRUST. A friend, Ron, tells me that his middle name is Ulysses. I am talking with a friend of Ron's, Leslie, and mention that I know that Ron's middle name is Ulysses. Leslie, surprised, says 'If you know that Ron's middle name is Ulysses, he must think of you as a close friend; Ron is very cautious about giving out personal information.' I then reason as follows: I know that Ron's middle name is Ulysses; if I know that, Ron thinks of me as a close friend, so Ron thinks of me as a close friend. Via this argument, I come to know that Ron thinks of me as a close friend.

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<sup>1</sup> Technically speaking, Timothy Williamson's original argument did not require Mr. Magoo to deduce that the tree is not 666 inches tall but rather to deduce that he knows the tree is not 666 inches tall. This means that in Williamson's original argument, Magoo was not deducing some matter of fact (Williamson 2000: 116). This perhaps causes some additional problems for Ramachandran's criticism of Williamson besides those that I present in the main text of this paper, seeing as it seems to follow that Mr. Magoo's deduction does not count as a KF argument and thus that Ramachandran's Principle does not apply to it.

This forms a counterexample to Ramachandran's Principle; I come to know, via a knowledge-to-fact argument for me, that Ron thinks of me as a close friend. So it appears as if Ramachandran overgeneralised from his examples.

I mentioned that Ramachandran also offers a theoretical motivation for his principle. The motivation is multi-step, with the first step running as follows:

First: it seems evident that one can justify or support a proposition  $P$  by way of supporting or establishing the truth of one of its known truth-conditions  $C(P)$ , but not vice versa, on pain of question-begging. One must already take  $C(P)$  to be true when one affirms  $P$ ; so, when one argues from  $P$  to  $C(P)$ , one is in effect arguing from  $C(P)$  to  $C(P)$ . (Ramachandran 2016: 144).

Let me give an example to illustrate what I think Ramachandran perhaps has in mind. Suppose that the following are the truth-conditions of  $ET$ 's being an equilateral triangle: (i)  $ET$  is a triangle and (ii) all of  $ET$ 's sides are of equal length. If these are indeed the correct truth conditions, then one procedure for determining whether  $ET$  is an equilateral triangle is to determine whether  $ET$  is a triangle and to determine whether all  $E$ 's sides are of equal length. Suppose that you determine that these two conditions are met and thereby come to know that  $ET$

is an equilateral triangle. It doesn't appear that you can deduce and thereby come to know that all of ET's sides are of equal length; this was something you have already determined in determining whether ET was an equilateral triangle in the first place.

If this is indeed what Ramachandran has in mind, his theoretical motivation is problematic. Let us keep the same truth conditions on knowledge of ET's being an equilateral triangle but consider a different procedure for coming to know that ET is an equilateral triangle. Suppose that Steven determines that ET is an equilateral triangle as follows: he first determines that ET is a triangle and then, instead of checking that ET has equal sides, he instead checks that ET has equal angles. This is a new and different way to discover that ET is an equilateral triangle. Once he has discovered that ET is an equilateral triangle in this way, then there is no problem with his deducing, and thereby coming to know, that ET has equal sides.

More generally, the problem seems to be that Ramachandran is failing to distinguish metaphysical dependence from epistemic dependence. *Metaphysical dependence*, as its name suggests, concerns ways in which objects, properties, and events depend on, or are grounded in, other objects, properties, and events. A proposition's being true is metaphysically dependent on its truth conditions obtaining. Meanwhile, *epistemic dependence* concerns ways in which someone's knowing some proposition depends on, or is grounded in, their having knowledge, warrant, entitlements, justification, etc, regarding other propositions. So, for example, if I come

to have knowledge as the result of a deduction, my knowledge of the conclusion is epistemically dependent on my knowledge of the premises.

A fact to note about epistemic dependence: it is possible for my knowledge of some proposition to epistemically depend on my epistemic relations to a certain set of propositions and your knowledge of the same proposition to epistemically depend on epistemic relations to a different set of propositions. For instance, I can know that something in the oven is burning because I can see that smoke is escaping, while you can know that something in the oven is burning because you can smell that it is.

As the example involving equilateral triangles brings out, metaphysical and epistemic dependence can come apart. For instance, ET's being an equilateral triangle is metaphysically dependent on ET's sides being equal, but Steven's knowledge that ET's sides are equal is epistemically dependent on his knowing that ET is an equilateral triangle. To take another example, a ring's being gold is metaphysically dependent on its having a certain chemical structure, but my knowledge that it has this structure can be epistemically dependent on my knowledge that it is gold. In other words, I can come to know that it has such and such chemical structure by knowing that it is gold, even though what makes it gold is its chemical structure.

In short, while the truth of a proposition, P, may metaphysically depend on its truth-conditions C(P), my knowledge of the proposition need not epistemically depend on my

knowledge of its truth-conditions. And if it doesn't, Ramachandran hasn't offered us a principled reason for thinking that I cannot use my knowledge of some proposition to deduce and thereby come to know propositions regarding its truth-conditions. So Ramachandran's theoretical motivation fails at its very first step.

That said, for all I have said, the following modified principle may well be true:

Modified Ramachandran's Principle: No subject S can use a KF argument for S to acquire knowledge of the argument's conclusion *in cases in which S's belief in some or all of the premises of the KF argument epistemically depends on S's belief in the conclusion of the argument.*

As we have seen, Ramachandran's Principle is false; he overgeneralized from his examples and his theoretical motivation for his principle fails. As a result, he cannot use his principle to solve the surprise test puzzle or refute a Williamsonian argument against KK principles. One might wonder: what about Modified Ramachandran's Principle? Will it aid him in these tasks? The answer is no.

First, regarding the surprise test puzzle, so long as the student's belief that she knows there will be a coming exam does not epistemically depend on her belief that she won't have an



exam on Friday, the modified version of Ramachandran's Principle will not deliver the result that the student fails to know the proposition she deduces. And Ramachandran has given us no reason to think that the student's belief that she knows that there will be a coming exam depends in any way on her belief that there will not be an exam on Friday. Rather, she believes that she knows there will be a coming exam through hearing an announcement that she has a coming exam.

Similar things hold regarding Ramachandran's critique of the Williamsonian argument against KK principles. So long as Mr. Magoo's belief that he knows the tree is not 0 inches tall does not epistemically depend upon the belief that the tree is not 666 inches tall, the modified version of Ramachandran's Principle will not deliver the result that Mr. Magoo fails to know the conclusion he deduces. And Ramachandran has given us no reason to think Mr. Magoo's belief that he knows the tree is not 0 inches tall depends on the belief that the tree is not 666 inches tall. Presumably Mr. Magoo's belief that he knows the tree is not 0 inches tall depends on his visual evidence; he can easily see the tree and this is why he believes that he knows that it is not 0 inches tall.<sup>2</sup>

## References

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