

A truly ontological argument

Kant gave an a priori argument for God's existence the title "ontological." This was a misnomer. A truly ontological argument for God's existence would infer God's existence to answer an ontological question by a form of argument common in ontology. I now offer such an argument. I understand by "God" someone necessarily existent who is necessarily omniscient, omnipotent, morally perfect and the creator and sustainer of every other concrete thing. I argue that such a being plays a role in an ontological theory we have reason to think true. My argument does not guarantee that only one being plays this role: as far as what I argue goes, many could share the role. But we ought to prefer simpler theories to more complex ones. So we should think that just one being plays the role I describe unless there is positive reason to think the role shared. There are no such reasons.¹

Ontological explanation

Much natural theology deals in causal explanation, e.g. of the universe's existence and hospitality to intelligent life. Ontology deals in a different sort of explanation. It does not say why things are as they are. It instead tries to clarify how things are. It explains by telling us what sorts of thing make certain broad classes of truths true. Mathematicians do set theory, but what are sets? If there are no sets, what makes set-theoretic statements true? It is possible that Blair win a fifth term in office. Such truths, we're told, concern possible worlds, complete histories the universe might have. But are there really such things as possible worlds? If so, what are they? If not, what makes possibility-claims true? Ontological explanations answer such questions. And they needn't be put in terms of truthmakers. Ontology can instead explain what things bear the attribute of possibility and in what it consists for something to be possible, or what set-talk is really about, or in what it consists for a set to exist. That said, I continue for convenience to speak of truthmakers.

One rule many cite in ontology is Ockham's Razor: posit no entity unless you must.² But an entity necessary in no one place can be useful in many. It's short-sighted to assess ontological economy only with reference to single philosophical problems. It's wiser to think globally. Suppose one shows that one entity can provide many ontological explanations, replacing many other sorts of entity as truthmakers, even though one needn't make the replacement in any one case. Then one has shown that we get an overall economy by making an initial investment. If we can eliminate many sorts of being by positing one sort, that's a good buy.

Global economy arguments can persuade even if the sort of entity they commend is strange. Sets are strange. They are some sort of collection, but no ordinary sort. For sets come in strange varieties. The null set is a collection that doesn't collect anything. If I own one painting, I do not have enough to have an art collection, but for every painting there is a unit set, a one-member collection containing just it. Again, there is nothing to a set but its members. But even if the members are concrete, on the usual account, their set is abstract. Though the paintings are in spacetime, it's often said that the set is not. While I can show you my art collection, I can't show you the set of my paintings. The paintings are parts of the art collection, but members aren't parts of sets- and it's unclear just what their relation to their sets is.

Despite all this (and more besides), most philosophers believe in sets. One main reason is their role in mathematical ontology. To Frege and many Platonists, numbers were sui generis abstract particulars. When the view became popular that mathematics in some way "reduces" to set theory, it became popular to eliminate such abstract particulars in favor of sets. Some simply identified numbers with certain sets. It's now more popular to treat mathematics as a study of structures sets instantiate, with such natures as "numbers" have only as determinate as the structures make them. Either way, given sets, one needn't believe in Frege-style numbers, and yet mathematics has a real subject-matter. Now one might try to move from set theory's mathematical role to realism about sets by way of arguments for scientific realism (if mathematics is a science) or the indispensability of mathematical truth to science. But the most the first yields is that we must be realistic about set theory or mathematics, not about any particular proposed ontology for them. And the most the other yields is that there must be some ontology beneath set theory or mathematics sufficient to undergird their truth. It must be argued on other grounds that the ontology involves sets. Global economy is chief among these.³ Sets have applications in modal ontology. Possibilist ontologies of modality include possibilia- merely possible objects that exist (Lewis) or subsist (Meinong).⁴ Possibilists can use sets to explicate the nature of possibilia.⁵ Actualist modal ontologies include only actual, existing objects. Actualists have used sets to explain the nature of possible worlds.⁶ Again, attributes have been treated as sets.⁷ Many philosophers have believed in sets because by positing them, one could (they thought) eliminate numbers, possibilia, possible worlds, universals and/or other sui generis sorts of thing in favor of a single sort of entity. Sets' global economy outweighs their strangeness.

An economy-claim of this sort requires either that there are independent reasons to believe in sets or that sets take over at least two other kinds' roles. If we eliminate Frege-numbers in favor of sets, then for every number, there must be a corresponding set (else the reduction fails). So if we have no independent reason to believe in sets, it appears that we are merely switching entities one for one, and after we make the move, we have as many particulars and kinds as we had before. If we do have independent reason to believe in sets, it appears that we are eliminating numbers in favor of something that exists anyway, and so reducing our overall ontology. Thus absent independent reason to believe in sets, the set ontologist can claim economy only if sets do numbers' ontological work and also the work of some other kind that does not "reduce" to numbers, leaving us with fewer individuals and kinds than we had before.⁸

To matter here, the kind-economy must be in the higher-level kinds significant to ontology-ontological categories, however hard it is to explicate this notion. Someone who proposes to get by with fewer biological species is not offering an ontological explanation. Again, intuitively, economy in higher-level kinds matters more than economy at lower levels. For dropping a higher-level kind entails dropping its sub-kinds, and perhaps dropping more individuals. One sometimes meets the view that in measuring ontological economy, only economy in kinds matters.⁹ But consider two highest-level kinds without sub-kinds, one with three members and one with \aleph_0 . Surely an ontology that parses the latter away is more economical than one otherwise identical which instead parses away the former. The reason it is economical to do without sets, if we can, is not just that we thereby lose a highest-level kind and all its sub-kinds, but also that we thereby do without all the sets.

Why shave?

My argument will be that the Razor favors a theist modal ontology. So it raises the question of why we should think the Razor a way to find true philosophical beliefs. A first response is simply that we do have powerful intuitions that it is, and we are entitled to respect them absent argument that it is not.¹⁰ Again, we believe that physical science has been successful in finding or approximating to true theories.¹¹ There is good evidence that opting for theories with various sorts of parsimony has played a role in this success.¹² Ontology and physical science differ in many ways, but to the extent that a method that leads toward truth in one field transfers to another field, it is reasonable to expect it to be truth-conducive in the second field too, unless the second field has

specific features that render this unlikely. But there is nothing about ontology to lead us to expect that seeking parsimony is unlikely to be truth-conducive in it.

Again, scope is a virtue in explanations. If candidate explanations E and E* explain a certain fact equally well, but E is also a good explanation for some further fact, that is reason to believe E. This virtue is epistemic. An explanation is supported by what it explains; that it well-explains these facts becomes evidence for its being a true explanation.¹³ So the more an explanation explains, and the better it explains it, the more evidence there is for its truth, ceteris paribus. Better-supported explanations are more likely true. It is relevant that scope is a virtue because sparser ontologies may offer ontological explanations of greater scope. One kind of explanandum in the debate over universals is of the form

R. there are particulars a and b, and a and b resemble one another in being F.

According to the resemblance nominalist, the particulars themselves make (R) true.¹⁴ Realists let a and b make (R)'s first conjunct true, but have as truthmaker for the second in some cases a and b's sharing a universal, Fhood. So if the nominalist ontological explanation works, it has greater scope than either explanation the realist offers: it explains both conjuncts, not just one.¹⁵

In addition, if the nominalist explanation works, its scope undercuts the realist's justification for positing universals. For if a and b themselves fully explain (R)- that is, suffice to make (R) true- that a and b share a universal can't add explanatory force. It can only overdetermine (R)'s truth. Now there can be reason to believe in overdetermination. If it takes 10 volts to light a bulb, it can happen that two streams of 10-volt current reach the bulb at once and the bulb lights. In such cases, we see independently that the overdetermining factors are present and appear to contribute to an explanandum. But where we already have a full explanation and have no independent reason to believe that overdetermination is present, we have no reason to posit it: there is nothing left to be explained, and overdetermination does not yield a better explanation. If all evidence for an entity rests on what it would explain, and it neither explains what was not explained previously nor improves an explanation of what was explained previously, there is no evidence for its existence. And making posits without evidence is no more truth-conducive than guessing about what exists. It is likely that beliefs without backing turn out false. So if we avoid them, we are more likely to wind up with a higher proportion of true beliefs overall. Without Razoring, we would have had certain likely-true ontological beliefs and certain likely-false ones. The Razor removes some likely-false ones, and counsels us against replacing them with other likely-false ones. As a result, it's likely that

likely-true beliefs comprise a larger portion of our ontological beliefs, and so it's likely that true beliefs do. So we now see another reason following the Razor is conducive to having a greater proportion of true philosophical beliefs: the Razor counsels us to avoid posits without evidence. Sparser ontologies, then, are more likely true at least to the extent that they offer wider-scope explanations.

Cost/benefit

If an ontology can't claim a straightforward edge in economy, there can still be cost/benefit arguments for it, for there are more sorts of epistemic cost than being uneconomical. Positing intuitively strange sorts of entity is an epistemic cost, for the more intuitively strange a sort of entity, the more positing it flouts intuitions that there just can't be that sort of thing. Such intuitions are good reasons not to make the posit. Good reasons against a view add to the justificatory burden it must meet; ceteris paribus they should lower our credence in it. True, not everyone finds the same things strange: but the fact that others of equal intelligence, rationality etc. have intuitions that items are too strange to bear arguably constitutes a problem even for those who do not share them. Again, an entity's strangeness consists in its being unlike things we already recognize. The less like items we already recognize a new posit is, the more it faces an inductively-based objection against its existence.

If two ontological explanations have equal scope, but one sort of entity provides an explanation in some cases only less naturally, that too is an epistemic cost, on the reasonable assumption that apparently more strained accounts are less likely true. Finally, if two explanations are equal in scope and equally natural, but all the same one is better in some other way, accepting the lesser explanation is an epistemic cost if the respect of superiority is relevant to likelihood of truth. If one's view incurs fewer such costs than others, then ceteris paribus one's view is more likely true. If one's cost equals others' but one "buys" a greater scope of explanation with it, then again one's view is more likely true if greater scope brings greater likelihood of truth, as suggested above.

A truly ontological argument for God's existence applies the strategies above. It tries to show that God can provide a variety of ontological explanations, and so let us dispense with less globally relevant rivals. Where it contends with a rival of equal scope, it tries to show that God has this scope more naturally, or that theist explanations surpass their rivals in some other way. Plainly this is a larger project than one paper can complete, since to do it fully must involve global comparisons over a range of ontological issues between theist ontologies and their many rivals (including such

no-ontology rivals as fictionalism and conventionalism, in some cases). Still, I present a bit of the project here, and perhaps a bit can recommend the project as a whole.

Some assumptions

I've shown elsewhere that theism can provide a theory of attributes whose sole posit is God.¹⁶ The view substitutes divine concepts (or relations to them¹⁷) for attributes, rather as Augustine did with Plato's Forms, then gets rid of the concepts. In a companion paper I begin a case for this theory.¹⁸ This could be enough for a global-economy argument for God, for given attributes, we get a great deal else. One can treat attributes of a special sort as possible worlds.¹⁹ Attributes can also replace sets, as Russell intimated and George Bealer has shown.²⁰ So a God who provides a theory of attributes can do any ontological work numbers, sets and possible worlds do, and more besides. However, I here provide an account of what theism can do in modality which does not go via a theist theory of attributes. I assume only that the theory of attributes is available. Christopher Menzel has shown that theists can replace sets with divine mental acts of collecting-together.²¹ Here I assume that this elimination too is available to theists.

I now offer a theory of what makes absolute or "metaphysical" modal truths true in which God plays the chief role, and contend that it has advantages over against rival theories dealing in possible worlds. "God" occurs referentially in my theory. Things to which terms in a true theory refer exist. So if I give reason to think this theory true, I give reason to think that God exists. The reason I give is one mostly of global economy.

The metaphysics

The first step in a modal metaphysic is to provide a semantics and associated metaphysics for the modal operators. Most now take the semantics in terms of quantifiers over a domain of objects, the possible worlds. I propose to quantify over a different domain.

Consider, first, what I call creature-only propositions. These are roughly propositions that on their own, on the surface, provide no information about God. They are not about God, His acts or His distinctive attributes. They imply necessary truths about these only because the truths implied are necessary²² or they themselves are impossible.²³ If existentially quantified, God, His acts or His distinctive attributes are not among their truthmakers. If universally quantified, they still don't count as "about" God, His acts, etc., though strictly speaking God etc. provide true substitution-instances of them (e.g. $(x)(x \text{ is a tiger} \supset x \text{ is a mammal})$). This is enough description to be getting

on with; I provide a careful development elsewhere.²⁴ I also suggest there that truths of logic and mathematics are not creature-only.

We might consider eight sorts of creature-only proposition, contingent and necessary claims about

- a. contingent non-divine concreta,
- b. contingent abstracta,
- c. necessary non-divine concreta and
- d. necessary abstracta.

But I begin with a promissory note about (c) and (d): a theist ontology can eliminate all non-divine necessary entities. So we need worry only about (a) and (b).

I say that necessary truths about (a) depend on God's activity. On the theory of attributes I've alluded to, Socrates' essence is a divine mental state, or else a relation to it. I argue elsewhere that God causes Himself to be in this state. He thinks up Socrates' essence.²⁵ Socrates and humanity are divine inventions, and by inventing them, God causes it to be true that Socrates is essentially human. God can't acquire creature-concepts empirically, since there are no creatures till He creates them, and He can create only what He first conceives. And if it is implausible that I was naturally endowed with an understanding of what Socrates would be like, why would it be less so in God's case? Granted, if God did not understand all this innately, He must have had a powerful imagination to frame it. But creativity is a perfection, and God is a perfect being. God could not invent all this if there were possible worlds independent of His activity. If there were, humanity and perhaps Socrates would be given in the realm of worlds before He starts thinking, and God would know this, being omniscient. So if God truly invents humanity and Socrates, there are no possible worlds containing them before He does so. My view eliminates worlds in favor of divine states and mental events, such as God's thinking up humanity.

In inventing Socrates' essence, God determines that necessarily, Socrates is human. Perhaps there are also absolute necessities about (a) not contained or determined by their essences.²⁶ If so, God establishes these by preventing and being disposed to prevent their contradictories. Having thought creaturely states of affairs up, God prevents some: simply setting His will against them guarantees that they don't occur, because God can't slip up or act ineffectively. If a cause prevents state of affairs S as of t, a restricted necessity-operator applies: at t it is causally necessary that S not occur. If as of t S is permanently thus prevented, this is ever after causally necessary. But in some

cases of prevention, a stronger necessity-operator also applies. Suppose that God is such by nature as to exist necessarily if He exists, and also to prevent there being evils whose permission He cannot morally justify. Then God's nature dictates His preventing these no matter what, and this establishes an absolute necessity, that there be none.²⁷ And so there is an absolute necessity about Socrates that may not be determined by His essence, that He does not co-exist with such evils.

Where God does not prevent, He causally permits to obtain. God can prevent it that Boots the cat exists, has stripes, etc. For as God is necessarily creator and sustainer of everything else, no contingent concrete thing can come to exist or have any attribute without His support. So if God wants to keep Boots from existing or being striped, He has the opportunity, knowledge and power to do so, for He can simply never create her. If God has the opportunity to prevent a state of affairs, and sufficient power and knowledge to do so, knows all this, and decides whether to do so, the state of affairs obtains only if God deliberately does not prevent its doing so. By not doing so, God issues a distinctively causal sort of permission for it to obtain: He does not do what it is in His power to do, and so lets it happen.

Some states of affairs God thinks up are not such as to come about without cause. So these will be absolutely possible only if something can cause them. As God is necessarily creator and sustainer of all else, unless He can make or be a cause for them, there cannot be one, and so they cannot come about: they are absolutely impossible. Let S be one of these. Prior to thinking S up, God has the power to bring about states of affairs. Nothing prevents His using it to bring about S or make a cause to do so but lack of the idea of S. Once He thinks S up, He has an all-things-considered power to bring S about or make a cause for S- everything is in place to do so- unless He denies Himself this power.²⁸ If He denies Himself this power, He thereby prevents S.²⁹ If He lets Himself have the power to bring S about, He causally permits S to obtain: S is causally and so absolutely possible. On the other hand, some states of affairs God thinks up are such as to come about without cause. Such a state of affairs is causally possible unless it is prevented from obtaining. So if S is one of these, perhaps all God need do to render S causally and so absolutely possible is think S up and not prevent its obtaining.

I now make two assumptions to shorten exposition. I assume that God's nature settles all that is true of Him from all eternity: that God cannot from all eternity have contingent preferences or personality traits.³⁰ If so, God could not have been from all eternity other than as He actually was. With almost all theist modal metaphysicians, I assume that it is not in God to think up other

creature-involving states of affairs than He has.³¹ God's nature settles it, then, that the ones there are are the only ones there can be. I also take it that God's nature enforces consistency of reaction: once He dreams up states of affairs, He either does or does not prevent them, and either way, He could not have done otherwise. One might rationalize this as follows:

- a. by nature, God is morally perfect and knows all moral truths,
- b. by nature, God's preventing and permitting are guided entirely by His moral perfection, and
- c. necessary moral truths alone guide God's preventing and permitting.

Given these things and the absence of contingent preferences to complicate matters, God must prevent all that is too bad to allow and allow whatever else any necessary preferences permit Him to allow.

If the states of affairs to consider, the dispositions that guide God's reactions, moral truths and God's knowledge of them can't vary, the resulting permissions can't vary either. So whatever God actually permits, He would have permitted no matter what. On present assumptions, there cannot be other divine permissions than there are, just as in S5 there cannot be other possible worlds than there are.

Ordinary prevention effects only a causal necessity, by constraining which absolute possibilities history may yet actualize. When God thinks up creature-only states of affairs, they do not yet have modal status. God is thinking up the very items that will bear modal status. Till He does so, they have none. Once He does so, God's preventions and permissions establish their absolute modal status. What He causally permits is causally and so absolutely possible. What He does not permit is absolutely impossible, given that the actual permissions are the only ones there can be and not creature-only state of affairs is such as to obtain without divine permission. As these are the only permissions there can be, the possibilities they establish are the only ones there can be. Thus God may render some creature-only propositions about (a) S5-necessary by not permitting their contradictories.

The contingency of truths about (a) rests on divine permission. God may permit that P and also that \neg P, but bring about neither: if He does, whichever comes about is contingent. God also might bring it about that P, but not prevent Himself or some possible agent from bringing it about that \neg P later. If P can cease to be the case, it is contingent that P.³² Again, suppose that God has libertarian freedom by nature. Then sometimes when He decides that P, at the time He decides, it is in all respects open to Him to not decide this instead: and so though God brings it about that He decides

that P , it is contingent that He so decides. Where His decision is of the sort that is immediately causally effective- e.g. deciding “let there be light”- it follows that what He brings about, He brings about contingently. The like holds for created libertarian-free agents: and they have the relevant powers because God causally permits them so to decide and act. So God can render states of affairs contingent, and can bring about contingent states of affairs leaving their contingency intact.

As to (b), contingently existing abstracta might be e.g. Aristotelian universals, tropes or sets with contingent members. Contingent truths about them might well be limited to claims that they exist and have relations to other existing things. God has sway over these by His sway over their bearers' or members' existing. So contingent truths about (b) fall easily out of my account of (a)-truths. I also handle necessary claims about (b) like those about (a). All this does not imply that God has absurd Cartesian powers.³³ It does not imply that He can make contradictions or contra-mathematicals true, for I have spoken only of creature-only truths, and logical and mathematical truths are not creature-only. Nor does it imply that God can make Socrates essentially a fish, for it is compatible with all I've said that God had to think of Socrates as He did if He thought of him at all.

As a first step to my account of modal truth, I say of the distinctively causal permission in which I'm dealing that where P is creature-only,

1. $\Box(\Diamond P \equiv \text{God permits that } P)$.

Equivalently,

2. $\Box(\Diamond P \equiv \text{there exists a divine permission that } P)$.

I include divine causation as a case of permission; bringing it about that P is one way to deliberately let P come true. These are not bits of conceptual analysis. Nor do they reduce modal to non-modal facts, or ground modal facts on non-modal. They only correlate creature-only modal facts with God-involving modal facts. Facts of divine causal permission and prevention are in my view just the most basic sort of modal fact. If it is not obvious that permission, like prevention, involves something modal, note that it is prevented that P just if with causal necessity, $\Box\neg P$ ³⁴, and that if P is permitted (in my causal sense) it is ipso facto not prevented: thus if it is permitted that P , then $\neg\Box\neg P$.

I've briefly fleshed out (1) and (2) for creature-only propositions. I have not yet dealt with the non-creature-only- propositions about God, truths of logic and mathematics. I now do so. I then give the modal semantics and argue that it is true.

God, logic, mathematics

God cannot causally permit His own ever existing. For it cannot be up to Him whether He ever exists. He must already be there if anything is to be up to Him, and if He is there, it is too late for Him to do anything about it.³⁵ If God exists, He possibly exists. So God possibly exists, but has not causally permitted His existence. But it does not follow that God's ever existing is not part of a divine causal permission's content. If it is the case that P, and I causally permit that Q, I thereby causally permit that P and Q. For while (we can suppose) it was never up to me whether P, if it is up to me whether Q, it is up to me whether the whole conjunction obtains: by preventing that Q, I could have prevented that P and Q, and so if the conjunction as a whole obtains, it does so by my causal permission. Thus at every time, God permits a conjunction including His own ever existing. The like applies to His having His nature, being omnipotent, etc. Thus to take my account beyond the creature-only, I alter (1) and (2) to

1a. $\Box(\Diamond P \equiv \text{God permits a conjunction including } P^{36})$

and

2a. $\Box(\Diamond P \equiv \text{there exists a divine permission of a conjunction including } P)$.

(1a) and (2a) extend to an account of logic and mathematics. A long theist tradition finds the truthmakers of logical and mathematical truths in God's nature. If this tradition is correct, (1a) and (2a) are all we need for them. If it is false, either these truthmakers are Platonic or they pose no particular difficulty for my account.³⁷ On the attribute-theory to which I've alluded, theists can parse the Platonic away. God's mental states give us substitutes for Platonic logical and mathematical attributes, which can ground the relevant truths much as the attributes would. Without this theory, we could treat logical and mathematical states of affairs as we do God's existence: there would be divine permissions including their ever obtaining, and if all divine permissions include their obtaining at all times, and none allow them not to obtain, they come out necessary and their necessity is a fact about divine permissions, though God did not generate their possibility or their actual obtaining.

A metaphysical advantage

On my view, there are two ways states of affairs are possible- primitively and intrinsically (God's existing, etc.) or by divine permission. This might seem unlovely, so I now show that

something similar is true also on the main competitor views. Theories of possible worlds have two routes to possibility.³⁸ They agree that possibly Fa just if in some possible world, Fa. This raises the question of what it is for an entire world to be possible. On the competitor views, the way worlds are possible is not the way all states of affairs they contain are possible.

Some theories see possible worlds as inheriting possibility. If worlds are maximal consistent sets of sentences³⁹ or propositions⁴⁰, or are maximal consistent states of affairs⁴¹, their being possible is their members'/conjuncts' being compossible, i.e. such that they can all be true together, as part of a single universe-history. Such worlds include atomic sentences, propositions or states of affairs. For these, being possible is not their members'/conjuncts being compossible, since they have none. Nor is it their being compossible with themselves, i.e. able to be true together with themselves, though they are so. They can be in the same possible world with themselves because they can be in some possible world: they are compossible with themselves because they are possible, and their being possible must thus consist in something other than compossibility. Let's say it's having property F.

Whatever F is, members/conjuncts cannot derive it from the worlds' containing them. Possible worlds (on such views) are compossible sets or conjunctions of items with F: they would not be possible worlds if any of their members/conjuncts were impossible or of indeterminate modal status. So worlds' being possible presupposes their members' having F and so cannot explain it. Still less can a world's members/conjuncts get F by existing in other possible worlds. For these worlds too, being possible would be their members/conjuncts' being compossible. This would again raise the question of how their members get F: just as a member/conjunct had to bring its being F to the original world for the original world to be possible, so it would have to bring it to the second world for the second to be possible. The next thing to consider is whether members/conjuncts might get F from other members/conjuncts. If they did, there could be just three outcomes. One is an infinite regress, in which we never get an answer to the question of why any members/conjuncts in the series have this property rather than none.⁴² Another is the picking-out of a privileged class of states of affairs to have F intrinsically and lend it to the rest. The third is an explanatory circle, in which we begin from a member/conjunct whose having F we want to explain, find others to explain it and still others to explain them, but in the end are led back to the original member/conjunct. The best way to view such a case, I think, would be that all members/conjuncts involved in such circles really have F intrinsically. So on such theories of worlds, there are at least

two ways to be possible: by compossibility and in another manner, which it seems must just be intrinsic and primitive. The same applies to combinatorial theories of worlds.⁴³

Other theories do not see worlds as inheriting possibility. If worlds are attributes entire universes might have⁴⁴, other items inherit possibility from them: for a state of affairs to be possible is for it to be such that were some world-attribute exemplified, it would obtain. But then we must ask what it is for a world to be possible. It won't do to reply, "for it to exist in another possible world." For what we want to know is why any random world at all is possible- where possibility as such comes from. If the reply leads to an infinite regress, this question is never answered; if it leads to a circle or to intrinsically possible worlds, we end with at least some worlds possible just intrinsically, and it would seem most reasonable to say that all possible worlds have this feature, absent some convincing story about what makes the special worlds special. So on such accounts of worlds, there are two ways to be possible: by inclusion in a world, or by being a world, i.e. just being intrinsically possible.

For Lewis, ascriptions of possibility have non-modal truth-conditions: Lewis' possible worlds are existent physical objects broadly like the one we have around us, and for him, it is true that $\Box P$ because a universe in which P exists.⁴⁵ Lewis-universes inherit existence (possibility) from their parts: they exist because their parts exist and are appropriately arranged. Perhaps in some Lewis-universes this goes on ad infinitum, every object being composed of further objects. But surely it is at least possible that there be mereological simples, items wholly without parts. If so, then in some Lewis-universe these exist. They do not inherit existence from their parts. They simply exist, primitively: i.e. in Lewis' terms, they are just primitively possible.

World-theories, then, always specify entities which are intrinsically, primitively possible and entities that inherit possibility. If one is not simply going to eliminate modal facts, or reduce them to non-modal, it is hard to see how else to give an illuminating metaphysical account of them than by showing how some sorts of modal fact derive from others, and ultimately from a set of basic modal facts about a modally privileged set of entities. My theist theory does this. I have now suggested that its rivals do too. But my theist theory has the theoretical advantage of having the smallest set of privileged entities. It takes God's existing to be primitively possible. I have argued elsewhere that if there are divine essential attributes, Platonism and concept-nominalism are not the correct account of them.⁴⁶ But unless Platonism or concept-nominalism is the right account of them, these exist because God does⁴⁷, and so inherit their possibility from the possibility of His existence rather than being

primitively possible. God's nature gives Him the power to permit- i.e. makes it possible that there be individual divine permissions.⁴⁸ For my theist theory, then, only the possibility of God's existence is primitive.

The semantics

As (1) and (2) are true, there are enough divine permissions to do duty for possible worlds. So I now suggest a semantics on which the modal operators function as quantifiers over divine permissions.

A Kripke-style semantics for the modal locutions of a language L involves a sextuple $\langle W, w^*, R, D, Q, V \rangle$, where W is the set of all possible worlds, w^* the actual world, R a relation on the members of W (accessibility between worlds), D the set of all possible individuals, Q a function that assigns to each world a subset of D (the individuals that exist at that world) and V a valuation function that assigns to each predicate an extension at each world, to each constant a denotation at any world at which it has one and to each sentence a truth-value at each world.⁴⁹ Given these, the semantics assigns such truth-conditions to L -sentences as that ' $\Diamond Fa$ ' is true just in case there exists a member w of W such that $V('a')$ exists at w (i.e., $V('a') \in Q(w)$) and is in the extension V assigns to F at w (i.e., $V('a') \in V('F', w)$).⁵⁰ Thus it treats the truth of claims quantifying over worlds as determining the truth of possibility-claims (etc.).

I propose instead to take W as the set of all maximal divine permissions, permissions that things be such that for every tenseless sentence P , either " P " says something true or " $\neg P$ " does, but not both.⁵¹ I speak so to avoid suggesting that there are entities which are the contents of these permissions. For these entities, whatever they be, would do nicely as actualist possible worlds. Suppose that the content of God's permission were a maximal proposition P , one which for every tenseless proposition R either entails R or entails $\neg R$. P could serve as a possible world; it is a close analogue of a Plantingean world.⁵² If P will do, why complicate matters by bringing God in to "host" it? I suggest elsewhere how to understand the content of divine permissions without bringing in P or its ilk to be that content.⁵³ If that suggestion works, the theist can indeed dispense with worlds and yet have divine maximal permissions. Further, if one can do a philosophical job without making a new ontological commitment, one should, and so the mere viability of my suggestion would generate an argument for accepting it.

Even if the suggestion does not work, I suggest that all we need in the semantics of absolute modality are primitive divine states and mental events, ones for which there is no further account of

why they are (say) states of permitting that things be as a world-sentence *W* describes rather than as *W** describes. They need not in any real way have abstract objects, worlds, written into or related to them. States of permission are just a particular sort of attribute, the sort expressed by "___permits that *P*." My claim that they can have their character (as e.g. a permission of *P*) primitively is just an application to them of an intuitively plausible claim about attributes generally, that Fhood's being Fhood is a primitive fact about Fhood, not explained by something further in Fhood.

Fhood has a certain content just because it is the property it is. If we posit some further constituent to make Fhood Fhood, the question will arise of whether anything else makes that further constituent the entity it is. If this question always gets a "yes" answer, we have an infinite regress of character-explaining constituents. If it ever gets a "no," why not say no at the outset, at Fhood itself? So in the case of Fhood's being Fhood, no further explanation is possible or needed- explanation comes to a stop somewhere and this seems a good place for it. Now this argument targets states conceived as universals or tropes. On some nominalist views it would fail: on set nominalism, for instance, what makes cathood (the state of being a cat) cathood are entities it contains- the cats. But equally, on these nominalist views, in no sense is what a state permits written into a state. On set nominalism, for instance, the state of permission that there be cats is a set, and no set has a constituent which directs the set to the permitting of cats.

The argument I've just made can be overridden. There can be reasons to take certain attributes as involving internal structure of some sort. For instance, there are reasons in the case of human belief- and desire-states to say that they contain constituent mental representations. But these reasons don't apply in God's case, and this is worth noting.

The primary thought behind the representational theory of mind (RTM), for instance, is just that the human mind is a sort of computer, a causal system that produces rational trains of thought by physical operations on physical internal symbols which have semantic properties.⁵⁴ The divine mind is not a computer. It is not a physical system. There is no need in its case to solve the problem of how physical systems can produce physical processes that encode or parallel rational relations among thought-contents. In fact, it's been a widely held view that God has no need to think, no thought-processes, but instead just knows immediately; so too, that He has no need to deliberate, but just sees what to do and so decides immediately.⁵⁵ One popular argument for RTM has been the empirical success of cognitive psychology that presupposes it, but we have no divine cognitive

science. Fodor points to the productivity and systematicity of belief-states as a point for RTM. On the first he writes that

There is a (potentially) infinite set of... belief-state types... This is... explicable on the assumption that belief-states have combinatorial structure; that they are somehow built up out of elements and that the intentional object and causal role of each such state depends on what elements it contains and how they are put together. (This is true if) believing (involves) a relation to a syntactically structured object (with) a compositional semantics...⁵⁶

The thing to be explained is how a mind with finite capacity is able to acquire a (potential) infinity of different beliefs. The explanation is that the mind has a finite vocabulary of internal symbols which it can so manipulate as to generate a potentially infinite series of distinct belief-state-contents. But the divine mind doesn't have a finite capacity. So this inference to the best explanation has no traction in God's case, because what sets up the need for the explanation is absent. Finally, Fodor points to the way native speakers learn their languages to argue that human thought has "systematicity."⁵⁷ God never learns a language. As always omniscient, He always knows all possible languages.

So far, then, we have no reason to think that divine thought involves mental representations. But this has a consequence for its content. The theory I set out elsewhere takes attributes to be or else essentially involve divine mental states. It's not that these represent independent attributes, but rather that they are or constitute the attributes. A natural extension of that theory "reduces" Platonic propositions to constructs of divine mental states. On this theory, then, there are no Platonic propositions to be the content of divine belief-states. There are just divine mental states. What to say about God's relation to propositions, then, is determined by what we should say about His concepts. But we have no reason to think that God's being in the sort of mental state which we could speak fictionally of as possessing a concept is a matter of His possessing a mental representation- i.e being in a mental state which serves as a symbol for an external reality and a content for propositional attitudes. So we have no reason to believe His states of permission, with propositional content, involve His possessing mental representations. We have no reason to think that God's grasping a proposition consists in His having a mental state which serves as a content of propositional attitudes. We are free, then, to hold that while God has contentful mental states, there aren't such things as items which are their contents. So we can hold that God's issuing permissions

with propositional content doesn't imply that there are propositions which are their contents, and so doesn't generate world-representations to serve as worlds.

I take w^* as God's permission of the concrete actualized state of things.⁵⁸ R is a relation on divine permissions, determined by conditional divine permissions: God makes a world W accessible from a world $W2$ by decreeing (in effect) "if $W2$ is actual, I permit that W be actual."

I do not believe in possibilia. So my treatment of D cannot be entirely straightforward. One might think to take D as the set of divine singular concepts, divine singular representations of possible individuals. But I deny divine representations. I say, then, that for each possible individual, there is such a state as would be had by grasping a singular concept of that individual if there were such a thing. Anyone who believes in singular concepts will grant that such states are possible, for they think such states are just what one has by fully grasping a singular concept. They may jib at having them without the concepts, but I have given a case for saying that there are no concepts in God's case. Some do not believe in singular concepts, nor singular possibilities in advance of the existence of the relevant individuals, but given the length of this paper I cannot satisfy them here.

There are such states. My D contains just them. On my account, then " $\diamond Fa$ " is true just if there exists a maximal divine permission w such that Q assigns a divine understanding $A [= V('a')]$ to the divine understanding of w 's content [i.e., $V('a') \in Q(w)$] and V assigns A , in the divine understanding of w 's content, to the divine understanding of F 's extension [i.e., $V('a') \in V('F', w)$].⁵⁹

My account lets " \diamond " iterate. Each occurrence of " \diamond " in a truth rests on a divine permission; iterated occurrences reflect God's permitting Himself to permit states of affairs. There is nothing odd about iterated permissions. Consider a mother's internal dialogue: "I incline to give my daughter too much freedom for her own good. So I won't let myself say yes every time she wants to expand her boundaries. I'll let myself say yes some of the time, but I have to put my foot down at other times."

One way to test a modal semantics is to see whether it validates intuitively correct modal principles. The obvious isomorphy between the present semantics and a standard "worlds" approach guarantees that the present semantics gets us whatever a worlds-account does. For instance, my account undergirds the standard equivalences. What makes it true that

$$\diamond P \equiv \neg \Box \neg P$$

is that God permits a conjunction including P just if it is not the case that God causally precludes all but that $\neg P$ (i.e. that God prevents all conjunctions including P), and what makes it true that

$$\Box P \equiv \neg \Diamond \neg P$$

is that God prevents all conjunctions including $\neg P$ just if God does not permit that $\neg P$. I favor taking " \Diamond " as primitive and defining the alethic " \Box " in terms of it, thus ultimately using only permissions in the semantics. Similarity of worlds figures in the semantics of counterfactuals: it is true that $P > Q$ just if the P -worlds most like the actual world are all Q -worlds. Correspondingly, on my account, it is true that $P > Q$ just if the divine permissions that P permitting states of affairs most like actuality only permit that Q .

On my view, the right sides of (1a) and (2a) are metaphysically basic where P is creature-only: P is possible because God permits a conjunction including P . I do not mean by this that God's permitting P is one state of affairs and P 's being possible is another one, which it causes, or that P 's being possible supervenes on God's issuing a permission. My claim is that P 's being possible just is an aspect of or embedded in God's permitting P . The modal element in permission is the modal element in the corresponding possibility-claim: P 's being causally permitted to be true by God is the full modal fact from which we abstract in claiming simply that $\Box P$.

Four jobs for worlds

I now argue that quantifying over divine permissions does the tasks for which worlds are used better than quantifying over worlds. Worlds' tasks are semantic (providing truth-conditions for modal claims), intensional (elucidating their meaning, to the extent that truth-conditions do so), ontological (providing truthmakers for them⁶⁰) and reductive (allowing elimination of other sorts of entity). Lewis puts his worlds to a fifth task, the elimination of primitive modal idioms by providing a wholly non-modal analysis of modal sentences.⁶¹ As Lewis sees it, the claim that $\Diamond P$ asserts something completely non-modal, that there exists a world in which P , "exists" being a wholly non-modal concept and worlds being wholly non-modal entities. For Lewis, being possible just is existing. Only a view rather like Lewis' can say this. If worlds were properties, that $\Diamond P$ would assert that there exists a property such that were it exemplified, P , and possibly the property is exemplified. Worlds' being possible would be their being exemplifiable, not their existing- and exemplifiability is of course a modal matter. If worlds were Meinongian possibilia, their being possible would be their being able to become concrete, or to exist, not their existing- and being able

is of course a modal matter. Thus the key to the move is that worlds be the same sort of thing our universe is and exist in the same modally flat sense ours does.

This part of Lewis' project seems to me just misconceived. I do not see what gain there is in eliminating primitive modal idioms at the price of a vast bloat in ontology (of which more below), let alone accepting on a priori grounds that somewhere, in a place we can't get to⁶², there are talking donkeys and dancing amoebas just as full-bloodedly material and existent as we are. Thus I do not accept this sort of elimination as a desideratum. That a theist theory of the modal cannot do it should not count against it.

Truth-conditions

The standard semantics brings possible worlds into the truth-conditions of modal claims. This amounts to using worlds to explicate what modal claims assert- what they mean, in one dimension of meaning. If permissions provide truth-conditions, they can do the explicating too. It is no doubt surprising to hear that claims as homely as that the Giants might win on Sunday assert something which entails the existence of God. But it is no less so to hear that the Giants' possible win commits us to Lewis' concrete universes or abstract entities of various outré sorts. None is a particularly natural explication of what we say. All involve items whose relevance to what we say isn't initially obvious.⁶³ So the surprise, as such, does not tell against one proposal more than another. At worst, one proposal will fare worse than others if its outré entities are for some reason less acceptable than others'. For that matter, talk of the Giants doesn't on its surface commit us to quantum entities, fields, curved spacetime etc., but if current physics is correct, what will make our claim true or false on the day entails claims about many such things.⁶⁴ I now briefly consider the competition.

Theist modal theories' competitors are possibilist or actualist. Possibilist views posit merely possible entities. Such possibilities come in three varieties. Lewis' exist and are concrete (or else sets) but are not actual.⁶⁵ Meinong's are actual and belong to concrete-object kinds- they are horses, golden mountains, etc.- but do not exist.⁶⁶ Williamson and Zalta's are actual and exist but are not concrete.⁶⁷

Lewis' possible worlds resemble our universe- they are spacetimes or analogues thereof with their contents (plus their sets), with no spatiotemporal relations to our universe. They exist; every genuine possibility occurs in some existent universe. But according to Lewis, these universes are not actual. "Actual" is for him an indexical, whose role is to indicate the possible world of the speaker, and so this really amounts simply to the claim that they are not part of this universe.⁶⁸ On

Lewis' view, all possible concrete individuals of all possible kinds exist. Lewis was in some moods happy to grant that across all worlds there are gods of all sorts⁶⁹ - he just didn't think there were any hereabouts. Admit as much and it's obvious that making do with just one God and one spacetime is more economical than positing infinities of both. But even if we insist dogmatically that Zeus et al. aren't so much as possible, making do with one God is more economical than making do with untold infinities of concrete universes.

Now Lewis might reply this way: what matter most in ontology are highest-level natural kinds. At this level I (Lewis) posit just concrete particulars and sets. This is highly economical. Adding a deity is adding a highest-level kind. Adding universes adds many instances but no highest-level kinds. So my view is most economical in the sense that matters to ontology. This reply fails, though. A god is just one sort of immaterial person.⁷⁰ An immaterial person is a person, and *person* is not a highest-level kind. So a theist view can be equally economical at the highest level. Further, adding a deity lets one do without sets.⁷¹ As it also lets one eliminate attributes and worlds, theism winds up with *concrete particular* as its sole highest-level kind, beating Lewis at the highest level.⁷² Further, at a lower level, the comparison between theism and Lewis is between adding a priori to the metaphysics of modality one or uncountably many existent individuals. Individuals matter in ontology; economy is not just a matter of highest-level kinds. Theism's added individual is unusual. But Lewis' universes include infinitely many things perhaps equally unusual. So on balance, economy favors theism here.

Meinong adds no existents to our ontology. But for every existent or kind Lewis adds, Meinong adds a "subsistent" one. Meinong's and Lewis' unrestricted quantifiers range over exactly the same things.⁷³ Each thinks we must add exactly the same things to our universe to get a full picture of reality. So I submit that Meinong bloats our ontology just as Lewis does.⁷⁴ If he does, my argument against Lewis carries over. Theism is also a more conservative revision of our general ontology than Meinongianism. Theism requires only belief that there actually is one unusual being. Meinongians must accept that some things actually are horses although they do not exist. If this is so, some horses have no causal powers or location in space; thus some actual horses are abstract objects, on standard ways of drawing the abstract/concrete distinction. Further, at any time, most horses will be abstract objects. For a Meinongian, one is privileged to meet a concrete horse; they are rare. Theists need say no such things.

Williamson's and Zalta's proposal turns Meinongian non-existent concreta into actual abstract objects. (It is therefore not really a version of possibilism.) My main argument against it, then, will be the one I deploy below against abstract possible worlds. But for Williamson, before you were born, you existed, but were nowhere in space or time.⁷⁵ Linsky and Zalta add that you were then abstract (and will be again).⁷⁶ These propositions (to me at least) border on literal incredibility. Further, how could something atemporal cease to be so? Its atemporal existence would then be over. But what is over lies in the past, and what is in the past is not atemporal. And surely it can't be the case that a state of affairs was atemporal when "present," but is temporal when past. Temporality seems to be an intrinsic property; a thing doesn't seem able to change with respect to temporality by how other things are related to it. If temporality is extrinsic, then we can reason this way: "before" it became temporal, this state of affairs was going to be temporal. Something was going to succeed it. This is an extrinsic property even if time is tensed, and so the future item wasn't there to stand in this relation. But then this state of affairs had a future- and so was not atemporal.

I submit then that there is a strong case, based largely on economy, for God's superiority to possibilism in explicating modal truth-conditions. I turn now to actualist world-theories. These treat worlds as

- I. maximal sets of propositions⁷⁷,
- II. attributes entire universes would exemplify⁷⁸,
- III. maximal states of affairs⁷⁹ (maximal propositions would do as well⁸⁰), or
- IV. combinations of other entities.⁸¹

The theist's ontological case against (I) (and the variant of (III)) is simply that theists can eliminate both sets and propositions, leaving a simpler ontology overall and also (as emerges below) one with epistemic advantages. Against (II), the theist elimination of attributes in favor of divine mental states trades untold infinities of abstract substances for one concrete substance, and one highest-level kind for one sub-kind. There aren't compensating epistemic advantages to attributes: if some are perceptible, according to theists, God is too.⁸² A basic problem with (III) is what states of affairs- possible facts- are. They might be combinations of attributes, in which case I've already dealt with them. They might on the other hand be sui generis.⁸³ If so it is sheer gain to parse them away. Merely possible states of affairs can dissolve into combinations of divine mental states. And these are the only ones we need worry about, for any truthmaking tasks actualized states of affairs

might do can be taken over by the concrete realities that actualize them in conjunction with appropriate divine mental states. (IV) raises the question of how combinations are "constructed." If the combining involves sets- in Cresswell, sets of states of affairs⁸⁴ - it's clear what the theist can say. We must also ask what the combinations combine. In Bigelow's version⁸⁵, it's universals, and so again the theist argument is plain. The economy case for a theist view, then, seems to work across the board. But there are also epistemic considerations to raise.

Whether possible worlds be Lewisian concreta, Meinongian possibilia or actual abstracta, they are epistemically problematic. We have beliefs about what is merely possible. We think many of them are true and justified- even known. If facts about what is merely possible are facts about what merely possible worlds contain, though, it is not clear how beliefs about what is merely possible could be justified. For then in asserting these beliefs, we make claims about merely possible worlds' contents. It is not clear how we could ever learn of merely possible worlds' contents, or of enough of their contents.⁸⁶ I consider in turn perception, induction, finding-consistent and imagination.

No merely possible entity has any causal relation to us, so if merely possible worlds consist of possibilia, we can't learn their contents by perception: I can perceive the Lewisian possible world I'm in, since it is just the universe I'm in, but I can perceive no other. Nor are sets perceptible. Whether attributes are perceptible is unclear and perhaps shouldn't receive a uniform answer: perhaps when I see a red apple, I'm acquainted with phenomenal redness, but when I see Rover, do I see his caninity? Even if some attributes are perceptible, others aren't- e.g. quarkhood- and only exemplified attributes are. But on an attribute theory of worlds, merely possible worlds would be unexemplified attributes. States of affairs have perhaps the strongest claim to perceptual access of any abstract entity, because actualized states of affairs- facts- are somewhat plausible candidates for causal relations.⁸⁷ If the leaf's being green can be a cause, it would take some argument to show that it couldn't cause me to see the leaf's being green. So perhaps parts of maximal states of affairs would be perceptible- but (obviously) just the actualized parts. This doesn't of itself give access to the merely possible

If the future is unreal but determinism is true, induction gives us justified beliefs about the not-yet-actualized contents of a world, but this is not a merely possible world: it is the world which is actual, though not yet entirely actualized. If the future is unreal but determinism is false, many possible futures are compatible with what has so far been actualized, and so no single complete

possible world is the actual world. Instead, there are many worlds with the actual past in common, all with claims to be on the way to complete actualization. Induction then gives us reason to believe that various continuations of history are more or less probable. So it gives us defeasible reason, based on past perceptual access to the actualized part these worlds share, to believe that worlds containing various states of affairs are possible (since probability entails possibility), or else have been possible (if they were more or less probable continuations of history as it was at some past point). But this is at best access to what is or was physically possible. If metaphysical possibility outruns physical, induction won't guide us to it. Williamson suggests that the epistemology of metaphysical modality is just a special case of the epistemology of counterfactuals.⁸⁸ But conditionals can at best transmit our reasons to consider an antecedent possible to our belief in their consequents. By the means so far scouted, we can only get access to some physically possible antecedents. So again, this won't give us grounds for belief in possibilities beyond the physical, save insofar as we might also reason counterfactually from a priori truths.

We believe that if P is false but we find P consistent, and even more if we imagine P, this gives us prima facie reason to believe P metaphysically possible. Evolution might mold us to tend to get physical possibilities relevant to hunting and gathering right in these ways. But much physical possibility is not thus relevant. Much of metaphysical possibility is further still from being such that ability to grasp it would confer evolutionary advantage. It's not clear why molding that would get us to grasp practically relevant possibilities should enable us to grasp practically irrelevant ones. This conferred no evolutionary advantage at the time the selection-pressure was exerted. It thus is not something evolution would lead us to expect; it has no evolutionary explanation. So since a worlds-theory doesn't alter this, the conjunction of evolutionary naturalism and a worlds-theory yields no reason at all to trust our beliefs about metaphysical possibility insofar as they outstrip physical possibility. But we have no a priori way to tell when a possibility-judgment does go beyond the physically possible. So this conjunction yields no reason to trust our possibility-judgments more generally, save when they can be shown to concern practically relevant physical possibility or its restrictions- and that is some reason not to trust them. If on this account of reality, reliability about the merely possible is not to be expected, then other things being equal, we should not think we have it. This metaphysics thus generates a justification-defeater for any belief about mere possibility that can't be shown to deal only in practically relevant physical possibility or its restrictions.

Again, if evolution molds us to tend to get physical possibilities relevant to hunting and gathering right, the molding proceeds by way of our interactions with this-worldly concreta. So it would seem a fluke if such processes got us to latch onto the contents of non-actualized Platonist or possibilist entities. How could they? Of course, if we do have ways to form beliefs about physical mere possibilities, and such beliefs are about Platonic entities and are sometimes true, then we have somehow acquired the means to do this. But my point is that there is no plausible story to tell to explain this. Something evolution can explain turns in the presence of a world-theory into something evolution can't explain. It is simply accidental to any physical story that might explain our having belief-forming processes reliable about physical mere possibilities that it thereby gives us reliable access to merely possible worlds (or world-portions), however construed. The story would work as well or better with the worlds deleted. Just for that reason, the story leaves our access to worlds unexplained: there is nothing in the story to lead us to expect that we by the means it displays get a grip on possible worlds.

What we believe about the merely possible makes claims about the existing or obtaining of what would make our beliefs true. So if our beliefs' truthmakers include possible worlds, they make claims about possible worlds. But if we assert that they do, our modal epistemology is out of step with our account of modal truthmakers.⁸⁹ For then we have no perceptual or causal access to what makes our beliefs about the merely possible true. We have no other way of settling beliefs about mere metaphysical possibility which we have reason to think reliable once we realize what the truthmakers are. We have no good story to tell about appropriate relations between the truthmakers and anything we do have access to. And our truthmaker account for mere metaphysical possibility makes our ways of settling belief about it seem unreasonable. This threatens to undercut our claim to knowledge of the merely possible, especially the merely metaphysically possible.⁹⁰ But theists can tell a reasonable modal-epistemological story: God issues His permissions. These are the modal truthmakers. God then designs us in light of them, molding our faculties so that when they exist, we reliably tend to believe that they do. Thus there is a direct causal route from modal truthmakers to our modal beliefs, this makes sense of the truthmakers figuring in the content of our utterances, and the story can be fleshed out in a way that leaves our modal beliefs justified.⁹¹ Moreover, it can be fleshed out in a way that leads us at least weakly to expect that we will have belief-forming processes somewhat reliable even about mere metaphysical possibility. For God wants us to know the truth, or so theists believe.⁹² Further, God is generous, giving many gifts beyond the practically

necessary. It is not surprising, then, and perhaps even weakly to be expected, that He should enable us to know more truth than is needed practically.

Worlds do not seem to permit a decent modal epistemology. God does. Of course, one might here cry pox on both their houses, begin from the ways we settle modal belief, and work outward to whatever truth-conditions best fit them. I have (at present) nothing to say about such moves. I am not arguing that the disjunction of theist accounts and worlds accounts is to be preferred to the disjunction of their alternatives. I am arguing that when the choice is God or worlds, then epistemologically as well as on economy grounds, God is preferable. I now turn to worlds' use as truthmakers.

Worlds as truthmakers

There are enough divine permissions to do worlds' truthmaking task. If candidate truthmakers truthmake at all, they do it equally well. But one candidate truthmaker may provide allied benefits another doesn't. I now argue that a divine-permission theory of modal truthmakers provides benefits a world-theory does not. Scott Shalkowski notes that

The key concern for... any (modal) approach framed in terms of a set of objects is: What have these objects to do with modality? Why are they... relevant? Simply admitting that there is more to the world than our spacetime continuum no more automatically accounts for necessity than does admitting that there is more to the world than the contents of my toolbox.⁹³

Thus too Tony Roy:

if I were suddenly to find out that there are no possible worlds, my response would not be "so much the worse for its being possible that I take a walk," but "So much the worse for the relevance of possible worlds." This world makes it possible for me to take a walk... modal facts... "located" somehow in the actual world (are) what determines which state of affairs are the possible worlds... we need to know that there is an appropriate connection between the possible worlds and the actual world before a worlds analysis can seem to be so much as relevant to modality.⁹⁴

If its being true that possibly Roy walks is relevant to whether he walks, what makes it true should be relevant to his walking. However conceived, merely possible worlds can't causally constrain Roy's legs. How else can they be relevant to his walk? That in another Lewis-universe someone like Roy walks may be reason to think it possible that Roy walk, but (so it seems to us) doesn't make it possible

for him to do so. Lewis-universes or maximal possibly-true propositions represent possibilities for our universe, by simulacrum (Lewis) or as propositions do. Prima facie, what merely represents a possibility reflects something else- whatever else makes this possible. Again, told that there is a property of entire universes such that were it exemplified, Roy would walk, one wants to say that whether Roy can walk will be part of what determines whether the universe can have the property, rather than being determined by it: the part's character determines what character the whole does or can have, not vice-versa. If there is relevance here at all, it runs in the wrong direction for worlds accounts. Some might say that world-talk is just talk about ways things can go, and if there is no way things can go in which Roy walks, this certainly affects whether he walks. But this is sleight of hand. "There is no way things can go in which he walks" - or more simply "he can't walk" - makes a non-metaphysical modal claim. Its truth (or not) is relevant to how things actually go. Roy's suggestion is that when we parse this in terms of a world-theoretic metaphysical account, the relevance evaporates. It is no answer to this to say that the pre-analytic claim is relevant.

My theist theory doesn't have a relevance problem. On my account, if it is true that there is no way things might go in which Roy walks, what makes it true is simply that God won't let him walk, no matter what- that God denies him the power somehow. What makes it true that he might walk, if that's true, is that God might empower him to walk- that God permits Himself to do so. Both are actual causal facts, and their relevance to Roy's walking is obvious.

In modal matters, the non-physical has an explanatory priority to the physical. For there could fail to be anything physical at all.⁹⁵ Were there nothing physical, there would still be positive modal truths: that necessarily $2+2=4$ and that possibly there is something physical. But then these would have truthmakers. These could only be non-physical entities of some sort. And there is no reason to think these things would be there only if nothing physical existed. So there are in addition to physical entities items which suffice to ground modal truth without them. The physical at best overdetermines a portion of modal truth. And if it could fail to do even that, but truth would then remain the same, its contribution is inessential and secondary. So in modal matters, the non-physical is primary. But what form must it take? What seems desirable is that there be something non-physical but not a mere representing entity, something that can get in on the ground floor of the modal realm rather than reflecting modal facts established elsewhere and be relevant causally to what goes on in the physical world. God fills the bill.

Elimination

Finally, possible worlds are sometimes used to eliminate other sorts of entity. Actualist eliminations take as primitive some sort of intensional entity which (or sets of which) serve as worlds- e.g. attributes. Given this sort, one can generate the rest: one can "construct" propositions or states of affairs from attributes, say. Prima facie, divine concepts will do as well as another sort of intension at the base-level: and can then be eliminated. Possibilists can try to do without intensional entities altogether, "constructing" them from sets of possibilia. But this still leaves their position less economical than theism, or so I've argued.

In summary, then, on economy grounds, divine permissions do better than worlds at worlds' semantic and intensional tasks. They do better (in terms of allied benefits) at truthmaking and not clearly worse at elimination. So even without taking up all the ontological issues a cost/benefit argument for God must address, I submit that I've given a case, on ontological grounds, for the existence of God. If the case works, atheists' best move might be to try to do without worlds on a non-theist basis, by speaking instead of situations or world-fragments, or by adopting some sort of fictionalism. But situations or world-fragments are abstract, and so do not escape the abstract-entity limb of my argument, which does not depend on the abstract entities' being world-sized. And modal fictionalism is a hard sell. Sherlock Holmes isn't really a detective. It's just "true in the story" that he is. Do essentialists really want to say that Socrates isn't really essentially human? Do we believe that $(P \cdot (P \supset Q) \supset Q)$ isn't really necessarily true? Terms for possible worlds occur referentially in the best modal semantics we have. This is reason to be realistic about possible worlds, at least to the extent of maintaining that real entities play the possible-world role. My present global-economy case for God's existence has been that the best such entities are divine permissions.⁹⁶

¹ The principle would dictate this equally in every possible world. So in every possible world there would be most reason to think just one being plays this role. This does not entail that there is most reason to think just one being plays this role in every possible world, but it certainly is a point in favor of the claim. Still, even if in every possible world, one being plays this role, it doesn't follow that the same being plays this role in every possible world. I argue the latter in "Against Deity Theories," Oxford Studies in Philosophy of Religion 2 (forthcoming).

Not only are there no reasons to think that more than one being plays this role, in any one world or over all worlds, but there is some reason to think this is not the case. If many beings play this role across worlds, we need to explain why there necessarily is a being to do it, and what determines which being plays it in which world; on the one being account, these questions don't arise. Again, if modal facts are constant across worlds, as in S5, this is easily explained

on the one-being hypothesis but might well require a more complex, less plausible story on the many-being hypothesis. If many beings share this role in some one world, we have to inquire into what determines which modal facts each explains, and why, and how to deal with the threat of conflict between the beings; the God hypothesis faces no such questions.

² For a variety of historical formulations of “the” Razor, see W. Thornburn, “The Myth of Occam's Razor,” *Mind* 27 (1918), 345-53. For an important distinction made more recently see E. C. Barnes, “Ockham's Razor and the Anti-Superfluity Principle,” *Erkenntnis* 53 (2000), 353-374.

³ Or at least among the good ones. I suspect that many philosophers have poor reasons to believe in sets, e.g. unjustified assimilation of them to common-sense collections.

⁴ David Lewis, On the Plurality of Worlds (Oxford: Basil Blackwell, 1986); Alexius Meinong, “On the Theory of Objects,” in Roderick Chisholm, ed., Realism and the Background of Phenomenology (Glencoe, Ill.: Free Press, 1960), 76-117.

⁵ So e.g. Terence Parsons, Non-Existent Objects (New Haven: Yale University Press, 1980), 101.

⁶ So e.g. R.M. Adams, “Theories of Actuality,” Nous 8 (1974), 211-31.

⁷ So e.g. Anthony Quinton, “Properties and Classes,” Proceedings and Addresses of the Aristotelian Society 48 (1957).

⁸ If the individuals involved are finite in number, use of “fewer” is unproblematic. If they are same-order infinite, understand it in terms of one infinite set being a subset of another.

⁹ See e.g. David Lewis, Convention (Cambridge, Mass.: Harvard University Press, 1973), 87.

¹⁰ Michael Huemer tries to cast doubt on the intuitions by arguing that one can explain why picking parsimonious theories is a good epistemic policy in science, but the explanations do not apply to philosophical appeals to parsimony (“Why is Parsimony a Virtue?”, Philosophical Quarterly 59 (2009), 216-36). The most basic point to make here is that inability otherwise to justify an intuitive belief (that parsimony is good philosophical policy) does not entail that we are not rationally entitled to hold it: intuition itself counts as a primary source of prima facie justification, for the denial of this (I would argue) cannot consistently be maintained. Moreover, the differences between science and philosophy (on which Huemer insists, 228-9) make the force of Huemer’s argument unclear. Given the differences, we might well expect that if anything other than intuition justifies the Razor in philosophy, it will differ from what justifies scientific parsimony. Nor does our intuition about parsimony in ontology seem to have roots in illicit generalization from parsimony’s success in science: many who feel its force have no acquaintance with its role in science. In any event, Huemer’s case that one of his ways of justifying scientific appeal to parsimony doesn’t apply to e.g. the realist-nominalist debate rests on claiming that the issue between realist and nominalist is not over how many metaphysical categories there are, but over what the relationship between things and their properties is or whether “characteristics” exist (op. cit., 230). This seems precisely wrong to me. The issue is whether in addition to particulars there are universals, which are precisely a second metaphysical category. The formulation in terms of whether characteristics exist simply misses this. Characteristics might be particular- tropes or sets- or universal. Trope and set theories are usually viewed as versions of nominalism: so a disagreement over whether characteristics exist could as easily be an intramural debate among nominalists, e.g. between a trope theorist and a resemblance nominalist who does without

tropes or other characteristics (e.g. Gonzalo Rodriguez-Pereyra, Resemblance Nominalism (Oxford: Oxford University Press, 2002). And it's hard to know what to make of the formulation about the relationship between things and properties. What the relationship is depends on what properties are, and this is just the question whether properties are universals, particulars of some sort, or non-existent. So this is not the basic issue between realist and nominalist, but a "spoils to the victor" side-issue. Finally, my argument below is inter alia a counter to Huemer, since my appeal to scope could be made as well on behalf of scientific uses of the Razor. The argument involves at least a relative of Huemer's own claim that simple theories are more likely than complex on the data both explain.

¹¹ Huemer, to whom I owe part of this argument, raises a circularity concern about using this premise, but also identifies a strategy for avoiding it which I endorse (op. cit., 218).

¹² See e.g. Daniel Nolan, "Quantitative Parsimony", British Journal for the Philosophy of Science, 48 (1997), 329–43; A. Baker, "Quantitative Parsimony and Explanation," British Journal for the Philosophy of Science, 54 (2003), 245-259; Richard Swinburne, Epistemic Justification (Oxford: Oxford University Press, 2001), 83-99.

¹³ In probabilistic terms: the more of our total data the explanation explains, the higher the probability of our total data on the explanation, and so the greater the likelihood of the explanation on the data.

¹⁴ So Rodriguez-Pereyra, Resemblance Nominalism, 113-21.

¹⁵ Whether nominalist explanations do work over the full range of explananda involved in the debate over universals is a question I cannot take up here.

¹⁶ "God and the Problem of Universals," Oxford Studies in Metaphysics 2 (2006), 325-56.

¹⁷ If all attributes are relations to divine concepts and relations are themselves attributes, this can seem to touch off a nasty infinite regress. I acknowledge the problem, but the story I tell to deal with it is too long to go into here.

¹⁸ "One Step Toward God," forthcoming in the 2009 Royal Institute of Philosophy supplemental volume.

¹⁹ So e.g. Robert Stalnaker, "Possible Worlds," Nous 10 (1976), 65-75.

²⁰ George Bealer, Quality and Concept (Oxford: Oxford University Press, 1982). Russell spoke repeatedly of eliminating class-names in favor of "propositional functions." These express attributes.

²¹ Christopher Menzel, "Theism, Platonism and the Metaphysics of Mathematics," in Michael Beaty, ed. Christian Theism and the Problems of Philosophy (Notre Dame, In.: University of Notre Dame, Press, 1990), 208-29.

²² A strict conditional is true just if it cannot be the case that its antecedent is true and its consequent false; thus every strict conditional with a necessarily true consequent is true. Correspondingly, every proposition strictly implies every necessary truth, at least because it is necessary. But many necessary truths have other connections with truths implying them.

²³ A strict conditional is true just if it cannot be the case that its antecedent is true and its consequent false. Thus every strict conditional with a necessarily false antecedent is true. Correspondingly, every impossibility strictly implies everything.

²⁴ God and Necessity (Oxford: Oxford University Press, forthcoming).

²⁵ God and Necessity (Oxford: Oxford University Press, forthcoming).

²⁶ If an item's essence is just the conjunction of the attributes it has necessarily, as in Plantinga (The Nature of Necessity (Oxford: Oxford University Press, 1974), 60-4), there are none. But Fine has set out a notion of essence on which there may be some (Kit Fine, "Essence and modality," Philosophical Perspectives, 8 (1994), 1-16).

²⁷ But these seem *prima facie* to be possible: and so theists face a modal version of the problem of evil (so Theodore Guleserian, "God and Possible Worlds: The Modal Problem of Evil," *Nous* 17 (1983), 221-38). I cannot discuss this here, but I'm with those who reply by arguing that such evils are not *ultima facie* possible.

²⁸ If He sees that S would be morally unacceptable no matter what, for instance, His goodness leads Him to prevent any possible cause from actualizing S. What He prevents Himself from doing, He denies Himself the all-things-considered power to do. Non-contradictory creature-only metaphysical impossibilities- e.g. Socrates' being a fish- are impossible because God makes them so, e.g. by thinking up Socrates as He has. By doing so, God prevents His making Socrates a fish. This leaves creature-only contradictions to consider. One line to take on these is that God prevents their coming about just by thinking them up as contradictions. Another is that their being contradictions prevents His having the power to bring them about (so Aquinas, Summa Theologiae Ia, 25, 3), and prevents their coming about without cause. Another is that God is by nature repelled by contradiction, and so thinking them up as contradictions prevents His giving Himself the power to bring them about.

²⁹ If He did deny Himself this power, S would be impossible. But it would not follow that He was not omnipotent; inability to bring about the impossible does not count against omnipotence on any reasonable account of this. See my "Omnipotence," in Thomas Flint and Michael Rea, eds., The Oxford Handbook of Philosophical Theology (Oxford: Oxford University Press, 2009), 167-98

³⁰ He almost certainly does; it is hard to see how else to explain some contingent choices He has made. But the complications needed to build this into the account would not change it in any essential respect.

³¹ This is not unproblematic; it leads to a theistic version of Lewis' problem of alien properties (Lewis, Plurality, 159-65)). For some of the history, see Brian Leftow, "Against Deity Theories," Oxford Studies in Philosophy of Religion 2 (2009), 105-160.

³² Here "P" is a dummy sentence, and italicized letters like "*P*" are dummy names for propositions supposedly expressed by dummy sentences.

³³ More precisely, powers of the sort people tend to think Descartes ascribed to God. I incline to read his claims about omnipotence as less bold. See my "God, Vagueness and Logical Truth," forthcoming.

³⁴ Of course it could be that *P* is prevented in more than just the causally possible worlds, for reasons at least partly non-causal: that would not change the fact that in all causally possible worlds, $\neg P$.

³⁵ My thanks to a referee here

³⁶ I include here degenerate, one-conjunct conjunctions.

³⁷ If, say, some constructivist account of mathematics is correct, then by creating us and sustaining us and our powers of construction as we use them, God provides the truthmakers for mathematics, and His power to do so provided its possibility from all eternity.

³⁸ John Divers notes this about Lewis' view only (John Divers, Possible Worlds (London: Routledge, 2002), 47-50). My thanks to a referee for pointing me to Divers.

³⁹ So Rudolph Carnap, Meaning and Necessity (Chicago: University of Chicago Press, 1947).

⁴⁰ So Robert M. Adams, "Theories of Actuality," Nous 8 (1974), 211-31.

⁴¹ So Alvin Plantinga, The Nature of Necessity (Oxford: Oxford University Press, 1974), 44.

⁴² Even if S' being possible makes S* possible ad infinitum, we can still raise the question "why are any states of affairs in this regress possible, rather than none?" No appeal to a single state of affairs in this series is a good answer to this, since each will have been made possible by still another, whose possibility is presupposed- and if we presuppose some possibility, we are not able to answer to question "why any possibility rather than none?" Nor can we use any portion of the series or the series as a whole to answer, for the same reason.

⁴³ As e.g. in D.M. Armstrong, A Combinatorial Theory of Possibility (Cambridge: Cambridge University Press, 1989).

⁴⁴ So Robert Stalnaker, "Possible Worlds," Nous 10 (1976), 65-75.

⁴⁵ David Lewis, On the Plurality of Worlds (London: Basil Blackwell, 1986).

⁴⁶ "Against Deity Theories," Oxford Studies in Philosophy of Religion 2 (2009), 105-160.

⁴⁷ This being a claim common to "Aristotelian" realism and non-concept forms of nominalism.

⁴⁸ If there are no individual essences, what makes it possible that a particular exist is not a singular possibility precisely of it, but the general possibility of a type of individual, of which it turns out to be an instance. I suggest that the singular possibility of individual permissions is not (so to speak) pre-written into God's power to permit, but the power's existing makes possible a general type of action, of which they turn out to be instances. If one held the singular possibility of permissions to be written into the divine nature, then the story would be: God's nature inherits possibility from His existence, its being possible renders it possible that God issue these permissions, so the permissions inherit possibility from God's existence, so all creature-only states of affairs inherit possibility from God's existence. So on this variant, God's existence would still be the only primitively possible state of affairs.

⁴⁹ The locus classicus is Saul Kripke, "Semantical Considerations on Modal Logic," in Leonard Linsky, ed., Reference and Modality (Oxford: Oxford University Press, 1971), 63-72.

⁵⁰ I'm indebted to a referee for this formulation.

⁵¹ Only tenseless sentences matter here; possible worlds, if there were such things, would be the tenseless skeletons of full histories including tensed truths. For suppose that possible worlds included or precluded every state of affairs whatever. Inclusion is just entailment. Precluding P is just entailing $\neg P$ (see Plantinga, "Two Concepts of Modality," Philosophical Perspectives 1 (1987), 192). If a world precluded that noon is present, then, in that world noon would never be present: that world's time would have to end before noon. If a world precluded all times' being present, it would be a tenseless or atemporal world. If a world entailed noon's being present, its history would be just an instant. If it entailed more than one time's being present, either it would include multiple temporal series or it would be impossible. All possible worlds are of the same sort. So if worlds containing single extended tensed temporal series are possible, worlds are just tenseless skeletons. They do not include or preclude everything that would be true were they actual, if they are tensed-time worlds. And sentences expressing their contents would be as the text describes.

⁵² Plantinga would have worlds be maximal states of affairs: see his "Two Concepts of Modality," Philosophical Perspectives 1 (1987), 192,

⁵³ Part of the argument is in "God and the Problem of Universals." The rest appears in God and Necessity (Oxford: Oxford University Press, forthcoming).

⁵⁴ See e.g. Jerry Fodor, Psychosemantics (Cambridge, Mass.: MIT Press, 1987), 16ff., and "Propositional Attitudes," Monist 64 (1978).

⁵⁵ So e.g. Aquinas, ST Ia 14, 7 and 19, 5.

⁵⁶ Fodor, Psychosemantics, 147-8.

⁵⁷ Ibid., 149ff.

⁵⁸ If the future is unreal and determinism is false, there is no one actual world (i.e. actualized possible world). There has instead been an actualized world-segment common to indefinitely many world-histories, and there having been that one segment is compatible with more than one possible future. Given this combination of views- appealing to theists- w* turns out to be just the common actualized segment as of the present.

⁵⁹ A referee suggested this formulation.

⁶⁰ So e.g. John Bigelow and Robert Pargetter, Science and Necessity (Cambridge: Cambridge University Press, 1990), 165.

⁶¹ Lewis, Plurality, 150-6; John Divers, Possible Worlds (London: Routledge, 2002), 106ff.

⁶² Lewis, Plurality, 71.

⁶³ We pre-philosophically talk about ways things might go; we do not pre-philosophically have views on what these "ways" are, as distinct from what their contents are, and so it is not surprising if these turn out to surprise us.

⁶⁴ My thanks to a referee for this point.

⁶⁵ Op.cit.

⁶⁶ Instead they "subsist," a term he did not well explain (op. cit.).

⁶⁷ Edward Zalta, Abstract Objects (Dordrecht ; D. Reidel, 1983); Timothy Williamson, "Bare Possibilia," Erkenntnis 48 (1998), 257-73.

⁶⁸ Lewis, op. cit., passim.

⁶⁹ So e.g. Lewis, Plurality, 73.

⁷⁰ At least, this would be a common view today. It was equally common medieval lore that God belongs to no kinds at all (so e.g. Aquinas, ST Ia 3, 5). I won't go into what lies behind this claim; suffice it to say that if it is true, then again, positing a deity adds no highest-level kinds.

⁷¹ So Menzel, op. cit.

⁷² Lewis claims to eliminate all intensional entities- e.g. propositions become for him sets of possible worlds. I doubt that this approach to intensions succeeds, but I can't take this up here. I note only that I elsewhere reduce them all to divine concepts and then eliminate these, so that theism sustains its claim to greater overall economy.

⁷³ Meinong calls his a "subsistence" quantifier. But as we have no real explanation of what that means, this hardly confers a theoretical advantage.

⁷⁴ Albeit his terminology does not sit well with the "onto" in ontology. The bloat may be greater for the historical Meinong, who had no interest in parsing away intensions; my point is that a leaner Meinongian position is possible which parallels Lewis'.

⁷⁵ Williamson, op. cit., 266.

⁷⁶ Bernard Linsky and Edward Zalta, "In Defense of the Contingently Non-Concrete," Philosophical Studies 84 (1996), 283-94.

⁷⁷ Adams, op. cit., with Rudolph Carnap and R. C. Jeffrey as precursors.

⁷⁸ Stalnaker, op. cit., and also Peter Forrest, "Ways Worlds Could Be," Australasian Journal of Philosophy 64 (1986), 15-24. Forrest's attributes are structural.

⁷⁹ Plantinga, op. cit.

⁸⁰ I'm not aware of anyone who has held this.

⁸¹ John Bigelow, "Real Possibilities," Philosophical Studies 53 (1988), 37-64; M.J. Cresswell, "The World is Everything that Is the Case," in Michael Loux, ed., The Actual and the Possible (Ithaca, N.Y.: Cornell University Press, 1979), 129-45.

⁸² See e.g William Alston, Perceiving God (Ithaca, N.Y.: Cornell University Press, 1991).

⁸³ Plantinga does not to my knowledge say. John Divers suggests that some of Plantinga's arguments commit him to this view (Possible Worlds (London: Routledge, 2002), 240).

⁸⁴ Op. cit.

⁸⁵ Op. cit., and see also John Bigelow and Robert Pargetter, Science and Necessity (Cambridge: Cambridge University Press, 1990).

⁸⁶ This is a distinct matter from knowing whether they exist. Whether it is possible to know that any metaphysical theory is true, and if so how, are perfectly general questions I can't begin to answer here. But if it is possible, and possible worlds do exist, I don't see why we couldn't know some theory which asserts the existence of possible worlds.

⁸⁷ So D.H. Mellor, The Facts of Causation (London: Routledge, 1995).

⁸⁸ Timothy Williamson, The Philosophy of Philosophy (Oxford: Basil Blackwell, 2007). 162.

⁸⁹ As Williamson notes, op. cit., 142.

⁹⁰ See also John O'Leary-Hawthorne, "The Epistemology of Possible Worlds: A Guided Tour," Philosophical Studies 84 (1996), 183-202; Robert Stalnaker, "On what Possible Worlds Could Not Be," in Robert Stalnaker, Ways a World Might Be (Oxford: Oxford University Press, 2003), 40-54. The claim about mere possibility more generally, again, is warranted by our lack of a good a priori way to distinguish the merely metaphysically possible from the metaphysically possible which is also physically possible.

⁹¹ This is not a variant "Gödelian seeing" scenario, pace O'Leary-Hawthorne (op. cit., 187), as it does not claim that God perceives an independent Platonist realm, then passes the knowledge on.

⁹² This claim has to be reconciled with the fact (and problem) of divine hiddenness. It can be, but I can't go into this here.

⁹³ Scott Shalkowski, "Conventions, Cognitivism and Necessity," American Philosophical Quarterly 33 (1996), 376.

⁹⁴Tony Roy, "Worlds and Modality," Philosophical Review 102 (1993), 337, 338, 339. See also Michael Jubien, "Problems with Possible Worlds," in David Austin, ed., Philosophical Analysis (Boston: Kluwer, 1988), 303, 304.

⁹⁵ Lewis would demur (Plurality, 73-4), but not plausibly.

⁹⁶ My thanks to Thomas Crisp, the referees, and audiences at Queens University Belfast, Trinity College Dublin, the University of Birmingham and the University of Notre Dame for comments.