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ACTUALISM AND THISNESS*

1. THE THESIS

My thesis is that all possibilities are purely qualitative except insofar as they involve individuals that actually exist. I have argued elsewhere (Adams, 1979b) that thisness holds a place beside suchness as a fundamental feature of reality—and not only of reality but also of some possibilities. There are facts, and also possibilities, that are not purely qualitative. The thesis of the present essay is that all the non-qualitative possibilities are possibilities for actual individuals. I will begin by trying to explain the meaning of this claim (Section 1); then I will defend it (Section 2), and develop some of its implications for modality, of which the chief is that what modal facts de re there are depends on what individuals actually exist (Sections 3 and 4).

1.1 Essences

We may be aided in understanding my thesis by contrasting it with an opposing position. Alvin Plantinga has proposed (very elegantly) to assure that there are all the possibilities $de\ re$ there could have been, by holding that while there are not all the individuals there could possibly have been, there are essences of all the individuals there could possibly have been (Plantinga, 1976). An essence of an individual a, in Plantinga's sense, is a property that a would possess in every possible world in which a would exist, and that no other individual would possess in any possible world. It is a property that is essential to a and that no other individual could possess.

A possibility is presumably a proposition that could have been true or a state of affairs that could have obtained. Plantinga and I cannot consistently say that a possibility for an individual that does not actually exist is a proposition or state of affairs that has that individual as a constituent, for we think that there are no such individuals (though there could have been individuals other than those that there actually are). But maybe a possibility for a non-actual

individual could be a proposition or state of affairs that has an essence of that individual, rather than the individual itself, as a constituent. From this point of view, whether there are non-qualitative possibilities for non-actual individuals depends on whether there are non-qualitative essences of non-actual individuals; I think that with some possible qualifications, there are not. Plantinga has not committed himself as to whether there are non-qualitative facts at all; but he is committed to the view that there actually exist all the essences there could have been, including non-qualitative essences if there could be any of them.

The chief reason he gives for affirming this is that "Properties, like propositions and possible worlds, are necessary beings" (Plantinga, 1976; in Loux, 1979, p. 268). I agree that it is plausible to think of properties (and also propositions and perhaps possible worlds) as existing necessarily, if we think of them as constituted purely qualitatively. I shall argue, however, that there is good reason to deny that non-qualitative properties are necessary beings (cf. Fine, 1977, p. 129f.).

Three types of essences there might be will concern us. (i) The most important are thisnesses. A thisness, in the sense intended here.² is the property of being a particular individual, or of being identical with that individual. It is not the property we all share, of being identical with some particular individual or other. But my thisness is the property of being me; that is, of being identical with me. Your thisness is the property of being you. Jimmy Carter's thisness is the property of being identical with Jimmy Carter (not: of being called "Jimmy Carter"); and so forth. All thisnesses are essences in Plantinga's sense, and every essence of an individual is necessarily coextensive with the thisness of that individual. Plantinga seems to imply that there are thisnesses, as well as other essences, of all the individuals there could possibly have been, including many individuals that do not actually exist (Plantinga, 1976; in Loux, 1979, pp. 268f., cf. 262f.). I have argued in an earlier paper (Adams, 1979b) that there could be thisnesses that would not be equivalent to any purely qualitative property, and that thisnesses are therefore primitive in the sense of being in principle distinct from all purely qualitative properties. Here I will argue that there are no thisnesses of individuals that never actually exist-although of course there could have been other individuals than those that there are, and if they had existed they would have had thisnesses. I think this is a necessary truth; in no possible world would there be thisnesses of individuals that do not exist in that world.

- (ii) A qualitative essence would be a purely qualitative property that is an essence. Suppose, for example, there is some conjunction C (perhaps infinite) of purely qualitative properties that are jointly possessed, in actual fact, by me alone, and that could not possibly be jointly possessed by any other individual. In that case the property of possibly possessing C (that is, of being something that possesses or could have possessed C) could plausibly be regarded as a qualitative essence of me. Part of what I have argued in Adams, 1979b is that there could be individuals that would not have qualitative essences. Indeed we do not know that we have them.
- (iii) Even if we do not have qualitative essences, perhaps we have α -relational essences in addition to our thisnesses. ' α ' is employed here, following Plantinga's useful convention, as a proper name of the actual world (α would still be α even if it were not actual, though of course it would not be the actual world if it were not actual). By ' α -relational essence' I mean an essence that has the form, bearing R to a_1, a_2, a_3, \ldots , where a_1, a_2, a_3, \ldots are certain individuals that exist in α , and R is a relation such that bearing R to some (unspecified) x_1 , x_2, x_3, \ldots or other is a purely qualitative property. For example, let the sperm and egg cells from which I sprang be named "Dick" and "Jane" respectively. I think some philosophers would say that the property of being the sole person that sprang from the union of Dick and Jane is an essence of me. This would be an α -relational essence. It would also be a non-qualitative essence, because it involves the thisnesses of Dick and Jane. And though if it really is an essence it is necessarily coextensive with my thisness. I think it is distinct from my thisness. It is the property of bearing a certain relation to Dick and Jane, whereas my thisness is the property of bearing a certain relation (identity) to me.

If there are qualitative or α -relational essences at all, perhaps there are such essences of non-actual individuals. That is, perhaps there are properties, not actually possessed by any individual, which would be such essences of any individual that had them. I am not denying that. And if I have a qualitative or α -relational essence, it might have existed without me. The property of being the sole person that sprang from the union of Dick and Jane, for instance, is a property that could

have existed, unexemplified, if Dick and Jane had existed but never come together and I had never existed. And any qualitative essence could have existed, as an unexemplified abstract object, without the individual to which it belongs. There is nothing in this that is inconsistent with the thesis that all possibilities are purely qualitative except insofar as they involve individuals that actually exist.

We will not need a special classification for another possible type of essence that plays a part in Plantinga's argument. If P is a property and w is a possible world, then the world-indexed property P_w is the property of having P in w. Thus P_α (the " α -transform" of P) is the property of having P in α (the actual world). Plato, for example, has the property of being-a-great-philosopher-in- α . Plantinga holds that α -transforms, and world-indexed properties in general, are essential to whatever individuals have them; and further, that if P belongs to exactly one individual in w, P_w is an essence of that individual.

We need not pay separate attention here to world-indexed essences for the following reason. A world-indexed essence, P_w , could form the basis of a non-qualitative possibility not founded on actual individuals only if one or both of two conditions obtained – namely if (i) P were neither purely qualitative nor an α -relational property, or if (ii) w were a possible world not constituted by purely qualitative propositions alone, nor by purely qualitative propositions plus propositions about individuals that exist in α . But I deny that there are any properties or possible worlds of these sorts. Of course it is open to anyone to argue against me on this point by trying to show how there could be non-qualitative propositions not founded on actual individuals. But until that is done it would be begging the question against me to appeal to world-indexed essences in order to explain how there could be non-qualitative possibilities not founded on actual individuals.

1.2 Singular Propositions

Another notion that will play an important part in our discussion is that of a singular proporision. A singular proposition is, roughly, a proposition that involves or refers to an individual directly, and not by way of its qualitative properties or its relations to another individual. A proposition that has an individual x itself, or a thisness of

x, as a constituent would be a singular proposition about x. A proposition that has a qualitative or α -relational essence of x as a constituent, however, would not as such be a singular proposition about x. If there were singular propositions about non-actual individuals, possibilities for non-actual individuals could be founded on them. But the reasons I will give for thinking there are no thisnesses of non-actual individuals will also be reasons for thinking there are no singular propositions about non-actual individuals.

1.3 Actualism

My thesis is an actualist thesis. Actualism is the doctrine that there are no things that do not exist in the actual world. The actualist agrees, of course, that there could have been things that do not actually exist; in particular, there could have been individuals other than those that there are. But he disagrees with those (whom we may call "possibilists") who think this point can be put, in sober metaphysical truth, by saying that there are infinitely many possible individuals that do not exist in the actual world but that do exist in other possible worlds. Possibilists affirm, and actualists deny, that possible but non-actual entities can enter into relations and have properties, and can therefore be values of variables in the logic of predicates.

If possibilism is true, my thesis is false. If there is a non-actual individual, there is also its thisness, the property of being identical with that individual, and there are presumably all the singular propositions, and all the non-qualitative possibilities, about that individual that there would be if the individual actually existed. I believe, however, that possibilism is false and actualism is true (cf. Adams, 1974). I will not argue for that here, but will argue that if actualism is true, then there are no thisnesses of non-actual individuals, no singular propositions about them, and no possibilities that are non-qualitative except insofar as actual individuals are involved. It is indeed one of the substantive differences between actualism and possibilism, in my opinion, that actualism restricts the entry of thisness into mere possibility in a way that possibilism does not.

1.4 Construction

What I have said in Section 1.3 is subject to one important qualification. The entities, relations, and predictions affirmed by possibilists and denied by actualists are to be understood as primitive features of a metaphysical scheme. For suppose definitions could be devised by which a "non-actual individual" with many properties could be logically constructed out of things that actually exist. A "hard" actualist (cf. Adams, 1974, p. 224) might insist on rejecting such definitions. But that would be sticking at a verbal point. The actualism that I espouse might be more accurately characterized, therefore, as the doctrine that there is (tenselessly) nothing but what (tenselessly) exists, and whatever is logically constructed out of things that actually exist.

The most important metaphysical issues in this area will have to do with the primitive entities and primitive facts. If we want to know whether all possibilities are purely qualitative except insofar as they involve actual individuals, we want to know whether the possibilities are purely qualitative at the primitive level, and whether they involve actual individuals at the primitive level. For if the primitive data for the construction are purely qualitative or α -relational, a constructed possibility will not be non-qualitative, at bottom, except insofar as it involves actual individuals.

1.5 Illustrations

We may be able to understand the meaning of my thesis better and more concretely with the aid of two examples of its consequences. (A) The thesis makes a particularly large and clear metaphysical difference in a case of the following sort. I have argued (in Adams, 1979b) that there could be a pair of individuals that would be qualitatively indiscernible from each other (having all their purely qualitative properties in common), and that such individuals would have, in effect, no qualitative essence. Any purely qualitative property that one of them could have had, the other could have had. Let us suppose that there could have been a pair of individuals, qualitatively indiscernible from each other, which do not exist in α , and neither of which could have borne any relation to any individual that

does exist in α that the other could not have borne to that same individual. It will be convenient to introduce an abbreviation and say that any pair of individuals meeting those conditions would be an "I-pair." Since the members of an I-pair would differ from each other neither in the qualitative nor in the α -relational properties they could have had, they would have neither qualitative nor α -relational essences. (Here we must remember that ' α ' is a proper name of a possible world that is only contingently actual. To say that there could have been individuals that would not have had a-relational essences is not necessarily to deny that if a world w, in which such individuals exist, had been actual, they would have had w-relational essences.) By considering the possibility of individuals that would not differ α -relationally in what could be true of them, we exclude the involvement of actual individuals. By supposing also that they would not differ qualitatively in what could be true of them, we set up a case in which the difference between qualitative and non-qualitative possibilities can be clearly manifested. These two features together make a case for which particularly interesting consequences follow from the thesis that all possibilities are purely qualitative except insofar as they involve actual individuals.

If an I-pair existed, there would be a difference between possibilities regarding the one member and possibilities regarding the other-for example, between the possibility of this one ceasing to exist and the possibility of that one ceasing to exist. And the difference between these possibilities could not be stated in purely qualitative terms. (That is also part of what I tried to show in Adams, 1979b.) Given that the members of an I-pair do not actually exist, however, it follows from the thesis of the present paper that there is not, in fact, any difference between possibilities regarding the one and possibilities regarding the other. There is not actually any such thing as a difference between the possibility of this one ceasing to exist and the possibility of that one ceasing to exist. For no such difference could be understood either qualitatively or in terms of the involvement of actual individuals, since there is neither a qualitative nor an α -relational difference between the members of an I-pair.

(B) I find it natural, and others may at least find it vivid, to think of my thesis in a theological context. I suppose that God, in deciding whether and how to create a world, knew all the kinds of things that could have existed or happened. That is, he had before His mind a

complete array of all the suchnesses or purely qualitative properties that could possibly have been exemplified. But did He also have before His mind an infinite array of merely possible individuals, or thisnesses of them, or singular propositions about them, or possibilities regarding them, in such a way that He could have chosen from a number of individuals, possibly indiscernible in every purely qualitative respect, one to be created rather than another?⁴ I think not. God can create a woman of such and such a qualitative character. And when He has done so, she is an individual and has a thisness. which is the property of being her; and there may be non-qualitative possibilities regarding her. But that property and those possibilities are parasitic on her actual existence. They did not pre-exist her in a storehouse of properties and possibilities eternally and necessarily at God's disposal. There are no non-qualitative possibilities except insofar as they involve individuals about whom it is a fact, and not an uncertainty still up for decision, that they are actual individuals.⁵

2. THE ARGUMENT

My thesis rests on the view that there is, so to speak, no ontological foundation for non-qualitative possibilities except in actual individuals. What this means can perhaps best be seen in the example of I-pairs. I claim that there is no way in which there can be possibilities for one member of an I-pair that are distinct from similar possibilities for the other member. For if there are such possibilities, how do they differ from similar possibilities for the other member? Not qualitatively, nor in their relation to actual individuals, for it is part of the definition of an I-pair that there is neither a qualitative nor an α -relational difference between what could be true of one member and what could be true of the other. An actualist cannot be satisfied with the answer that the possibilities differ simply in that this possibility is related to this member of the pair in the way that that possibility is related to that member of the pair, and that this difference is primitive and not further analyzable. For the members of an I-pair do not actually exist, and therefore they cannot enter into any primitive relation, according to actualism.

It remains to consider the suggestions that the possibilities in question could differ in their relation to singular propositions about the members of the I-pair, or in their relation to the thisnesses of the members of the I-pair, or in their relation to some other sort of non-qualitative essences of the members of the I-pair. I shall argue that none of these foundations for distinct non-qualitative possibilities is available – first by trying to show that there are no thisnesses of any individuals that do not actually exist, and that there are no singular propositions about non-actual individuals; then by arguing that it is not plausible to suppose that there is another sort of non-qualitative, non- α -relational essence that could belong to non-existent individuals. In effect I shall be arguing both that there are no essences at all that could be essences of members of an I-pair, and more generally, that there is no way in which there can be non-qualitative possibilities except by relation to actual individuals.

It is hard to see how an actualist could consistently maintain that there is a thisness of a non-actual individual. For if there were one, it would be the property of being identical with that individual. To be the property of being identical with a particular individual is to stand, primitively, in a unique relation with that individual. This relation between an individual and its thisness is the crux of the argument. It would be absurd to suppose that being the property of being identical with me could be a purely internal feature of my thisness, not implying any relation to me. The relation between an individual and its thisness is essential to both of them. My thisness is a property that I would have in every possible world in which I would exist-but equally, my thisness could not exist without being mine. It could not exist without being the thisness of Robert Merrihew Adams. So if there were a thisness of a non-actual individual, it would stand, primitively, in a relation to that individual. But according to actualism non-actual individuals cannot enter primitively into any relation. It seems to follow that according to actualism there cannot be a thisness of a non-actual individual.

It would not be plausible to suppose that the relation between an individual and the property of being identical with that individual need not be primitive, but could be analyzed in terms of that property's relations to other individuals or to purely qualitative properties. Moreover this supposition would not provide thisnesses for members of I-pairs. For by the definition of an I-pair there are not actually any individuals, nor any purely qualitative properties, that are related differently to the two members of an I-pair. Hence a thisness cannot be related to one member of an I-pair rather than the

other by virtue of any relation to actual individuals or purely qualitative properties. And in general it seems evident that a relation constructed from other relations to individuals (which must be actual individuals, according to actualism), and to purely qualitative properties, cannot provide a foundation for non-qualitative possibilities that are not founded in actual individuals.

A similar argument shows that an actualist must deny that there are singular propositions about non-actual individuals. A singular proposition about an individual x is a proposition that involves or refers to x directly, and not by way of x's qualitative properties or relations to another individual. This relation is surely part of what makes the proposition what it is; it is essential to the proposition, and the proposition could not exist without being directly related to x. But according to actualism a proposition cannot bear such a relation to any non-actual individual.

I believe these arguments are conclusive so long as the thisness of an individual x is conceived, as I conceive it, as the property of being identical with x, and so long as a corresponding conception of singular propositions is maintained. But some may object that these conceptions are too narrow, and that thisnesses have sometimes been conceived, historically, as non-qualitative essences, or perhaps more broadly as non-qualitative entities, of a different sort, which could exist without the individuals whose thisnesses they are. According to such an alternative conception I depend on my thisness in a way that it does not depend on me; for certainly I could not have existed without it. And it might be held that singular propositions should be conceived as having thisnesses in this alternative sense as constituents.

The crucial question here, metaphysically, is whether there are any non-qualitative essences or other non-qualitative entities that could play this role. We are particularly concerned to know whether there are any that could do it for non-actual individuals that would have no qualitative or α -relational essence, such as members of an I-pair. I shall argue that there are not. In doing so, to avoid confusion, I shall reserve the term thisness of x for the property of being identical with x, and use hacceity of x for the supposed non-qualitative entities that could largely play the part of a thisness of x even if x never existed.

It is not easy to say what haecceities would be. That is indeed the

chief objection to them. Suppose H* is my haecceity. What would H* have been if I had never existed? It would be misleading at best for an actualist to claim that H* would have been my haecceity in that case, for he thinks there would have been no me for it to be related to. But one might hold that H* would have been something that could have been a haecceity of an individual, and that could not have been a haecceity of different individuals in different possible worlds. That would fit it to represent me in worlds in which I myself would not exist. Likewise it might be claimed that there are infinitely many such entities in the actual world, deputizing here for individuals that would exist in other possible worlds. But what would these entities be?

If H^* existed and I never did, I do not see how H^* or anything else could be the property of being identical with me; for a primitive relation to me is surely essential to that property. But maybe there could be the unactualized property of having H^* as a haecceity. Perhaps H^* itself would (self-referentially) be this property; or perhaps H^* would not be a property at all. Even if having H^* as a haecceity were necessarily coextensive with being identical with me, I think they would be distinct.

Here we can see clearly the nature of the difference between a theory of thisnesses, in my sense, and a theory of haecceities that could exist without their individuals. On my view the individuals themselves provide the basis for non-qualitative facts, by their identity and distinctness. In the theory of haecceities this basis is provided instead by the haecceities, and they are necessarily existent entities (perhaps abstract entities) which are not qualitative properties. Specifically, the basis for non-qualitative facts is provided by the incommunicability of the haecceities—that is, by their inability to bear a certain relation to more than one individual in the same or in different possible worlds. Hence on my view the fundamental non-qualitative properties are of the form, being identical with x; but on the other view they are of something like the form, having h as a haecceity.

The nature of the supposed haecceities is still very obscure, however. To see this, we may begin by thinking again of an I-pair. Make their description as detailed as you like, provided only they remain indiscernible with respect to their qualitative properties and their relations (if any) to actual individuals. Now ask yourself, which member of the I-pair would you rather have exist, if only one of them

were to exist. The question is absurd, not merely because you have no reason to prefer one to the other, but because you have no way of picking out or referring to one of them rather than the other, even in your own mind. You can of course say, "Let us call one of them 'Castor' and the other 'Pollux," but that does not enable you to refer to one of them rather than the other, any more than the variables in

$$(\exists x)(\exists y)(x \text{ is a horse } \& y \text{ is a horse } \& x \neq y)$$

refer to one horse rather than another. You cannot pick out one member of an I-pair, rather than the other, because you have no acquaintance with any haecceity (or indeed any essence at all) of either of them.

"Of course not; but is that just an unfortunate limitation of our cognitive powers?" you may ask. I think it is more than that; at any rate I cannot see how even a superhuman mind could pick out one of such a pair of indiscernible non-actual objects, or be acquainted with haecceities of them. Of course that does not prove that there are no haecceities of such non-actual objects, but such obscurity surely makes belief in them less attractive.

It may be objected that we do seem to apprehend some singular propositions about non-actual individuals – namely, about fictitious individuals; and that we must therefore be acquainted with haecceities of fictitious individuals. Must we not, for example, be acquainted with a haecceity of Sherlock Holmes in order to understand the proposition that Sherlock Holmes was a detective? This is not the place to try to give a positive account of the role of proper names in fiction, but I think there is good reason to deny that there are primitive haecceities of fictitious individuals. For consider the following sequence of events, which surely could have happened, though probably it did not.

In 1870, before Sir Arthur Conan Doyle had written any of his famous stories, a retired schoolteacher in Liverpool wrote a story called "The Hound of the Joneses" about an amateur detective named "Sherlock Holmes." And the name was not the only coincidence. "The Hound of the Joneses" was not a very good story, but the characteristics of the detective in it were so similar to those that Sherlock Holmes has in Conan Doyle's stories that if Doyle had written and published "The Hound of the Joneses" in 1920, it would certainly have been accepted (if not applauded) as a story about

Sherlock Holmes. As it was, however, it was destined for oblivion. It was never read by anyone but its author, who died in 1872. The only manuscript was burned by the author's niece when she cleaned the house in 1873, and it never had the slightest influence on Conan Doyle. Now the question I want to raise is whether "The Hound of the Joneses" was a story about Sherlock Holmes, or in other words whether the detective in "The Hound of the Joneses" was Sherlock Holmes—that is, whether he was identical with that prince of fictitious detectives known to us from Conan Doyle's stories.

Three answers seem possible. (i) The detective in "The Hound of the Joneses" certainly was Sherlock Holmes, because of the qualitative similarity he bears to the hero of Conan Doyle's stories. (ii) The protagonist of "The Hound of the Joneses" may or may not have been Sherlock Holmes, depending on whether its author and Doyle happen to have attached the same haecceity (or equivalent haecceities) to their heroes. (How likely it is that they hit on the same haecceity will presumably depend on the mechanism by which we are acquainted with haecceities.) (iii) Sherlock Holmes (the famous Sherlock Holmes, that is) certainly does not appear in "The Hound of the Joneses," because it is a necessary condition of a story's being about Sherlock Holmes that it be appropriately connected by historical influences to Conan Doyle's stories.

Of these answers the second seems to be the one that ought to be given by those who believe there are primitive haecceities of fictitious individuals. But I think it is absurd, and the third answer is pretty clearly the right one. This suggests that such individuality as fictitious individuals have is parasitic on the individuality of their (actual) authors.

Even the incommunicability of haecceities, which is supposed to provide a basis for non-qualitative facts, is mysterious. If relation to a particular individual is not essential to haecceities, what keeps God from using the same haecceity twice, to create two different individuals with the same haecceity, even in the same world? Why couldn't Woodrow Wilson and Harry Truman, for example, have had the same haecceity? Was Wilson's haecceity "used up," perhaps, in making Wilson? Someone who holds a theory of haecceities may reply that these questions are silly, because the central point of his theory is the postulation of haecceities as entities that are incommunicable in the relevant respects. And no doubt it is an analytic

truth that nothing is a haecceity unless it is incommunicable in the indicated sense. But that does not answer the question about the entities that are supposed to be haecceities, what it is about them that makes them incommunicable and thus enables them to count as haecceities.

Haecceities (as distinct from thisnesses) are postulated as "something, we know not what" to fill some metaphysical role. Sometimes they have been postulated to play a part in a theory according to which properties—indeed universals—are constituents of which individuals are (at least partly) composed. Such a theory naturally gives rise to a problem of individuation: what keeps an individual from being a (complicated) universal? What must be added to the universals that are constituents of the individual, to particularize or individuate it? The haecceity is postulated as a constituent of the individual, to perform this individuating function. (On this theory the fundamental non-qualitative properties would be of the form, having h as a constituent, where h is a haecceity.)

The idea of the haecceity as a constituent of the individual may help to explain why the haecceity could exist without the individual but the individual could not exist without the haecceity; for such a relationship often obtains between an individual and one of its constituents. But the nature of this constituent is still a mystery. Indeed another problem may be mentioned here that seems quite acute on this theory. Presumably every haecceity is compatible with some but not all consistent qualitative properties. For example, I am a person but could not possibly have been a musical performance. My haecceity constituent must therefore be, necessarily, capable of being combined with personhood but incapable of being combined with the property of being a musical performance. But what is the ground of this necessary capacity and incapacity? We cannot explain them by pointing out that I can be a person but could not have been a musical performance; for my modal properties are supposed to be explained by those of my haecceity, since the latter would exist and have its modal properties even if I never existed and had no properties. It may be pointed out that there is a great categorial difference between persons, as substances, and musical performances, as events. But this only pushes the problem to a deeper level, since there is (as I argued in Adams, 1979b, pp. 14, 23) as much reason to postulate nonqualitative essences of events as of substances. If my haecceity is an entity independent of me, and distinct from all qualitative properties (including the property of substantiality), what is it about this entity by virtue of which it could join with substantiality, but could not join with eventhood, to form an individual? I do not see an answer to this question.

Moreover I do not believe that properties are constituents of which individuals are wholly or partly composed. If we do not think of individuals as composed in that way, we will not need to postulate a special constituent to "individuate" them or keep them from being universals. Neither do we need a special constituent to make them identical with themselves or distinct from each other. Those can be seen as primitive relations of the individuals to themselves and to each other. Of course this presupposes that the individuals themselves actually are given; for an actualist it presupposes that they actually exist.

The idea of non-qualitative facts has suffered from its historic association with the idea of a mysterious individuating constituent of individuals. Perhaps in order to avoid such obscurity some have been inclined to see the world as constituted by purely qualitative facts. But we can have a primitive thisness, with much less mystery, as the property of being identical with a certain individual, if we do not suppose that the thisness could exist independently of the individual. The property of being identical with me can be thought of as formed by a partial abstraction (innocent, so far as I can see) from the proposition that Robert Merrihew Adams is identical with me. Or perhaps my thisness could be conceived as the ordered pair whose first member is the relation of identity and whose second member is me. In that case I would be a constituent of my thisness, rather than my thisness of me, and it would be particularly obvious that my thisness could not have existed if I had never existed.

The arguments for non-qualitative facts are directly arguments for the non-qualitative character of properties or facts of identity and non-identity with given individuals (Adams, 1979b), and thus give rise naturally to the conception of thisnesses in my sense. That conception also provides answers to questions corresponding to important perplexities that we found in thinking about haecceities. If my thisness is the property of being identical with me, the incommunicability of thisnesses is easily understood, because it follows from the logical character of identity that a property of the form, being identical with

x, cannot be possessed by more than one individual in the same or in different possible worlds. If we understand thisnesses as identities of actually existing individuals, moreover, we can give a fairly plausible account of why my thisness could not have been combined with the property of being a musical performance. The explanation is that I am (in fact) a person, and there are necessary conditions of transtemporal and trans-world identity which follow (perhaps analytically) from the concept of a person and which entail that no musical performance could have been the same individual as one that is in fact a person—from which it follows that no musical performance could have had the property of being identical with me, which is my thisness (Adams, 1979b, p. 24f.).

3. OUR POSSIBLE NON-EXISTENCE AND ITS LOGIC

3.1 An Objection

I hold that there are no things that never exist. No such things have properties or enter into relations. I hold further that there are no thisnesses of non-actual individuals, and no singular propositions about them. And I hold that these are necessary truths. But now consider a singular negative existential proposition—for example, the proposition that I never exist. That proposition expresses a logical and metaphysical possibility, for I am not a necessary being. Doesn't it follow, then, that there is a possible world in which the proposition is true? But a proposition must be in order to be true. So it seems there is a possible world in which there is a singular proposition (indeed a true one) about an individual (me) that never exists in that world—contrary to what I have claimed (cf. Plantinga, 1974, pp. 144–148). Moreover it seems that in that world this individual that never exists enters into a relation (non-identity) with all the things that do exist in that world—again contrary to what I have claimed.

At this point we face a temptation. If we believe that I have a qualitative or an α -relational essence, we could agree that if I never existed there would be no singular propositions about me, in the strict sense of 'singular proposition' that I have adopted, but we could maintain that if I never existed there would still have been propositions involving my qualitative or α -relational essence. Among

such propositions, at least one would presumably be equivalent to the proposition that I do not exist, and the possibility of my non-existence could be explained in terms of the possible truth of that proposition. Similarly, my non-identity with the individuals that would exist in a world in which I would not exist could be explained in terms of their relation to my qualitative or α -relational essence. This solution to the problem would yield a neater and easier basis for modal logic, in some ways, than we shall get by rejecting the temptation.

Nevertheless I think it is wise to reject it. As to qualitative essences, we do not know that we have them. As to α -relational essences, it is at least philosophically controversial whether we have them; and if we do have them, they probably involve individuals that would not exist in some of the possible worlds in which we would not exist. In those worlds our α -relational essences would no more exist than our thisnesses, and they could therefore not be used to explain the possibility of our not existing in those worlds. Thus it seems that we cannot *count* on qualitative or α -relational essences in solving this problem. So I will set the temptation aside, and assume henceforth that our possible non-existence is to be accounted for in terms of thisnesses and singular propositions that would not exist if we did not exist.

In reply to this objection I deny, then, that It is possible that p^{γ} always implies that the proposition that-p could have been true. Philosophers have often found it natural to characterize possibilities and necessities in terms of what propositions would have been true in some or all possible situations (or possible worlds, as we like to say). This seems harmless enough so long as it is assumed that all propositions are necessary beings. But it is misleading if (as I hold) some propositions exist only contingently. From an actualist point of view, modalities (especially non-qualitative modalities) are not to be understood in terms of a non-modal property (truth) that propositions could have had, but in terms of modal properties that actually existing entities do have. To say that I might never have existed is not to say that the proposition that I never exist could have been true. There is such a proposition; but if I ever exist it is false, and if I never existed it would not be true because it would not exist. To say that I might never have existed is to say something about the modal properties that I actually have - and by implication about the modal properties

that my thisness, and the proposition that I exist, actually have. It is equivalent to saying that I am a contingent being, that my thisness is not necessarily exemplified, and that the proposition that I exist is not a necessary truth. It seems to me evident that these entities all exist and actually have these modal properties; but I have argued that if actualism is correct, none of them would have existed or had any properties if I had never existed. I conclude that an actualist should hold that whether there are possibilities about an individual depends on whether there actually are propositions about the individual, rather than on whether there would have been such propositions if the possibilities in question had been realized.

Similarly, it is true that if I never existed the things that did exist would not be identical with me, but that is not to say that I would enter into a relation of non-identity with them. It is rather to say that the proposition that I would in that case be identical with them is false; and that proposition is one that actually exists but would not exist if I never existed. The foundation of the fact that things that might have existed if I never did would not be identical with me is not in a relation that they would bear to me, but rather in the logic of identity together with my actual possession of the property of being something that might never have existed even if some things did exist.

3.2 Truth at a World

Contemporary treatments of modality make so much use of the notions of possible worlds, and of propositions true and false in (or at) such worlds, that we can hardly rest content with the solution proposed in Section 3.1 until we see more clearly what it implies about a possible worlds semantics for the modal notions with which we are concerned. In beginning to develop such implications, however, I wish to state plainly that I do not pretend to be giving a complete formulation of a modal logic, or of a semantics for a modal logic – much less to be proving the completeness of anything. My aim is rather to clarify and justify the metaphysical constraints I think a modal logic must satisfy if it is to be suitable for the understanding of possibility and necessity that interests us here.

If there are any possible worlds, actualism implies that they, like anything else, must be, or be constructed from, things that exist in the actual world. More than one actualistic treatment of possible worlds is available, no doubt; but as a working hypothesis let us assume that possible worlds are, or are constructed from, maximal consistent sets of actually existing propositions. Such sets may be called "world-stories." They are consistent in the sense, not merely that there is no provable contradiction in them, but that all the propositions in each world-story could possibly be true together; 'possibly' is accepted as a primitive here. The intuitive idea behind calling the world-stories "maximal" is that for every proposition p, each world-story contains either p or the negation of p. This idea needs to be modified in some ways; two limitations on the completeness of world-stories will concern us here.

(i) In a typical non-actual world there would exist some individuals that never exist in the actual world (cf. Section 4.1 below). If such a world were actual, there would be singular propositions about those individuals, and some of them would be true. But no such propositions are included in the world-stories of such worlds, since no such propositions actually exist. The world-stories therefore do not include all the propositions that would exist and be true if the corresponding worlds were actual. Some world-stories may not even contain enough to determine a world completely. I think there could be a pair of possible worlds that differed from each other only by the interchange of two individuals (or sets of individuals) that do not exist in the actual world (Adams, 1979b, p. 22f.; cf. Section 4.4 below). The only propositions that would be true in one of those worlds and false in the other are singular propositions that do not exist in the actual world. Therefore both these worlds are represented by a single world-story that does not discriminate between them. I said there "could be" such a pair of worlds rather than there "is" one, because I believe there is no more of non-actual possible worlds than is given by their world-stories. In this sort of case the world-story gives us a type of world rather than a completely determinate world. Out of public and private habit I shall continue to speak of "possible worlds." but when I do, it should be understood that some of the "worlds" are types that could be further differentiated by the addition of singular propositions about individuals that do not exist in the actual world. This may be less than we wanted in the way of possible workds, but actualist intuitions make extremely plausible the claim that it's all there is. Of course nothing that has been said here keeps

the possible worlds or world-types from being completely determinate in every *purely qualitative* respect.

(ii) Intuitively, a world-story should be complete with respect to singular propositions about those actual individuals that would still be actual if all the propositions in the story were true, and should contain no singular propositions at all about those actual individuals that would not exist in that case. For the propositions would not exist and therefore could not be true, if the individuals did not exist. Let us say, therefore that if w is a set of propositions, and s is the set of all the actual individuals that w contains any singular propositions about, and p is a singular preposition that is exclusively about one or more members of s, then w is not a world-story unless w includes either p or its negation. Furthermore, if a world-story contains any singular proposition at all about an individual i, it must contain the proposition that i exists. But a consistent set of propositions, otherwise maximal, still counts as a world-story if it contains no singular propositions at all about one or more actual individuals, provided that the existence of those individuals is not entailed by any propositions that are included in the world-story. The singular proposition that I exist, for example, may entail the singular proposition about my mother, that she exists. If so, every world-story that includes the former proposition must also include the latter.

A world-story that includes no singular proposition about me constitutes and describes a possible world in which I would not exist. It represents my possible non-existence, not by including the proposition that I do not exist but simply by omitting me. That I would not exist if all the propositions it includes, and no other actual propositions, were true is not a fact internal to the world that it describes, but an observation that we make from our vantage point in the actual world, about the relation of that world-story to an individual of the actual world.

Let us mark this difference in point of view by saying that the proposition that I never exist is (in the actual world) true at many possible worlds, but in none. Only propositions that are included in a world-story are true in the world it describes. Among actual propositions they are the ones that would be true if that world were actual. Thus it is true at possible worlds in which Napoleon would exist and I would not, that I am not identical with Napoleon; but that proposition is not true in those worlds, because it would not exist in them (and I would not enter into any relation of non-identity if one of them were actual).

In Section 3.1 I argued that whether there are possibilities about an individual depends on whether there actually are propositions about the individual, rather than on whether there would have been such propositions if the possibilities in question had been realized. This conclusion can be incorporated in a possible worlds semantics by stating the conditions for the truth of modal propositions in terms of truth at a possible world instead of truth in a possible world. ' $\diamond \sim$ (I exist)' ['It is possible that it be not the case that I exist'] should turn out to be true in our modal logic. Therefore, since ' \sim (I exist)' is not true in any possible world, we should not conceive of $\lceil \diamond p \rceil$ as true if and only if $\lceil p \rceil$ is true if and only if $\lceil p \rceil$ is true at some possible world; and similarly $\lceil \Box p \rceil$ is true if and only if $\lceil p \rceil$ is true at all possible worlds.

If the notion of truth at a possible world is going to play such a central role in our modal logic, we shall have to give a more precise account of it. Our first inclination may be to say that what is true about me at a world in which I do not exist is only that I do not exist. I think we cannot quite get away with that; I shall argue that ' \sim (I have blue eyes),' for example is true at any world at which ' \sim (I exist)' is true. What we can insist is that what is true about me at a world in which I do not exist must be determined, in accordance with some logical criterion, by the proposition that I do not exist, together with other propositions, true at that world, which are not about me.⁷ For in a world in which I do not exist I have no properties; so what else about me could determine anything there? The criterion I propose will be developed in stages. In the simplest cases truth-functional form, the logical form pertaining to the non-modal logic of propositions, is the only logical form that we need to consider.

Let w be a possible world, and a an actual individual that would not exist in w; then:

- (C1) All propositions that are included in the world-story of w are true at w as well as in w.
- (C2) If $\lceil p \rceil$ is an atomic singular proposition about a, then $\lceil \sim p \rceil$ is true at w.
- (C3) All propositions that follow truth-functionally from propositions true at w are true at w.

Among the singular propositions about me that are true at worlds in which I would not exist, by this criterion, are those expressed by

' \sim (I exist),' ' \sim (I have blue eyes),' ' \sim (I am a person),' ' \sim (I am a fish),' ' \sim (Robert Merrihew Adams = Robert Merrihew Adams),' and '(I exist) \supset (I am a fish).' On the other hand, 'I am a non-fish' is atomic and therefore false at worlds in which I would not exist.

This is as it should be, intuitively. If I did not exist, would I be a fish? No, I would be nothing at all. Is it true then that in that case I would not be a fish? Yes. We capture these intuitions by saying that 'I am a fish' is false, and '~ (I am a fish)' true, at all possible worlds in which I would not exist. But 'I am a non-fish' means that I am something that is not a fish; it ascribes to me the property of being a non-fish. If I did not exist, might I have that property? Might I be something that is not a fish? No, I would be nothing at all, and would have no properties. Hence 'I am a non-fish' is appropriately counted false in worlds in which I do not exist.

In effect I am treating every atomic singular proposition about a as ascribing a property to a, and therefore as saying that a is something that has the property. The denial of such a proposition correctly characterizes not only states of affairs in which a would be something that lacked the property, but also states of affairs in which a would not be anything of any sort at all. I would not claim that we always use logically atomic and non-atomic expressions in accordance with this principle; but it imposes, at worst, a minor regimentation on our ordinary linguistic habits.

3.3 Quantification and Truth at a World

By (C2), 'I am shorter than the Empire State Building' is false, and its negation is true, at worlds in which I do not exist, even if they do contain the Empire State Building. But what about ' $(\exists x)$ (I am shorter than x)'? It ought to be false too, and its negation ought to be true, at worlds in which I do not exist; for I cannot enter into any relation where I do not exist. My criterion must be extended to provide for this.

Let w be a possible world, and a an actual individual that would not exist in w; then:

(C4) If $\lceil \phi(a, x_1, \dots, x_n) \rceil$ is an atomic propositional function from x_1, \dots, x_n to singular propositions about a, then $\lceil \sim (\exists x_1) \dots (\exists x_n) (\phi(a, x_1, \dots, x_n)) \rceil$ is true at w.

Other questions about quantification remain to be answered. I

might never have existed even if Napoleon had been a general. So there should be possible worlds in which

- (1) \sim (I exist) & Napoleon is a general is true. It is plausible to think that
 - (2) $(\exists x)(\sim (I \text{ exist}) \& x \text{ is a general})$

is also true at those worlds. But this is not provided for by (C4), because ' \sim (I exist) & x is a general' is not an atomic propositional function. (2) does follow from (1) by Existential Generalization (EG); and that might suggest we ought to say that any proposition is true at a possible world w if it follows by standard predicate logic (including EG) from propositions that are true at w.

This suggestion has unacceptable consequences, however. For ' \sim (I exist)' is true at many possible worlds, but ' $(\exists x) \sim (x \text{ exists})$,' which follows from it by EG, is false at all possible worlds, according to actualism. There is a similar problem about the rule of Universal Instantiation (UI). ' $(\forall x)(x \text{ exists})$ ' is true at all possible worlds, but 'I exist,' which follows from it by UI, is false at many possible worlds.

Several logicians have developed what is known as a "free logic," which may be characterized, for our present purpose, as a logic of quantifiers and predicates in which the rules of EG and UI are restricted to permit the inference of $\lceil (\exists x)(\phi(x)) \rceil$ from $\lceil \phi(a) & a$ exists, but not from $\lceil \phi(a) \rceil$ alone, and of $\lceil \phi(a) \rceil$ from a exists $\langle (\forall x)(\phi(x)), \rangle$ but not from $\lceil (\forall x)(\phi(x)) \rceil$ alone. This conception can be used in our criterion.

Let w be a possible world, and a an actual individual that would not exist in w; then:

(C5) All propositions that follow by a "free" quantification logic from propositions true at w are true at w.

It would not do to replace (C3) and (C5) by the simpler statement that all propositions that "follow" from propositions true at w are true at w. For there is a variety of cases in which the truth of a proposition q follows from the truth of another proposition p although there are possible worlds at which p is true and q is false. There are several important logical relations that obtain among all true propositions, and indeed among all the propositions that are true in any one possible world, but not among all the propositions that are

true at any one possible world. The standard, unrestricted rule of EG is our first example of this.

If a singular proposition $\lceil \phi(a) \rceil$ is true in any possible world, a must exist, and satisfy $\lceil \phi(\cdot) \rceil$, in that world. Therefore something that exists in that world satisfies $\lceil \phi(\cdot) \rceil$ there; so $\lceil (\exists x)(\phi(x)) \rceil$ is true in that world. Thus unrestricted EG preserves truth in any possible world; applying EG to a proposition true in the world will lead us only to a proposition that is also true in the world. Since truth is coextensive with truth in the actual world, the same reasoning shows that unrestricted EG preserves truth.

We have seen, however, that unrestricted EG does not preserve truth at every possible world. Applying it to a proposition that is true at some possible world (such as ' \sim (I exist)') sometimes takes us to a proposition that is false at that world, and indeed at all possible worlds (such as ' $\exists x$) \sim (x exists)'). But there is no counterexample here to the thesis that unrestricted EG preserves truth, and truth in any one possible world; for ' \sim (I exist)' is neither true, nor true in any possible world, because it exists only in worlds at which it is false.

For these reasons the truth of

- (3) $(\exists x)(x \text{ exists } \supset x \text{ is a son of Arthur and Margaret Adams})$ follows from the *truth* of
- (4) I exist \supset I am a son of Arthur and Margaret Adams, even though (4) is true at, and (3) is false at, possible worlds in which neither I nor any other son of my parents would exist.

Unrestricted EG gives rise to propositional forms that have a sort of validity, in that they have no instances that are false, or false in any possible world, but that lack necessity because they have instances that are false at some possible world. In particular,

(5)
$$\phi(y) \supset (\exists x)(\phi(x))$$

is a singular propositional form all of whose instances are *true*; and all of its instances that exist in any possible world are true in that world. But it has instances that are false at worlds in which they, and the individual they are about, do not exist. And therefore its necessitation.

(6)
$$\square[\phi(y)\supset (\exists x)(\phi(x))],$$

has instances that are simply false.

This suggests that the problems here arise, not from EG alone, but from EG in combination with the rule of Necessitation, which provides that if $\lceil p \rceil$ is a theorem, so is $\lceil \Box p \rceil$ Perhaps we can safely rely on standard quantification logic (including unrestricted EG and UI) for inferring truths from truths, if we restrict the rule of Necessitation to provide only that if $\lceil p \rceil$ is a theorem of a "free" fragment of our system (a fragment in which EG and UI are restricted) then $\lceil \Box p \rceil$ is a theorem of our system. This will enable us to have (5) as a theorem (which we want, since all its instances are true) without having (6) as a theorem (which we don't want, since it has false instances). We might want to say that (5) is a "contingent theorem."

The rule of Necessitation, as an expression of the idea that logical principles are necessary truths, must be treated in general with great caution, if what possibilities there are varies from one possible world to another. A famous thesis about truth provides another case, having nothing to do with quantification, in which an important logical principle is acceptable but its necessitation is not.

(7) The proposition that-p is true if, and only if, p

has instances that are false at some possible worlds, but no false instances and no instances that are false in any possible world. For example, 'I never exist' expresses a proposition (call it P*) that is true at some possible worlds. But 'The proposition that I never exist is true' is false at those worlds, because it expresses an atomic singular proposition about P*, and P* does not exist in those worlds. In any possible world, however, a proposition can be true only if it exists, and then the proposition that it is true will also be true in that world. Hence if a proposition is (actually) true, so is the proposition that it is true. (7) may be admitted as a "contingent theorem" in a formal system, but its necessitation,

(8) \square (The proposition that-p is true if, and only if, p)

must not be accepted as a theorem if singular propositions are allowed as substitution instances.¹¹ Another restriction on the rule of Necessitation is required here, if (7) is to be a theorem.

These logical relations (and others I shall suggest) that obtain among all true propositions but not among all that propositions that are true at any one possible world may make the notion of truth at a possible world seem rather anomalous. Perhaps indeed there is something odd about it; we are using it to do something that is

inherently awkward, although I think we have plenty of reason to do it anyway. A possible world involves two diverse groups of propositions: one group that could all be true together, and a second group that expresses certain relations of the first group to actual individuals. Intuitively we think of the two groups as jointly defining a single way things could have been; and that is right. But they do not form a seamless whole. They could not all be true together, for the second group would not have existed, and therefore would not have been true, if the possible world the two groups jointly define had been actual. The first group define a possible world from within, so to speak, while the second group characterize it only from our point of view in the actual world.

The awkwardness is not due to the notion of possible worlds, however. That (6) and (8) have false instances though (5) and (7) do not, follows, I think, from any satisfactory actualistic treatment of the possibility of our non-existence, with or without possible worlds semantics. It is as if we were trying to paint a picture of my non-existence. We could do a portrait of my family, leaving me out of it and perhaps including a figure that is not a likeness of anyone in particular instead of me; but that does not seem to capture unambiguously all that we meant to express. The classic and obvious solution is to frame the picture and put a plaque on the frame saying, "The Non-existence of Robert M. Adams"; and that is probably the thing to do. But we must not expect the message of the plaque to be related to the figures in the picture in the same way that they are related to each other.

3.4 Which Modal Propositions Are True at Which Worlds?

The most difficult problem, in developing a criterion for truth at a world, is to determine which singular modal propositions, if any, should be counted as true at worlds in which individuals they are about would not exist. I believe that such propositions as ' \Diamond (Jimmy Carter exists)' and ' \Box ~ (I am a musical performance)' should be regarded as ascribing properties to the individuals they are about, and should be treated here in the same way as atomic propositions (and that propositions such as ' $(\exists x)\Diamond(x)$ is stronger than Muhammed Ali)' should receive a corresponding treatment).

Let w be a possible world, and a an actual individual that would not exist in w: then:

- (C6) If $\lceil \lozenge p \rceil$ and $\lceil \square p \rceil$ are singular propositions about a, then $\lceil \sim \lozenge p \rceil$ and $\lceil \sim \square p \rceil$ are true at w.
- (C7) If $\lceil \sim (\exists x_1) \dots (\exists x_n) \diamondsuit (\phi(a, x_1, \dots, x_n)) \rceil$ and $\lceil \sim (\exists x_1) \dots (\exists x_n) \square (\phi(a, x_1, \dots, x_n)) \rceil$ are singular propositions about a, then they are true at w.

This treatment of singular modal propositions is metaphysically satisfying, though formally inconvenient.

It is metaphysically satisfying, from an actualist point of view, because there are no possibilities or necessities de re about non-actual individuals. So if I were not an actual individual there would be none about me. The singular propositions that I exist and that I do not exist would not exist to have the logical properties, or enter into the relations with some or all world-stories, by virtue of which my existence or non-existence would be possible or necessary. I therefore say that ' \Diamond (I exist),' ' \Diamond ~ (I exist),' ' \Box (I exist),' and ' \Box ~ (I exist)' are all false, and their negations true, at worlds in which I do not exist. Neither my existence nor my non-existence would be possible or necessary if I did not exist.

In accepting (C6) and (C7) one opts for a modal logic that reflects the idea that what modal facts there are (or would be) depends on what individuals there are (or would be). Inasmuch as there would be different individuals in different possible worlds, the modal facts de re differ from world to world. This should not be surprising. I have already argued that what possible worlds there are will differ from world to world. It is characteristic of actualism that modal facts, like all other facts, have their whole ontological basis in the actual world. This makes it possible to understand how the modal facts might be different if another world were actual.

The most disturbing consequence of my treatment of singular modal propositions is that the familiar modal axiom ' $p \supset \Diamond p$ ' will have instances that are not necessarily true. For ' \sim (I exist)' $\supset \Diamond \sim$ (I exist)' is an instance of ' $p \supset \Diamond p$ ' that is false at worlds in which I do not exist. I was initially inclined to resist this conclusion, but on reflection it seems to me metaphysically plausible. When we say that what is actual must be possible, we are leaving out of account the possibility that there might be no entity there to bear the relevant

modal property; but what I have been arguing is that if I had never existed neither I nor the proposition that I do not exist would have been there to have any property of possibility.

Nonetheless there is a sense in which I agree that what is actual must be possible. The axiom ' $p \supset \diamondsuit p$ ' is another logical principle that has no instances that are false, or false in any possible world, even though it has instances that are false at some possible worlds. For all its instances will be true in any world in which they exist. It could therefore be admitted as a contingent theorem; but its necessitation, ' $\Box(p \supset \diamondsuit p)$,' has false instances and would have to be excluded by a suitable restriction on the rule of Necessitation.¹²

To say that my non-existence would not be possible if I did not exist is not to say that it would be impossible. ' $p \supset \sim \square \sim p$ ' has no instances that are false at any possible world, and may be regarded as a "weak" version of ' $p \supset \Diamond p$.' Indeed ' $\sim \square \sim$ ' may function as a "weak possibility operator," and ' $\sim \Diamond \sim$ ' as a "weak necessity operator"; for clearly on the view that I am advancing they are not necessarily equivalent to ' \Diamond ' and ' \square ' respectively, as they are in most familiar modal logics.

The axioms characteristic of the systems S4 and S5 of modal logic can be divided into "weak" versions, which hold for all instances at all possible worlds, and "strong" versions, which do not (if singular propositions are admitted as instances). The following are only some examples:

Strong	Weak
$\Box p \supset \Box \Box p$	$\Box p \supset \Box \sim \Diamond \sim p$
$\Diamond p \supset \Box \Diamond p$	$\Diamond p \supset \Box \sim \Box \sim p$
$\sim \square \sim n \supset \square \sim \square \sim n$	$\sim \square \sim p \supset \sim \Diamond \square \sim p$

The modal logic generated by (C6) and (C7) will thus be weaker and more complicated than we may have wanted.

I believe (C6) and (C7) are justified anyway, on metaphysical grounds; but I grant that their correctness is far more doubtful than that of the first five clauses of my criterion. So let us look at three alternatives to my treatment of singular modal propositions. (i) It could be held that unlike other singular propositions, singular modal propositions, negative as well as affirmative, are true at a possible world if and only if they are true in it. This would have the consequence that neither ' \Diamond (I exist)' nor ' \Diamond (I exist)' would be true at

worlds in which I do not exist. It seems unfortunate to admit such a truth-value gap into our modal logic at this point, when there are (as I have argued) strong reasons for responding with a clear 'No' to the question whether, if I never existed, it would be the case that \Diamond (I exist). Moreover this approach still leaves us with the consequence that ' \Diamond ~ (I exist)' is not true at worlds in which I do not exist, and therefore that ' $p \supset \Diamond p$ ' has instances that are not true at all possible worlds.

(ii) It may occur to us to try to deal with the problem in terms of a relation of accessibility, or relative possibility, between worlds. We could say that a possible world w_2 is possible in (or accessible from) a possible world w_1 if and only if every individual that exists in w_2 and also exists in the actual world exists in w_1 . The reason for saying this is that the complete world-story of w_2 will exist in w_1 only if this condition is satisfied. We could then say that $\lceil \Box p \rceil$ and $\lceil \Diamond q \rceil$ are true at a possible world w if and only if $\lceil p \rceil$ is true at all, and $\lceil q \rceil$ is true at least at one, of the worlds that are possible in w. Since the accessibility relation defined here is easily seen to be reflexive and transitive but not symmetrical, S4 would be the right modal logic for it. That is a formally convenient result.

I have passed over certain refinements in this theory, because they do not affect the strongest objection to it, which is that it implies that $\Box \sim (I \text{ exist})$ is true at w if I do not exist in w. For all the worlds possible in such a world must be worlds in which I do not exist. In other words, the theory has the consequence that if I had not existed, my non-existence would have been necessary. This is intuitively unacceptable. If I had not existed, I think my existence would not have been possible; but it seems even clearer that my non-existence would not have been necessary.

- (iii) The most tempting alternative to my treatment of singular modal propositions, I think, would begin by rejecting the whole idea of relativizing their truth and falsity to different possible worlds. Modal propositions, it might be claimed, are not to be included in world-stories. They arise only when the finished system of world-stories (as it actually exists, of course) is surveyed. There is on this view no non-arbitrary sense in which modal propositions are true in or at possible worlds. But we could stipulate arbitrarily that
 - (C6') No matter what the form of [p], a proposition of the form

 $\lceil \diamondsuit p, \rceil \lceil \Box p, \rceil \lceil \sim \diamondsuit p, \rceil \text{ or } \lceil \sim \Box p \rceil \text{ is true at all possible worlds if and only if it is } true (actually true).}$

Then we could help ourselves to the powerful and convenient modal logic of S5.

This stipulation would violate the requirement (laid down in \$3.2 above) that what is true about an individual a at a world in which a does not exist must be determined by a's non-existence there, together with propositions, true at that world, that are not about a. Suppose a is the actual world premiere of Beethoven's ninth symphony, and w is a possible world in which neither a nor I would exist. Then I think (C6') implies that at w it would still be true that a could have been a musical performance and I could not. This difference between a and me at w could hardly have been determined by our (common) non-existence there plus some propositions that are not about us. To suppose such a difference at w between two individuals that would not exist in w seems at least uncomfortably close to ascribing properties at w to individuals that would not exist in w.

Of course if we are firmly agreed that the truth of modal propositions at a possible world is a matter of arbitrary stipulation, it is hard to raise a metaphysical objection. But are we really reduced to arbitrary stipulation here? If there cannot be singular propositions about individuals that never exist, then there is a non-arbitrary difference in the relations of singular modal propositions to different possible worlds. I think it would be good for this difference to be reflected in our modal logic, as it is not in S5.

(C6') is an alternative to (C6); we cannot get an alternative to (C7) in the same way. For (C7) determines (in the negative) questions about whether, in a possible world in which an individual a would not exist, there would be individuals of one sort or another that would be possibly related to a in one way or another. We cannot just say that the answer is affirmative if it is actually true that the individual in question could be so related to a, and negative if it is actually false that the individual in question could be so related to a. For the "other individual" we are asking about might well be one that does not exist in a (the actual world); and in that case there are not actually any singular propositions about that individual, and it is neither actually true nor actually false that that individual could be related to a in the relevant way. An alternative to (C7), therefore, would require some approach and rationale other than those on which (C6') is based.

4. SOME PROBLEMS OF CONSTRUCTION

Among the various things that most of us sometimes say about what might have been the case with reference to various actual individuals, or to non-actual individuals of various sorts, there are some about which we may well wonder what sense can be made of them on the views I have advocated here. Some consideration of the extent to which a few of these supposed possibilities can be constructed in accordance with my principles may be helpful both in understanding and in assessing those principles.¹⁵

4.1 Non-actual Individuals

It may be asked how I can assert 'There could have been an individual that would not have been identical with any of the individuals that actually exist' without admitting primitive relations (of non-identity) between individuals that may exist only in different possible worlds. I take the assertion to be equivalent to

 $(\exists w)(\exists \phi)(w \text{ is a world-story } \& w \text{ includes the proposition that } (\exists x)(\phi(x)) \& \sim (\exists x)(w \text{ includes the proposition that } \phi(x)))$

- where ϕ ranges over infinitely as well as finitely complex properties or propositional functions.

4.2. Trans-world Relationships

My parents could have had, instead of me, a different son whose eyes would have been just a little bluer than mine are. But how can that be possible? It seems that we want to assert the possibility of a world in which I would not exist but there would be a man who does not exist in α (the actual world) and who would have the property of having eyes just a little bluer than mine are in α . That property appears to be a relation between him and me, however; and my metaphysical views imply that there could not be a relation between him and me in a world in which I would never exist (nor in α , since he does not exist here). (Let us ignore for the time being any additional problems there may be about things being related to α in worlds in which one or more of the individuals of α would not exist.)

One approach to this problem is to construct in terms of worldstories a relation between the actual color of my eyes and colors that other people's might be if I did not exist. We could say,

 $(\exists c)(\exists x)(\exists y)(\exists w)(c)$ is the color of my eyes & x and y are my parents & w is a world-story & w contains no singular proposition about me & $\sim (\exists z)(w)$ contains the proposition that z is a son of x and y) & w does contain the proposition that $(\exists z)(z)$ is a son of x and y & z has eyes just a little bluer than c)).

In addition to being rather laborious, this approach has what some may regard as a metaphysical disadvantage in that it involves quantifying over qualities (in this case, shades of color). But I doubt that we can find a significantly better construction in terms of possible worlds.

A less artificial approach is available so long as we do not try to dress all our modal judgments in the panoply of possible worlds. Comparisons with actual samples are probably our most natural and primitive way of indicating shades of color. "What shade of blue do you mean?" "Just a little bluer than this." It is natural to ascribe shades of color in this way when describing non-actual as well as actual situations. "What color are you thinking his eyes might have been?" "Just a little bluer than mine are." The actual color of my eyes is used to say how blue his might have been. Here we are describing a possible but non-actual situation from our perspective in the actual world, as we do when we say that I might not have existed. If we were describing "from inside" a world in which I would not exist, we could not use my eyes as a color sample.

This "external" characterization of the possible in terms of the actual may be regarded as primitive. It does not have to be constructed in terms of possible worlds. Metaphysically, however, it may be doubted whether this approach would really free us from an ontological commitment to colors.

4.3 Similar Worlds with Disjoint Domains

It is a controversial question whether there is a possible world just like the actual world qualitatively but with none of the same individuals as the actual world. Nothing maintained in the present essay settles this question. It is not difficult to construct such a world on my principles: there is one if there is a world-story containing no singular

propositions and no propositions that are not true. The question remains whether there is such a world-story – or in other words, whether what would be constructed in that way is possible.

My metaphysical views begin to be more constraining, however, when the question is raised whether there could be two possible worlds just like the actual world qualitatively but sharing no individual with the actual world or with each other. We can take a first step toward the construction of such worlds. If there is a world-story containing no singular propositions and no propositions that are not true, by virtue of its completeness as a world-story it must contain all true non-singular propositions. Hence it itself contains the proposition,

(9) There is a world-story containing no singular propositions and no propositions that are not true.

For (9) is a non-singular proposition, and true in this case. So if there were a world w just like the actual world qualitatively, but with entirely different individuals, it would be true in w that there is a possible world w' just like w qualitatively but with entirely different individuals.

The next stage of the construction collapses into the abyss of non-being, however. For the question whether w' is distinct from α (the world that in fact is actual) has no answer. It is not a fact that the individuals of w' are the same as those of α , nor that all or some of them are distinct from the individuals of α . There are no relations at all between w' and α ; indeed it is somewhat misleading to speak of them in the same sentence. For in α there is no distinction between w and w', since there is in α only one world-story containing no singular propositions and no propositions that are not true. And in w, for the same reason, there would be no distinction between w' and α .

From the standpoint of a first world (α) , figuratively speaking, there may be a second possible world just like the first but with entirely different individuals. In the first world, however, there is no distinction between the individuals of a second such world and those of a third, since the individuals of the second world do not exist and there are no singular propositions about them. In a second such world its individuals would indeed be distinguishable from those of other similar worlds, but there the identity of the individuals of the first world would be lost. Thus there is no standpoint from which three

perfectly similar worlds can be distinguished. I think this should be accepted as a consequence of the dependence of non-qualitative possibilities on actual individuals.

Of course we have not considered here every possible approach to the construction of three perfectly similar possible worlds, but I doubt that any approach will succeed, except perhaps for very special sorts of world. (For example, could there be three perfectly similar possible worlds entirely populated by disjoint sets of individuals that exist in α ?)

4.4 Interchange of Non-actual Individuals

The problems explored in Section 4.3 may leave the reader wondering how I can say (as I did in Section 3.2) that there could be a pair of possible worlds that differed from each other only by the interchange of two individuals that do not exist in the actual world. One answer to this question is that there could be such a pair of possible worlds if the following is true:

 $(\exists w)(\exists \phi)(\exists \psi)(\exists \phi')(\exists \psi')(w)$ is a world-story & $\sim (\exists x)(w)$ contains the proposition that $\phi(x)$ & $\sim (\exists y)(w)$ contains the proposition that $\psi(y)$ & w does contain the proposition that $(\exists x)(\exists y)(\exists w')\exists w'')(\phi(x))$ & $\psi(y)$ & w' is a world-story & w'' is a world-story & w'' is just like w'' except that the propositions that $\phi'(x)$ and that $\psi'(y)$ are contained in w' and not in w'', and the propositions that $\phi'(y)$ and that $\psi'(y)$ are contained in w'' and not in w'') 16

-where ϕ , ψ , ϕ' , and ψ' range over infinitely as well as finitely complex propositional functions. In other words, the possibility of worlds that would differ only by the interchange of two individuals can be expressed in terms of a perfectly general characterization of a possible world in which both of the individuals would exist; we do not need singular propositions about the individuals for this construction.

4.5 I-pairs

An important part of the argument of Section 2 was stated in terms of I-pairs. An I-pair was defined as a pair of individuals, qualitatively indiscernible from each other, which do not exist in α (the actual

world), and neither of which could have borne any relation to any individual that does exist in α that the other could not have borne to that same individual. It may be suspected that this definition violates constraints imposed by my own position. The notion of an I-pair is related to the problem discussed in Section 4.4; for if an I-pair existed, there would presumably be possible worlds differing only by interchange of the members of the I-pair (or of sets each including one member of the I-pair). But there is also a more difficult problem about I-pairs. What do I mean by saying that neither member of the I-pair could have had relations that the other could not have had to any individual of α ? Very likely the members of the I-pair would exist only in possible worlds from which some individual (some event, at least) that exists in α would be absent. Perhaps there is no possible world in which there would be both singular modal propositions about one or both members of the I-pair, and universal generalizations about all the individuals of α and what relations they could have had.

For this reason there may indeed be no acceptable construction of I-pairs in terms of what would be true in one or more possible worlds. But from my point of view there is an acceptable construction in terms of what would be true at some possible world. An I-pair would exist in any possible world w that satisfies, from the standpoint of α , the following three conditions with respect to some property or propositional function ϕ :

- (10) $\sim (\exists x)(\text{at } w \text{ it is true that } \phi(x))$
- (11) At w it is true that $(\exists x)(\exists y)(\phi(x) \& \phi(y) \& x$ is qualitatively indiscernible from y).
- (12) $\sim (\exists z)(\text{at } w \text{ it is true that } (\exists \psi)[(\exists x)(\phi(x) \& \Diamond \psi(x, z)) \& (\exists y)(\phi(y) \& \sim \Diamond \psi(y, z))])$

These conditions will be satisfied by any possible world represented or constituted, in α , by a world-story that contains no singular propositions but contains the proposition that $(\exists x)(\exists y)(x)$ is qualitatively indiscernible from y). That any such world satisfies (10) and (11), with respect to some property or propositional function ϕ (existence, for example) is obvious. It also satisfies (12) with respect to any ϕ at all. For a world-story, in α , that contains no singular propositions represents or constitutes a possible world in which no individual of α would exist. And at any such world, for any individual

z that exists in α , it is false that $(\exists \psi)(\exists x) \diamondsuit (\psi(x, z))$, by a natural extension of (C7) to deal with quantification over variables in predicate position.

The satisfaction of (12) is trivial in this case (and perhaps in all cases in which all three conditions are satisfied). This triviality may give rise to a suspicion that (10), (11), and (12) are not jointly equivalent to any set of conditions that one would regard as jointly sufficient for the possibility of an I-pair if one held metaphysical views that differed from mine on some of the issues discussed in the present paper.

Even if this construction should fail to capture the original notion of an I-pair, however, that notion is a ladder by which we have climbed up but which we could afford to kick away now. I assumed that if my thesis, that all possibilities are purely qualitative except insofar as they involve actual individuals, is false, then there should be both possibilities of I-pairs and possibilities for one member of an I-pair that are distinct from similar possibilities for the other. Then I argued that there are no distinct possibilities of the latter sort. The force of my argument would not be impaired if I were obliged to conclude that there are no possibilities of I-pairs at all. It is those who reject my thesis who have reason to insist (and no reason to deny) that there could be I-pairs.

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NOTES

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¹ I used to object to this broad use of 'essence,' on the ground that historically 'essence' has referred only to purely qualitative properties (Adams, 1977, p. 187; 1979b, p. 6). I have changed my mind, chiefly because we need a term with the sense that Plantinga

assigns to 'essence,' and 'essence' is the term currently in use for that purpose. My historical scruples are slightly undercut also by the observation that while Scotus does insist that haecceities are "distinct from every quidditative entity," he also seems to regard the haecceity as the bottom term ("infimum") in the ordering of predicates "sub ratione essentiae," where essence is being contrasted with existence (Duns Scotus, 1973, pp. 480 and 419f.—i.e., Dist. 3, Part 1, Questions 5-6 and 3). Nonetheless we must be very clear that the properties most often spoken of historically as "essences" are purely qualitative.

- ² See Adams, 1979b, pp. 6-9, for more on this and on the meaning of 'purely qualitative.'
- ³ Plausibly enough; but cf. Section 4.5 below.
- ⁴ For interesting discussions of this question see Edwards, 1957, p. 391, and Prior, 1978, p. 142. The position I am defending in this essay is reminiscent of views of Prior's, though with some differences; see especially Prior, 1960.
- This bears on a question discussed (too briefly) in Adams, 1979a, p. 55f. Could God have created you without all the evils that preceded your coming to be? It might be suggested that He could have done so by simply deciding to create something having your thisness in a world without those evils. But I am claiming here that thisnesses of possible individuals are not available to God for that kind of decision. This thesis may be of some use for theodicy, but some theologians may be offended by the implication that God does not know as possible all the singular propositions that would actually be true if He created certain sorts of world (cf. Duns Scotus, 1894, p. 35, col. 2, top—i.e., Book 2, Dist. 12, qu. 7). And we may speculate that Leibniz (i) believed that primitive thisnesses would depend on the actual existence of the thisses, (ii) saw that primitive thisnesses would therefore be a feature of the world that God could not have known as possible independently of which world He actualized, and (iii) regarded this consequence as theologically objectionable. I think this may have been one of Leibniz's motives for rejecting primitive thisnesses and affirming the necessity of the identity of indiscernibles.
- ⁶ Duns Scotus, to whom we owe the term 'haecceity,' seems to have held a theory of this sort. See especially Duns Scotus, 1973, pp. 416-421 and 474-484 i.e., Dist. 3, Part 1, Questions 2, 3 and 5-6. I am indebted to Marilyn McCord Adams for acquainting me with relevant Scotistic texts and views, and for much discussion about them. See also Brown, 1979.
- ⁷ Something similar, called "the Indifference Principle," is advocated in Fine, 1977, p. 132. Fine there provisionally adopts a "Falsehood Convention" that is (at least roughly) equivalent to (C2) and (C4) in the criterion I shall develop below; but I do not regard (C2) and (C4) as merely conventional.
- ⁸ Thus I am essentially in agreement with the treatment of this problem in terms of a distinction between "predicative" and "impredicative" singular propositions in Plantinga, 1974, pp. 149–151. The distinction seems both more intelligible and more attractive to me now than it did in Adams, 1977, p. 185f.
- ⁹ The inference from $\lceil \phi(a) \rceil$ alone can be allowed if $\lceil \phi(a) \rceil$ is atomic. This refinement does not matter in (C5) because atomic $\lceil \phi(a) \rceil$ will not be true at any possible world unless $\lceil \phi(a) \rangle$ & α exists is true at that world too.
- ¹⁰ It is crucial to this argument that it is about *propositions*, and I hold that there are no singular propositions about non-actual individuals. I do not mean to be making any

pronouncement, one way or the other, about the validity of EG, in the actual world, as applied to *linguistic utterances* containing proper names or other individual constants. ¹¹ That (8) will not hold "once the contingent existence of propositions is allowed," is pointed out by Fine, 1977, p. 136.

There are related problems about the notion of a qualitative essence of an individual. Such an essence would be equivalent, in a way, to the individual's thisness. Under my preferred treatment of singular modal propositions, however, interchange of the qualitative essence and the thisness in a proposition will not always preserve truth at a possible world, and therefore will not always preserve truth in a modal proposition. If $\lceil \phi() \rceil$ expresses a qualitative essence of a contingent being a, then $\lceil \diamondsuit(\exists x)(\phi(x)), \rceil$ as a purely qualitative modal proposition, will be true, and $\lceil \diamondsuit(\exists x)(x=a) \rceil$ as a singular modal proposition about a, will be false, at possible worlds in which a does not exist, although the two propositions will have the same truth value in every possible world in which they both exist. And $\lceil \square \diamondsuit(\exists x)(x=a) \rceil$ will be simply false although $\lceil \square \diamondsuit(\exists x)(\phi(x)) \rceil$ will be true. This pattern should be familiar to us by now. And we can say in general, if $\lceil \phi() \rceil$ expresses a qualitative essence of a,

$$(13) \qquad \Box(\forall x)(\phi(x) \equiv x = a)$$

is true: at every possible world, nothing but a is ϕ and a is ϕ if a exists. But by clause (C6) of my criterion for truth at a possible world, (13) is false at possible worlds in which a does not exist. Therefore

$$(14) \qquad \Box\Box(\forall x)(\phi(x)\equiv x=a),$$

the necessitation of (13), is simply false.

¹³ An analogous distinction between strong and weak modal operators was proposed in Prior, 1957, ch. 5, for dealing with the problem under discussion here. In Prior's system Q, however, singular propositions are neither true nor false at worlds in which individuals they are about do not exist.

¹⁴ It is noted by Fine, 1977, p. 139.

¹⁵ After considerable thought and discussion I am uncertain to what extent the proposals for actualistic construction of possibilist quantifiers and of various entities from the universe of possibilism in Fine, 1977, can be reconciled with my principles. This is left as a problem to the reader. (Hint: Is the motivation of some of Fine's definitions in conflict with (C6) and (C7)?)

¹⁶ This is a construction for a pair of worlds in which both of the interchanged individuals would exist in both worlds. It is easy to modify it to construct a pair of worlds in which each of the interchanged individuals would exist in only one world of the pair (though both would exist in a common world that provides a starting point).

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