THE ESSENTIAL AND THE ACCIDENTAL

Michael Gorman
The Catholic University of America
Washington, D.C. 20064 U.S.A.
gorman@cua.edu

This is a preprint of an Article accepted for publication in Ratio, © 2005 Blackwell Publishing.

Abstract

The distinction between the essential and the accidental is nearly always understood in modal terms. After criticizing some recent writings by Kit Fine that question that understanding, I develop a theory according to which whether a given feature of a thing is essential turns on whether it is explained by other features of that thing. The theory differs from the modal view by leaving room for features that are accidental even though their bearers cannot exist without them.

The distinction between the essential and the accidental goes back to the very beginnings of philosophy, growing out of the intuitive idea that some of a thing's features are more central or more important to it than others are. Socrates' being human, for instance, seems more central or important to him—more 'of the essence' of him, as we say—than his being snubnosed. Philosophers now commonly accept some such distinction, and they often argue about which features are essential to a given thing and which are not. Less often, far less often, they argue about how the distinction itself ought to be drawn. In a series of recent papers, Kit Fine has criticized what has become the standard way of drawing the distinction and proposed an alternative. His criticisms of the standard view are inconclusive, and his own theory of essence has serious weaknesses, but a better criticism of the standard view, and a better theory of essence, can be developed on the basis of certain things he says.

The distinction between the essential and the accidental is almost always understood in modal terms: a thing's essential features are taken to be those without which it cannot exist, its accidental features those it has but can exist without. Call such a view 'modal essentialism' or just 'modalism'. (It should be added that the modal essentialist typically claims that the distinction holds in a way that is mind- and language-independent.) If one understands this as merely a stipulation of how the words 'essential' and 'accidental' are to be used, the question whether modal essentialism is a good theory can scarcely arise. If,

Michael Gorman – The Essential and The Accidental

however, modal essentialism is understood to be an attempt to make sense out of the intuition that some features of a thing are more central and important than others are, then it makes sense to ask whether modal essentialism is a good theory.

This is just the question that Fine has posed. He begins with the idea that the metaphysician has a special interest in 'what things are' and that this is the point of thinking about essence: 'one of the central concerns of metaphysics is with the identity of things, with what they are'; '[a] property of an object is essential if it must have the property to be what it is'. Fine thinks that the modal understanding of essence is too wide, allowing the essence of a thing to include features that are not part of what it is, and he claims to provide a narrower understanding by appealing to real definition.

Fine distinguishes three versions of the modal approach. The basic idea he calls 'categorical': \underline{x} has F essentially if and only if it is necessary that \underline{x} has F. Then there are two 'conditional' variants: the first variant is that \underline{x} has F essentially if and only if it is necessary that \underline{x} has F if \underline{x} exists; the second variant is that \underline{x} has F essentially if and only if it is necessary that \underline{x} has F if \underline{x} is \underline{x} . He discusses both the categorical version and the first of the two variants, holding that the second variant collapses back into either the first variant or the categorical version. Modal essentialism as understood in this paper corresponds to Fine's first variant, and I have presented his arguments accordingly.³

Fine proposes, as counterexamples to modalism, features that are not essential to Socrates but that are nonetheless such that necessarily Socrates has them if he exists. These include the property of being a member of the set containing only Socrates, the property of being such that there are infinitely many primes, the property of being such that the Eiffel Tower is spatio-temporally continuous, and the property of being existent.⁴ The force of such arguments relies on our agreeing that features such as belonging to a certain set are not important enough or central enough to Socrates to count as belonging to his essence—they

¹ Kit Fine, 'Essence and Modality', in <u>Philosophical Perspectives VIII: Logic and Language</u>, ed. James Tomberlin (Atascadero, CA: Ridgeview, 1994), 1-16, p. 1.

² Kit Fine, 'Senses of Essence', in <u>Modality, Morality, and Belief</u>, ed. Walter Sinnott-Armstrong, Diana Raffman, and Nicholas Asher (Cambridge: Cambridge University Press, 1995), 53-73, p. 53.

³ Fine, 'Essence and Modality', pp. 3-4. For Fine's explanation of how his arguments can be adapted to the categorical version, see 'Essence and Modality', p. 6.

⁴ Fine, 'Essence and Modality', pp. 4-6.

are not part of what he is, as Fine puts it. But a modal essentialist can agree with Fine that such features are non-essential without abandoning modal essentialism. A strategy recently discussed by Michael Della Rocca, for example, involves counting a necessary feature of something as essential only if it is non-trivial, where non-trivial features are those that do not belong to the thing merely because it is a thing. Some features, such as being male if a bachelor, are trivial because they belong to everything. Others belong only to some things but are still trivial because they follow logically from the first type of trivial feature. Socrates, for example, has the feature of being identical with Socrates. He does not share this feature with everything, but his having it follows from his having a feature that he does share with everything, namely, being self-identical.⁵ Someone who is willing to follow Della Rocca on this can evade Fine's counter-examples by arguing that existing, being such that there are infinitely many primes, and being such that the Eiffel Tower is spatio-temporally continuous are trivial in the first sense, and by arguing that being a member of {Socrates} is trivial in the second sense.

Fine himself brings up the idea of banning from the ranks of essential features all those that belong necessarily to every object, although he mentions it only as a way of eliminating the counterexamples based on necessary truths, not as a way of eliminating existence. His reply is that one can reinstate the counterexamples 'by conjoining the given degenerate essential property with one which . . . [is] not degenerate'. ⁶ But such counterexamples would still fall prey to Della Rocca's strategy inasmuch as they would be trivial in his second sense.

Another strategy for the modal essentialist would be to object that Fine's arguments fail because the counterexamples he appeals to are too artificial. Whatever kind of fact it is that there are infinitely many primes, it is not a fact about Socrates. Although one can say, 'Socrates is such that there are infinitely many primes', doing so provides no information about what he is like, and therefore a fortiori it provides no information about what is essential to him. Much the same could be argued with respect to Socrates' existence: there

⁵ See Michael Della Rocca, 'Recent Work in Essentialism', Philosophical Books, XXXVII (1996), 1-13, 81-9, p. 3; at p. 3n9, Della Rocca lists some previous discussions of issues relevant to the problem of trivial essentials.

⁶ Fine, 'Essence and Modality', p. 7.

⁷ For a like-minded remark, see Joseph Almog, 'The Structure-in-Things: Existence, Essence and Logic', Proceedings of the Aristotelian Society, CIII (2003), 197-225, p. 221.

is an old tradition of doubting that existence is to be counted among a thing's properties. Henceforth I will use the word 'feature' to indicate anything that can be said about a thing, while reserving the word 'characteristic' to indicate features that really characterize it. That there is such a distinction is important, but precisely where the line is to be drawn is not, so to avoid irrelevant disputes I will leave the matter vague. Doubtless there will be unclear cases, but that is no argument against the distinction in general, and the cases that Fine brings forward are hardly borderline ones. Using this distinction, a modal essentialist could respond to Fine by saying that a thing's essential features are those (i) without which it cannot exist, and (ii) that are characteristics of it. This version of modalism is more flexible than Della Rocca's in that it leaves open the possibility of a universally possessed feature's being essential to some things.

Before leaving this topic, we should note that at one point⁸ Fine suggests that it is impossible to know whether a feature is relevant to a thing without knowing the thing's essence. If being relevant is taken to be a necessary condition of a feature's being a characteristic, then the refined modal position under discussion here would be circular. This imagined objection is weak, however, because in most if not all cases, whether a given feature is or is not a characteristic of a thing is clearer than what the thing's essence is: one can, for instance, be unsure about what Socrates is while being sure that his color is one of his characteristics and that his membership in {Socrates} is not.

All things considered, then, Fine's arguments against modalism are not very persuasive. What about his own theory of essence? In light of the fact that he considers the modal view too undiscriminating, it comes as no surprise that he wants his own approach to be 'like a sieve which performs a similar function but with a much finer mesh'. Actually, Fine proposes several understandings of essence, some narrower than others. The core idea is that the essence of something is what is stated in a real definition of it, where a real definition tells not how to use a word but what something is. This approach is meant to differ from the modal approach intensionally, in that it defines essence differently; it is also meant to differ from it extensionally, in that it excludes from the essence of something certain features that

-

⁸ Fine, 'Essence and Modality', pp. 6-7.

⁹ Fine, 'Essence and Modality', p. 3.

the modal view includes.¹⁰ That Fine's core understanding of essence is intensionally different from any modal account is clear enough, and it is also extensionally different from the modal account as he understands it. But this core understanding of essence does not have a narrower extension than the refined modal accounts, as the counter-examples he uses to prove a difference of extension are excluded by the refined views.

As already noted, however, Fine has alternate versions. Most importantly for present purposes, he distinguishes 'constitutive' from 'consequentialist' essence: 'An essential property of an object is a constitutive part of the essence of that object if it is not had in virtue of being a consequence of some more basic essential properties of the object; and otherwise it is a consequential part of the essence'. The constitutive essence is 'directly definitive of the object', whereas consequential essence is definitive only 'through its connection with other properties'. And it is important to note that Fine's notion of consequence is a logical one: 'Say that the property Q is a (logical) consequence of the properties P_1, P_2, \ldots , or that they (logically) imply Q, if it is a logical truth, for any object, that it has the property Q whenever it has the properties P_1, P_2, \ldots . It pertains to the constitutive essence of Socrates that he be a man; it pertains to the consequential essence of Socrates that he be 'a man or a mountain'. 13

Now, being-a-man-or-a-mountain is not trivial in Della Rocca's sense, because it neither belongs to everything nor follows logically from any feature that does. On the assumption, then, that Socrates is necessarily (and non-trivially) a man, his being a man or a mountain will be essential on Della Rocca's account. It is not a part of Socrates' constitutive essence in Fine's sense, however, which means that Fine has succeeded in finding something narrower than one refined version of modal essentialism. On the other hand, the second sort of refined modalist could plausibly claim to have a notion that is just as narrow in extension as Fine's, since there is good reason to doubt that being-a-man-or-a-mountain truly characterizes anything.

¹⁰ Fine, 'Essence and Modality', p. 3.

¹¹ Fine, 'Senses of Essence', p. 57. Fine gives no indication of why he speaks of 'more basic' essential properties; he does not develop the point in any way, and it seems most likely that he calls them more basic simply because others follow from them. See note 18 for further comment.

¹² Fine, 'Senses of Essence', p. 56.

¹³ Fine, 'Senses of Essence', p. 57. For further specifications of Fine's theory that are not relevant here, see pp. 58-60.

But this is not the issue of greatest concern; after all, mere narrowness of extension is no virtue. More important is a doubt about the meaning and value of Fine's proposal. He proposes to understand essence in terms of real definition, but he provides no clear notion of real definition. One strategy he employs is to develop an analogy between the essence of a thing and the meaning of a word, ¹⁴ but the analogy does not shed light on why this rather than that would count as a thing's real definition. At one point he raises the question whether a thing has just one definition or essence or whether instead it has many definitions and thus many essences. He grants the latter possibility and then goes on to distinguish between the manifold essence, which includes all the definitions of the thing, the component essences, which are each of the definitions taken singly, and the common essence, which is what all the component essences have in common.¹⁵ This last notion, he suggests, is closest to what the metaphysician is really interested in, but the entire discussion presupposes that we already know how to tell which are the correct definitions of a thing.

In the remainder of this paper I set forth a different way of looking at essence, giving not only a positive account but also my own criticism of the modal approach. My view has certain similarities with Fine's, but instead of starting with definition, I describe the essentialaccidental distinction in altogether different terms, returning to definition only later. My strategy is to rely on an idea that I will for the most part express by means of the word 'explanation'. Although there is no reason to think that this idea can be reduced to prior, more fundamental notions, it is still possible to give clear examples, distinguish it from notions it might be confused with, and otherwise elucidate its meaning. I will arrive at the idea somewhat indirectly, taking as my point of departure Fine's distinction between constitutive and consequential essence.

As already noted, Fine understands consequentially essential features to be features that are consequences of other essential features, taking 'consequence' in a logical sense. But this is not the only way for one feature to be a consequence of another. Consider that, often, one thing is the case because another is the case; the latter's being the case is why the former is the case. For example, recall that an atom of a given kind has a certain number of protons.

¹⁴ Fine, 'Essence and Modality', pp. 10-14. ¹⁵ Fine, 'Senses of Essence', pp. 66-68.

Recall further that if an atom has a number of electrons unequal to the number of its protons, it will be electrically charged and thus prone to join with oppositely-charged atoms in an ionic bond. And recall finally that if the atom has a number of electrons that leaves its outer shell unfilled, it will be prone to join with other atoms in a covalent bond. Now, most atoms are such that when they are electrically neutral, their outer shells are unfilled, and when their outer shells are filled, they are electrically charged. An atom of this sort, that is, an atom of any element other than the inert gases, is prone to bond with others no matter how many electrons it has. (Here I am trading on a distinction between an atom's being prone to bond and an atom's being merely able to bond; the inert gases, which have a filled outer shell when they are electrically neutral, are able to bond in principle, but they are not prone to do so.)

An atom's being prone to bond can legitimately be called a 'consequence' of its having such a number of protons—its having such a number of protons is why it is prone to bond. But note that it is not a logical truth that an atom with such a number of protons is an atom that is prone to bond. Its proneness to bond follows from, is a consequence of, its having such a number of protons, but not in Fine's sense.

Another way of putting the point would be to say that the atom's having a certain number of proton's <u>explains</u> its ability to bond. And it is worth noting that the language of explanation applies to a wider range of cases than the language of consequence does. To take a slightly different example, the fact that an atom has a certain number of protons could be said to explain not only the fact that it is prone to bond but also the fact that, in a particular situation, it actually is in a bond. In this latter case, the number of protons is a partial explanation of why the atom actually is in a bond; the complete explanation would involve other factors as well, such as the presence of another atom under certain conditions. By contrast, saying that an atom's actually being in a bond was a 'consequence' of its having a certain number of protons would tend to suggest, erroneously, that its having that number of protons was sufficient for its being in that bond. One could regiment one's use of 'consequence' to avoid the implication, but I prefer to avoid this and to use the language of explanation instead. The reader should keep in mind, then, that to say that one thing explains another is not necessarily to say that it is a complete explanation of it.

Explanation relations take the following form: something's being such-and-such explains something's (possibly but not necessarily: something else's) being such-and-such. So an atom's having such-and-such a number of protons explains its being prone to bond, and my

radiator's being in good working order explains my office's being warm. It might be more convenient at times to say things like 'there being such-and-such a number of protons explains the proneness to bond', without referring explicitly to what it is that has the number of protons or the proneness to bond, but the more complete formulation should always be kept in mind.

To speak thus of explanation is to use the word in its ontic and not in its epistemic sense. To say that an atom's having a certain number of protons explains its proneness to bond, or that my radiator's being in good working order explains my office's being warm, is to make a claim about mind-independent relations in the world. Whether or not anyone uses the functioning of the radiator to explain (in the cognitive sense or epistemic sense) my office's being warm, the radiator's being in good working order does in fact (in the ontic sense) explain it.

Explanation is a real relation between things. Even though it is not possible for my radiator to be in good working order without its also being the case that the number seven is prime, and even though, therefore, my radiator's being in good working order is in a certain sense a (sufficient) condition of the number seven's being prime, still the radiator's being in good working order does not explain the number seven's being prime. Some sort of real connection would be needed between them. But then what kind of connection or relation? The question can be answered in either a reductionist way or in a non-reductionist way. According to the reductionist answer, explanation means whatever it means in the ultimate reducing science (presumably physics), with details to be provided by the practitioner of that science, perhaps with help from the philosopher of science. According to the non-reductionist answer, reality comes in various irreducible forms, and explanations are likewise irreducibly various. If, for example, psychology is not reducible to biology, then the explanation of someone's having a belief might be different in kind from the explanation of someone's having a heart murmur. Details in that case would be provided by the practitioners of the several sciences, again perhaps with help from the philosopher of science.

Although I myself favor a non-reductionist approach, it is important to emphasize that the theory of essence proposed here is neutral on that issue. Some philosophers would say that all explanations are physical or reducible to physical explanations; others would say that non-physical sciences describe irreducible ways for one thing to explain another. If the former sort of philosopher were to accept the account of essence and accident I give below, he or she

would judge the difference between the essential and the accidental to be rooted in physical facts; for the latter sort of philosopher, that difference would in some cases be rooted in physical facts and in other cases in non-physical facts. How one understands the essential-accidental distinction should not turn on the question of physicalism, and therefore the distinction should be formulated in terms that do not commit one either way. The same holds good for other possible disagreements over the nature of explanation—e.g., whether an explanation is always a cause. I aim, then, to provide an account of the essential-accidental distinction that can be used by philosophers of various persuasions. Even philosophers who reject the idea of explanation altogether can have a use for the definition I will be proposing: noting the connection between explanation and the essential-accidental distinction, they will realize that, by their lights, the essential-accidental distinction too ought to be rejected.

What has been said is enough to allow me to set forth my theory of essence. F is essential to \underline{x} just in case F is (i) a characteristic of \underline{x} and (ii) not explained by any other characteristic of \underline{x} . By contrast, F is accidental to \underline{x} just in case F is (i) a characteristic of \underline{x} and (ii) explained by some other characteristic of \underline{x} . A hydrogen atom's characteristic of being prone to bond is accidental to it because it is explained by the atom's having just one proton. If having one proton is a fundamental, unexplained fact about the atom, then having one proton is essential to it; if, however, having one proton is actually explained by some deeper fact about it (say, a fact involving quarks), then that latter fact would be a candidate for essentiality while having one proton would be accidental.

The claim that what is essential to a thing is not explained by other characteristics of it does not imply that essentials are utterly unexplained. The point is rather the narrower one that what is essential to \underline{x} is not explained by other characteristics of \underline{x} . If \underline{x} is a hydrogen atom, then nothing about \underline{x} explains its having one proton. What explains \underline{x} 's having one proton is whatever explains \underline{x} 's existence in the first place, and whatever explains \underline{x} 's existence cannot be a fact about \underline{x} , because prior to \underline{x} 's coming into existence, there is no \underline{x} for there to be facts about. Suppose some hydrogen atom comes into existence as a result of the fission of a helium atom: the event of fission explains at one stroke why the new

Michael Gorman – The Essential and The Accidental

-

¹⁶ For reasons of space, I omit discussion of how one can formulate this theory without appealing to the distinction between characteristics and features.

hydrogen atom exists and why it has one proton. Apart from having one proton, the atom just doesn't exist at all.

What has been said leaves open the question whether each thing has only one essential feature or more than one. There is something appealing about the idea that each thing has only one, but a difficulty arises because some putative essences are complex: consider the traditional claim that the essence of a human being is rational animality. One way to think about such complexity is to say that rational animality is really a single feature, even if we find it helpful to draw distinctions among its aspects; on such a way of thinking, there is no pressure to hold that a thing has more than one essential feature. But if it turns out to be impossible to uphold such a view, then a complex of this sort will be explained by its elements and therefore not essential after all; its constituents and not it will be the essential features.

Settling this issue is not crucial to the theory I am proposing, but a bit more should be said in view of a possible objection. Someone holding that a certain thing had two essential features might also hold that each was explained by the other. For example, it might seem reasonable to hold not only that having a heart and having kidneys are both essential to Socrates but also that each is (partially) explained by the other. But this is inconsistent with the claim that explained features are accidental. The proponent of unitary essences would, of course, refuse to accept the premise of the objection. The proponent of multiple essential features will have to refine the definition of 'F is essential to \underline{x} ' so that its second part reads 'not explained by any other characteristic of \underline{x} that F does not explain', and likewise to refine the definition of 'F is accidental to x' so that its second part reads 'explained by some other characteristic of x that F does not explain'. This revision allows essential features to have mutually explanatory relations among themselves, while preserving the idea that being an accident has to do with being explained: as construed on this revised understanding, what makes accidents accidents is not simply that they are explained but that they stand on the receiving end of an asymmetrical explanation relation. To avoid cumbersome repetitions, I will henceforth use the simpler version of the theory, but it should be kept in mind that the more complicated version is available.

To say that accidents are characteristics explained by others is not to say anything about their modal status, and thus the way is left open for there to be necessary accidents. Because a hydrogen atom's essential characteristic of having one proton is sufficient for that atom's

being prone to bond, its being so prone is one of its indispensable or necessary characteristics; but since this latter characteristic is explained, it is non-essential and thus accidental.

This is where my own criticism of the modal approach can be stated. The modal view, especially in its revised forms, does do a certain amount of justice to the original intuition that some of a thing's characteristics are more central than others. Necessary characteristics are indeed more central than contingent ones. But the modal view falls short by treating both explained and unexplained necessary characteristics as equally central. The present view does the intuition far more justice. By picking out, from among a thing's necessary characteristics, those that are unexplained, it identifies what is truly at the core of what the thing is.¹⁷

To return to Fine for a moment: Fine says that his distinction between constitutive and consequential essence 'corresponds roughly to the traditional distinction between essence and propria', apparently using that last word to refer to what I have just called necessary accidents. But even after granting him the room to maneuver called for by the qualification 'roughly', and granting him also this use of the word 'proprium', Fine's view looks less rather than more traditional. As medieval Aristotelians developed the idea, a thing could have necessary accidents that followed or 'flowed' from the thing's essence, but this relation as they understood it was not Fine's logical consequence but instead something like what I have been discussing under the title 'explanation'. ¹⁸

_

¹⁷ David S. Oderberg is sensitive to the distinction between essentials and necessary accidents, but he is pursuing goals that do not allow him to develop the point in detail; see his 'How to Win Essence Back from Essentialists', Philosophical Writings, XVIII (Autumn 2001), 27-45, esp. p. 41. James Ross faults modal approaches to metaphysics for their inability to make sense of the distinction, but he too chooses to focus on other issues; see his 'The Crash of Modal Metaphysics', Review of Metaphysics, XLIII (1989), 251-79. Almog, although a non-modalist about essence, has recently expressed doubts about necessary accidents, and when at one time he did countenance them, he did not understand them as I do; see his 'The Structure-in-Things'; What Am I? (Oxford: Oxford University Press, 2002); 'The What and the How', Journal of Philosophy, LXXXVIII (1991), 225-244; and 'The What and the How II: Reals and Mights', Noûs, XXX (1996), 413-433. Unfortunately, space does not allow further discussion of these authors' views here.

¹⁸ See Fine, 'Senses of Essence', p. 57. For representative discussions in Aristotle, see Aristotle, <u>Topics</u> 1.5 and <u>Metaphysics</u> V.30; for a representative discussion in one Aristotleian, see Thomas Aquinas, <u>Summa theologiae</u> I, q. 77, a. 1, ad 5; see also Joan Kung, 'Aristotle on Essence and Explanation', <u>Philosophical Studies</u>, XXXI (1977), 361-83, pp. 362-63, and Gareth Matthews, 'Aristotelian Essentialism', <u>Phenomenology and Philosophical Research</u>, L supplement (1990), 251-

One might object that the necessity I have attributed to some accidents is merely nomological and hence not relevant to any comparison with the modal view, which concerns itself instead with 'metaphysical' modalities. In other words, one might say that such accidents, while nomologically necessary, are contingent in the 'metaphysical' sense, in which case the modal view would not be guilty of wrongly treating them as essential. In reply I would deny that it is possible for there to be hydrogen atoms that obey different physical laws. What might appear to be a possible world in which hydrogen obeys different laws is in fact a world containing something other than hydrogen. Without attempting to discuss in depth the relationship between metaphysics and sciences like physics, I would venture to say that what makes metaphysics different from other fields of inquiry has something to do with its generality and not with any ability to lay bare a stronger kind of necessity in things than the scientist can capture. The metaphysician may well be able to contribute to the discussion of what is essential to hydrogen—not least by clarifying what the question of essence is in the first place—but his or her contribution will not involve saying that the physicist's ideas are beside the point. On the contribution will not involve saying that the physicist's ideas are beside the point.

I have proposed that a thing's accidents are explained by other characteristics that it has, and in the example I have been focusing on, the accident (being prone to bond) is explained by something that is, at least plausibly, essential (having a certain number of protons). That essential characteristics should explain others, at least partially, is not required by the account I have given, but it seems that, normally, they will. Perhaps essential characteristics are non-explaining only when the thing in question has no non-essential characteristics—an unusual case, at the very least.²¹

62, esp. pp. 255-56, 260-61. Even if one were to claim that Fine's passing reference to 'more basic' properties was a reference to properties that explain others, his theory would still be very non-traditional, because the traditional theory does not also require that propria be consequences of essentials in Fine's logical sense.

¹⁹ Cf. Sydney Shoemaker, 'Causal and Metaphysical Necessity', <u>Pacific Philosophical</u> <u>Quarterly</u>, LXXIX (1998), 59-77, esp. pp. 68-70.

The connection between scientific investigation and essence is raised but not developed by Matthews, 'Aristotelian Essentialism', pp. 260-61.

²¹ Authors who have suggested that essential properties are properties that explain others include Baruch Brody, 'Natural Kinds and Real Essences', <u>Journal of Philosophy</u>, LXIV (1967), 431-46, pp. 445-6; Irving Copi, 'Essence and Accident', <u>Journal of Philosophy</u>, LI (1954), 706-719; Paul Teller, 'Essential Properties: Some Problems and Conjectures', <u>Journal of Philosophy</u>, LXXII (1975),

Now let us return to the question of definition. Fine tries to explain essence in terms of definition but proceeds as if we already know the real definitions of things. I propose that we travel in the opposite direction and say that a good definition of something is a statement of its essence, i.e., a statement of its fundamental characteristic(s). In other words, we first inquire into a thing's essence, and then, once we know its essence, we can define it. If we do not yet know a thing's essence, then we are not able to state its real definition, although we might be able to formulate a substitute by invoking some necessary accident that all and only things of that type possess. Such substitutes can be extremely useful. For example, suppose we become convinced that a hydrogen atom's having exactly one proton is explained by some other fact about it, while being unsure what that other fact might be. In such a situation we would be unsure of the definition of hydrogen, but we would still be able to make a lot of progress investigating the characteristics of 'atoms with exactly one proton'. 22

The account of essence that I have proposed is different from any modal account. Clearly enough, it is different in intension. Equally clearly, it is different in extension, because it leaves room for necessary accidents: the line between the essential and the accidental passes through the class of necessary characteristics. But note that this line is drawn without erasing the line between necessary and non-necessary characteristics; in adopting the present view we lose nothing that we possessed in holding to a modal view, while gaining a new distinction. This result is an essentialism that can lay claim to making good sense out of the prephilosophical notion of essence while giving proper credit to the results of scientific inquiry. It seems no exaggeration to say that this is what essentialism ought to be like.²³

233-48, esp. pp. 241-48; for a historical treatment, see Kung, 'Aristotle on Essence and Explanation'. None of these authors develops the point in the ways that I do here, however.

²² On substitutes for definitions see Aquinas, Summa theologiae I, q. 29, a. 1, ad 3. Oderberg connects essence with definition and also makes a point closely related to my remarks about substitutes, namely, that a grasp of proper accidents is the best means to grasping something's essence; see 'How to Win Essence Back', pp. 36-8, 40.

²³ I am grateful to an anonymous referee and to Gordon Barnes, Anne-Marie Gorman, Richard Hassing, Timothy Noone, Alexander Pruss, James Ross, Eleonore Stump, Thomas Sullivan, and to audiences at the 2001 meeting of the Society for Catholicism and Analytical Philosophy and a 2004 session of the Universität Leipzig's Philosophisches Kolloquium. I am also grateful to the Alexander von Humboldt Stiftung, which funded the research stay at the Institute for Formal Ontology and Medical Information Science, Universität Leipzig, where this paper was completed.