Wittgenstein's Attack on Identity in the *Tractatus*

In addition to redoing quantification in the *Tractatus,* Wittgenstein sought to redo identity, which he couldn't take to be a relation on objects.

(i) If it were, then for each o, there would be a fact consisting of o's being combined with o in the requisite way. But if we try to think of such a fact, all we end up thinking of is o itself, which, it would seem, is an object, not a fact.

(ii) If identity were a relation on objects and there were a convention to use '=' to represent objects as standing in that relation, then there would be elementary propositions expressed by uses of 'a = b', 'b = c', and 'a = c'. But these propositions are not logically independent of each other. Hence, there can be no such propositions.

There is also deeper worry (iiia), which is exacerbated in (iiib).

(iiia) If identity were a relation on objects, then to say of o that it is identical with o would be to say something trivial and uninformative, while to say of some distinct o* that it is identical with o would be say something too obviously false to ever say.

(iiib) If identity were a relation on objects, then to say of o that it is identical with o would be to assert a necessary a priori truth, with no cognitive significance, while to say of two different objects that they are identical would be to assert a necessary a priori falsehood, which, in the *Tractatus*, is a senseless contradiction.

Although one can understand Wittgenstein's concern over (i) and (ii), they need not trouble those who don't subscribe to tractarian doctrines about atomic facts and elementary propositions. But (iiia), which is a version of Frege's puzzle, is genuinely problematic. Nor is (iiib) easily dismissible, even if one rejects Wittgenstein's attempt to reduce both metaphysical and epistemic modalities to logical modalities. Since the proposition *that o is identical to o* is both necessary and knowable a priori, it is natural to think that when o isn't identical to o* *the proposition that o ≠ o** is also both necessary and knowable a priori, in which case the truth or falsity of every elementary proposition involving identity is knowable apriori. If that were so, one might question whether such propositions were ever worth asserting or denying.

Things become more puzzling when one notices that many thoughts we express using the '=' seem perfectly significant. Are there really no such significant thoughts? Are they all really nonsense, or are they genuine thoughts that need expressing in some other way?

5.53 Identity of the object I express by identity of the sign and not by means of a sign of identity. Difference of the objects by difference of the signs.

5.5301 That identity is not a relation between objects is obvious.

5.5303 Roughly speaking: to say of two things that they are identical is nonsense, and to say of one thing that it is identical with itself is to say nothing.

5.531 I write therefore not "F(a,b) & a = b", but "F(a,a)" (or "F(b,b)"). And not "F(a,b) & ~(a=b)", but "F(a,b)".

5.532 And analogously: not "(∃x,y) [F(x,y) & x = y]", but "(∃x) F(x,x)"; and not "(∃x,y) [F(x,y) & ~(x = y)]", but "(∃x,y) F(x,y)".

5.5321 Instead of "∀x (Fx → x = a)" we therefore write e.g. "[(∃x) Fx → (Fa & ~(∃x,y) (Fx & Fy))]". And the proposition "*only* one x satisfies F( )" reads: "[(∃x) Fx & ~(∃x,y) (Fx & Fy)]".

5.533 The identity sign is therefore not an essential constituent of logical notation.

5.534 And we see that apparent propositions like: "a = a", "(a = b & b = c) → a = c", "∀x (x=x)", "∃x (x = a)", etc. cannot be written in a correct logical notation at all.

5.535 So all problems disappear which are connected with such pseudo-propositions.

The ideas are a mixture of the unremarkable and the astounding. 5.53, 5.531, 5.532, 5.5321 illustrate a notational proposal for expressing propositions without the identity sign that are truth-conditionally equivalent to propositions normally expressed with it. 5.5301, 5.5303, 5.534, and 5.535 provide a general statement of Wittgenstein's proposal and explain why it is philosophically required. But this is truly puzzling. The articulation of the proposal in 5.53 and the statement of the rationale for in in the next two passages use the very notion they repudiate. But if identity makes no sense, how are we supposed to understand Wittgenstein's proposal, or to know how to implement it?

5.53 tells us that *for all objects o_1 and o_2 Wittgenstein will express the claim that o_1 is identical with o_1 by using a single name, and he will express the claim that o_1 is not identical with o_2 by using non-identical names.* But if the claim that *that a is, or isn't, identical with b* is a mere pseudo-proposition, then the claim announcing Wittgenstein's proposal is also a pseudo-proposition. How can it be informative, if the notion required to understand it makes no sense? The same point can be made about attempts to implement the proposal. To do so we must know, for various expressions e_1 and e_2, whether or not e_1 is identical with e_2, while also knowing, of the objects o_1 and o_2 named by a pair of expressions, whether or not they are identical. So, if, as we are told, identity makes no sense, then Wittgenstein hasn't introduced any alternative; if, on the other hand, identity does make sense, then we have no need for his notational alternative, even though we can understand and evaluate whether we would lose anything by adopting it.

Since we can't give up identity, we must address the puzzles that led Wittgenstein to reject it. The key passage is 5.5303, which combines (iiia) and (iiib). The former is Frege's puzzle for Millianism about names—the doctrine that the meaning of a name is its referent—and the corollary that if n and m are two names of o, then the proposition expressed by a use of ⌈n = m⌉ is the trivial proposition that o is identical with o. This puzzle is challenging because that proposition is necessary, knowable a priori, and, seemingly, uninformative. The classical Fregean response denies that the proposition expressed by ⌈n = m⌉ is the proposition that o = o. Instead, Frege takes it to be an abstract combination of the different meanings of n, m, and of '=' (whatever they may be). Wittgenstein rejects this mysterious entity. Not seeing an alternative, he was led to the present impasse.

There is an alternative implicit in the *Tractatus*-inspired analysis of propositions. The analysis identifies some propositions with *uses of sentences* to represent things as bearing various properties and relations, while identifying other propositions as similar acts of representation, abstracting away from which, if any, sentences are used.

P1. The cognitive act of using n to pick out o, m to pick out o, and ⌈n = m⌉ to represent the objects so named as being identical.

P2. The cognitive act of using n to pick out o and ⌈n = n⌉ to represent o as being identical with o.

P3. The act of representing o as being identical with o, however o is picked out and whatever sentence, if any, is used.

Since one can perform the first of these acts without performing the second, proposition P1 is different from proposition P2. Since anyone who performs either of these acts thereby performs the third, but not conversely, P3 is different from both P1 and P2. It will then follow that anyone who entertains, asserts, believes, or knows either P1 or P2 thereby entertains, asserts, believes, or knows P3—but not conversely.

Next we take advantage of the fact that one can use each member of a pair of different names to designate the same object without knowing that the names designate the same thing. With this, we get the result that entertaining, asserting, believing, or knowing P2 and P3 is not sufficient for entertaining, asserting, believing, or knowing P1. So, whereas, P2 and P3 are knowable a priori (because there are ways of entertaining them for which no empirical knowledge is needed to determine their truth), P1 isn't knowable a priori. Since P1 is informative in ways that P2 and P3 are not, to assert P1 is not to say something too obvious to be worth saying. Nor, if n* and n designate different objects, is the assertion made using ⌈n* = n⌉ epistemically equivalent to the assertion of a contradiction, or to the assertion of any other obvious falsehood. In this way one may dispose of the objection (iiia) to the identity predicate. To do so, one must disregard Wittgenstein's denial of the assumption that one can't understand two codesignative names without knowing them to be codesignative. His adoption of that assumption was one reason he was led to his impasse about identity.

What about (iiib). Let o_1 and o_2 be distinct objects, let n and m be two names for o_1, let r name o_2, and let P1–P3 be as above. Finally, let P1~ and P3~ be as follows.

P1~ The cognitive act of using n to pick out o_1, r to pick out o_2, and ⌈n ≠ r⌉ to represent the objects so named as *not* being identical.

P3~ The cognitive act of representing o_1 as *not* being identical with o_2, however the two objects are picked out and whatever sentence, if any, is used.

Then, all five propositions are necessary truths, but only P2 and P3 are knowable a priori. P1 and P1~ are not knowable a priori because knowing them to be true requires empirical information about what the names refer to. P3~ fails to be knowable a priori because there is *no way* of entertaining it for which empirical evidence isn't required to determine its truth.[1] All of this would, of course, have been foreign to Wittgenstein, telling as it does against his collapsing of epistemic and metaphysical modalities. But it does help us more fully understand how and why his discussion of identity ended up in a *cul-de-sac*.

Having reinstated identity, we can evaluate his notational proposal, understood not as a way of eliminating a problematic notion, but as an alternative way of securing the benefits of a useful one. So understood, it is easy to see its shortcomings. Suppose Wittgenstein's suggestion is correct: for every truth that can be expressed using '=', there is a truth-conditionally equivalent proposition expressed without '=' in which different names always designate different objects (and similarly for uses of different variables). This is not sufficient to vindicate Wittgenstein's proposal. *What must be shown is that for every sentence $S_=$ containing '=' which an agent A knows he or she could use to express a proposition p, there is an alternative sentence S_W without '=' that A knows that he or she could use in accord with Wittgenstein's notational rule to*

1 See pp. 375–76 of Soames (2003a).

express a proposition q that is truth-conditionally equivalent to p. This can't be shown, because it isn't true.

Suppose I don't know whether the names 'm' and 'n' (rigidly) designate the same object, but I do know I can use (1) to express a true proposition p.

1. Fn & Gm & (~(n = m) → Rnm)

I know that p is necessarily equivalent to the tractarian proposition $p_{=}$ I could assert using (2a) *if 'm' and 'n' are codesignative*, while also knowing that p is necessarily equivalent to the proposition $p_{\neq}$ I could use (2b) to assert *if 'm' and 'n' designate different things.*

2a. Fn & Gn
 b. Fn & Gm & Rnm

But I don't use either sentence to assert $p_{=}$ or $p_{\neq}$ because I don't know whether or not the names designate the same thing. Since I don't know whether or not 'm' and 'n' designate different things, I don't know whether I can use (2b) in accord with tractarian conventions. Thus, I don't know how to express in tractarian notation the knowledge I know I can express using (1). I do, of course, know I can express that knowledge without employing '=' *by using (3) in accord with the ordinary, non-tractarian, notational convention*.

3. (Fn & Gn) ∨ (Fn & Gm & Rnm)

But I don't know that I can use (3) in accord with tractarian conventions, because to know that I would have to know that 'n' and 'm' designate different objects, which I don't. Hence, the tractarian proposal leaves no way of knowing how to express the knowledge I wish to express.