THE REVIEW OF SYMBOLIC LOGIC
Volume 4, Number 2, June 2011

AGAINST AGAINST NONBEING

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Abstract. *Towards Non-Being* (Priest [2005]) develops an account of the semantics of intentional predicates and operators. The account appeals to objects, both existent and non-existent, and worlds, both possible and impossible. This paper formulates replies to a number of the more interesting objections to the semantics that have been proposed since the book was published.

Towards Non-Being[1] advocates an account of the semantics and metaphysics of intentional contexts. Its underlying theoretical linchpins are two: an appeal to worlds—actual, possible, and impossible; and an appeal to nonexistent objects (noneism). Neither of these limbs tends to curry orthodox favor. Unsurprisingly, then, since the book appeared, a number of authors have taken it in their sights. The point of the present article is to assess the project of TNB, and largely defend it, in the light of some criticisms. I will discuss mainly Parsons (2006) and Hale (2007); but also, Reicher (2006), Beall (2006), Lewis (1990),[2] and Ladyman (in conversation).[3] Though I may often disagree with them, I'm grateful for the thoughtful care that they have put into their criticisms. I will start by summarizing some of the central aspects of TNB. Then, we will look at the objections, one by one.

§1. Towards Non-Being. The intentional contexts with which TNB concerns itself are of two kinds. *Intentional predicates*: these are verbs whose objects are noun phrases, as in 'I *pity* Anna Karenina', 'I *admire* Nelson Mandela'. *Intentional operators*: these are verbs whose objects are sentential phrases as in 'I *believe that* it will rain today', 'I *fear that* there will be disastrous global warming in the 21st Century'.

The semantics for the verbs are world-semantics. Some of the worlds are possible; the actual world, @, is one of these. The others are not. Impossible worlds are required since we can have intentional states directed toward impossibilities. For example, I can wish to square the circle, or dream that my father is my mother. Impossible worlds are worlds that realize the contents of such intentional states. So we have the following picture.

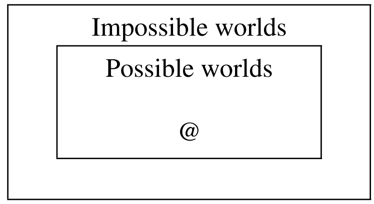
Received: September 29, 2009

[1] Priest (2005). Hereafter, TNB.

[2] The last of these is of course before TNB. But I'm grateful to Richard Woodward for pressing this interpretation of Lewis on me.

[3] Page and section references are to these publications. Unless otherwise noted, italics in quotations are original. I will not take up minor criticisms, or criticisms that involve simple misunderstanding. The point of the present article is to push the debate on. Replies to some further critics can be found in Priest (2008a) and (2008b). Some of the material in this paper has been presented over the last few years in seminars at the Universities of Aberdeen, Bristol, Bucharest, Buenos Aires, Miami, Melbourne, and Oxford. Many thanks go the the audiences in those places for helpful discussions and comments.

doi:10.1017/S1755020310000353



Some of the impossible worlds are not closed under logical consequence (since the contents of intentional states may not be). TNB calls these *open* worlds.[4] Truth conditions at open worlds involve the use of matrices. I ignore the details of these in what follows, since they will be of no concern.

Because we are dealing with worlds some of which are impossible, negation cannot behave classically everywhere. In particular, there must be inconsistent and incomplete worlds. So statements may be true or false at a world; but, in general, these states of affairs are independent: both or neither may obtain. Hence we need to give separate truth and falsity conditions. Write $w \Vdash^+ A$ to mean that A is true at world w, and $w \Vdash^- A$ to mean that A is false at w. Ignoring identity for the nonce, the truth/falsity conditions of atomic sentences are:[5]

$$w \Vdash^+ Pc_1 \dots c_n \text{ iff } \langle \delta(c_1), \dots, \delta(c_n) \rangle \in P^+_w$$
$$w \Vdash^- Pc_1 \dots c_n \text{ iff } \langle \delta(c_1), \dots, \delta(c_n) \rangle \in P^-_w$$

where $\delta(c)$ is the denotation of the constant c, P^+_w is the extension of the n-place predicate P at w (the set of things of which it is true there), and P^-_w is the antiextension (the set of things of which it is false). The truth/falsity for negation are as follows:

$$w \Vdash^+ \neg A \text{ iff } w \Vdash^- A$$
$$w \Vdash^- \neg A \text{ iff } w \Vdash^+ A$$

The truth/falsity conditions for the other connectives are much as one would expect. (A conjunction is true at a world iff both conjuncts are true there, and false iff some conjunct is false, etc.) A technique of relevant logic is used to ensure that for any formula there may be a world where it holds, and for any formula there may be a world where it fails. (Thus, conditionals with consequents that are logically true or antecedents that are logically false, are not vacuously true.) In particular, conditionals are given different truth conditions at possible and impossible worlds.

Every world comes with a (the same) domain of objects, D. At each world, an object may or may not exist. Thus, there is a monadic existence predicate, E, whose extension at world w is the set of thing that exist there. Quantifiers, $\mathfrak{A}$ (all) and $\mathfrak{S}$ (some), work in the standard way. Let us assume that the language is augmented by a set of constants $\{k_d : d \in D\}$, such that $\delta(k_d) = d$.[6] $A_x(c)$ is A with all free occurrences of x replaced by c. Then:

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4 Actually, TNB refers to only the closed nonpossible worlds as impossible. I think the present description is better.

5 To keep matters simple in what follows, I assume that we are dealing only with closed sentences, and so ignore evaluations of the free variables.

6 In TNB I treated quantifiers differently, defining satisfaction. The present method is equivalent and simpler.

$w \Vdash^{+} \mathfrak{S}xA$ iff for some $d \in D$, $w \Vdash^{+} A_x(k_d)$
$w \Vdash^{-} \mathfrak{S}xA$ iff for all $d \in D$, $w \Vdash^{-} A_x(k_d)$.

Dually for $\mathfrak{A}$. In other words, $\mathfrak{S}xA$ holds at w just if *something* in D satisfies A at w, and $\mathfrak{A}xA$ holds at w just if *everything* in D satisfies A at w. Note that the particular quantifier, $\mathfrak{S}x$, should be read 'some x is such that'. (And the universal quantifier $\mathfrak{A}x$ as 'all x are such that'.) It is *not* to be read as 'there exists an x such that', or even as 'there is an x such that'. If one wants to say such things, one has to use the existence predicate explicitly, thus: $\mathfrak{S}x(Ex \wedge A)$. An object that does not exist at a world does not have some lesser grade of being there. If it does not exist (at a world) it simply *is* not (there).

Given this setup, the semantics of intentional predicates are simple. Intentional predicates work in exactly the same way as do any other predicates. The extension of 'kicks' (at a world) is just the set of pairs such that the first kicks the second (there); the extension of 'fears' at a world is just the set of pairs such that the first fears the second (there). Thus, when John fears something, this is a relationship between John and the object of his fear. John has immediate phenomenological acquaintance with the object; but the object itself may or may not exist.

The semantics for intentional operators are those which are standard in the world-semantics of epistemic and doxastic logic. For every intentional operator, Ψ, in the language, there is a corresponding binary accessibility relation, R_Ψ, between worlds. $wR_\Psi w'$ means something like: at w', things are as, at w, they are Ψd to be. So if Ψ is 'John fears that', $@R_\Psi w'$ iff w' realizes all the things that John actually fears.[7] We then have:

$w \Vdash^{+} \Psi A$ iff for all w' such that $wR_\Psi w'$, $w' \Vdash^{+} A$
$w \Vdash^{-} \Psi A$ iff for some w' such that $wR_\Psi w'$, $w' \Vdash^{-} A$.

To complete the picture, something needs to be said about two other matters: identity and characterization.

Special problems beset the notion of identity in intentional contexts. *Prima facie*, it would appear that Oedipus desired Jocasta, but did not desire his mother, even though Jocasta was his mother. This is not a tough problem, however. Oedipus *did* desire his mother. He just did not realize that Jocasta was his mother. Of course, he realized that Jocasta was Jocasta. Hence, the substitutivity of identicals, we may suppose, holds within the scope of intentional predicates; but it cannot hold within the scope of intentional operators (like 'realize that').

TNB handles this fact using techniques from so called "contingent identity" systems of modal logic. As a first cut, think of an object as having different parts at different worlds (in the way that an object may have different time-slices at different times). Let the set of parts be Q. Since it is, *in stricto sensu*, the different parts that have the properties at different worlds, we now have to modify the truth/falsity conditions for atomic sentences as follows:

$w \Vdash^{+} Pc_1 \ldots c_n$ iff $\langle |\delta(c_1)|_w, \ldots, |\delta(c_n)|_w \rangle \in P^{+}_{w}$
$w \Vdash^{-} Pc_1 \ldots c_n$ iff $\langle |\delta(c_1)|_w, \ldots, |\delta(c_n)|_w \rangle \in P^{-}_{w}$

where $|x|_w \in Q$ is the part of x at w.[8] In particular, then, $a = b$ holds at w just if $|\delta(a)|_w$ and $|\delta(b)|_w$ are the same. If $a = b$ and Pa hold at @, then so does Pb. But $a = b$ and ΨPa may hold at @, without ΨPb holding there, since $\delta(a)$ and $\delta(b)$ may have different parts at worlds accessed by @ under R_Ψ.

[7] I simplify here—though not in TNB itself—incorporating the agent into the intentional operator.
[8] The notation is slightly different from that used in TNB, but cleaner.

How is one to think about the nature of parts in this context? TNB suggests that we think of the members of Q as identities. Thus, just as an object may have different sizes or colours at different worlds, it may also have different identities. In the actual world, the identities of Jocasta and Oedipus' mother were the same. But in the world that realized the way Oedipus took things to be, that is, in the world of Oedipus' beliefs, they were different.

Finally, characterization. If one characterizes an object in a certain way (say, as a Victorian detective of acute powers of observation and deduction, etc.), one has no guarantee that the object in question really does have those properties (at the actual world). It does have those properties at some worlds, however; namely, those that realize the situation about the object envisaged (e.g., the one described in Doyle's Holmes stories).

Formally, one can represent characterization with an indefinite description operator, ε (so that $\varepsilon x A$ is read as 'a thing, x, such that A'). The denotation of a description,[9] $\varepsilon x A$, is then determined as follows. There are worlds where $\mathfrak{S} x A$ holds. (Given impossible worlds, every condition holds at some world.) Let w be @ if the condition holds there; otherwise, choose some other world where it holds. Let d be any of the objects satisfying A at w. (These two steps can be accomplished, formally, by applying suitable choice functions. Informally, they are realized by an intentional act.) Then $\delta(\varepsilon x A) = d$. This ensures that if $@ \Vdash^+ \mathfrak{S} x A$ then $@ \Vdash^+ A_x(\varepsilon x A)$. Moreover, let Ψ be an intentional operator with an accessibility relation satisfying the following condition: $w R_\Psi w'$ iff $w' \Vdash^+ A_x(d)$. One might think of Ψ as 'so and so is thinking that d satisfies A'. Then $@ \Vdash^+ \Psi A_x(\varepsilon x A)$.[10]

We may now turn to the objections to be faced.

§2. Parsons.

2.1. Propositional quantification. *Objection:*[11] Priest's semantics cannot account for the validity of the inference:

Maria believes everything that Agatha said.
Agatha said that Caesar died.
So Maria believes that Caesar died.

since he parses, for example, the second sentence as 'Maria believes-that (Caesar died)' and not as 'Maria believes (that Caesar died)'.

Reply: The point about the parsing is not essential. The word 'that' is not even necessary in such contexts. One can say just as well 'Maria believes Caesar died'. The challenge is to account for propositional quantification into an intentional operator, and, in particular, to account for the validity of the inference:

$$\mathfrak{A} p(\Phi p \supset \Psi p)$$
$$\Phi C$$
$$\Psi C$$

It is true that the language and semantics I give in TNB do not contain propositional quantification. However, it is not difficult to extend them to include it. The syntactic changes are trivial. The easiest way to handle the quantifier $\mathfrak{A} p$ semantically is as substitutional.

[9] Provided it is not picked up by anaphora from some prior context.

[10] This is slightly different from the account given in TNB, but cleaner, and has the same effect. Again, I simplify, ignoring matrices, which are irrelevant here.

[11] Parsons, Section 1.1.

There are, of course, the usual annoying things about substitutional quantification to deal with. Thus, the substitution instances cannot themselves contain propositional quantifiers, on pain of circularity. So to do the job properly we need a hierarchy of such quantifiers.

Of more concern in the present context is the worry of there not being enough substitution instances to go around. If one says something, then this guarantees an appropriate substitution instance for the 'something'. But if one fears something, it is not clear that there must be an appropriate instance. Maybe John can fear something ($\mathfrak{S}p\ j\Theta p$) without it being the case that the content of John's fears is articulable, even by John. The matter, I think, it not clear.

A more robust solution interprets the propositional quantifiers as objectual. Interpretations come furnished with a set of propositions, $\mathcal{P}$. The members of $\mathcal{P}$ are any sets of the form $\langle X^+, X^-\rangle$, where each member of the pair is a subset of W. (Worlds in X^+ are worlds where the proposition is true; worlds in X^- are those where it is false.) We have a number of propositional constants, which denote propositions. If P is any such constant:

$w \Vdash^+ P$ iff $w \in X^+$, where $\delta(P) = \langle X^+, X^-\rangle$
$w \Vdash^- P$ iff $w \in X^-$, where $\delta(P) = \langle X^+, X^-\rangle$.

The truth/falsity conditions for the universal quantifier are as follows (those for the particular quantifier are dual):

$w \Vdash^+ \mathfrak{A}pA$ iff for all $\alpha \in \mathcal{P}$, $w \Vdash^+ A_p(k_\alpha)$
$w \Vdash^- \mathfrak{A}pA$ iff for some $\alpha \in \mathcal{P}$, $w \Vdash^- A_p(k_\alpha)$,

(where k_α is a constant denoting α). One may show, in the usual fashion, that this makes the inference from $\mathfrak{A}pA$ to $A_p(B)$ valid, where $A_p(B)$ is the same as A, except that B is substituted for all free occurrences of p. The validity of Parson's inference is now straightforward.[12]

2.2. All worlds or some? *Objection:*[13] Priest analyses the semantics of intentional operators in terms of universal quantifiers over worlds, as follows:

1. $w \Vdash^+ \Phi A$ if for all w' such that $wR_\Phi w'$, $w' \Vdash \Phi A$

Some intentional operators, such as 'doubt that', do not 'have universality built into their meaning', and are more naturally understood as particular:

2. $w \Vdash^+ \Phi A$ if for some w' such that wRw', $w' \Vdash^+ \Phi A$

Reply: Agreed. Every intentional operator has its dual, as $\Diamond$ is dual to $\Box$. Thus, the dual operator of 'a knows that' (epistemic necessity) is 'for all a knows, it is possible that'. Such dual operators have particularity in their truth conditions, as in 2. In TNB I did not pay much attention to dual intentional operators. This is an omission.

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12 Another possible solution is to reduce intentional operators to the corresponding predicates. Thus, we may take the language to contain an operator, § (the proposition that), such that for any sentence, A, $\S A$ is a name, and refers to a proposition of some sort (which must now, therefore, be in the domain of first-order quantification). We can then take, for example, 'Mary believes that Caesar died' to be of the form $mP\S C$, where P is the predicate 'believes'. Parsons' argument can then be handled with first-order quantification. This strategy is problematic for the following reason, however. I can certainly believe a proposition and believe a person. But the senses of 'believe' would seem to be quite different.

13 Parsons, Section 1.2.

The story about doubt is a bit more complicated, since doubt is more like contingency than possibility. The primary intentional operator here is certainty. To doubt whether A is to be not certain that A and not certain that $\neg A$. (The first clause on its own is insufficient, since it is compatible with being certain that A is false.) Thus, if we write Γ for 'a is certain that' and Δ for 'a doubts that' then ΔA is equivalent to $\neg\Gamma A \wedge \neg\Gamma\neg A$. This gives it the truth conditions as follows:

$w \Vdash^{+} \Delta A$ iff for some w' such that $wR_{\Gamma}w'$, $w' \Vdash^{-} A$ and for some w' such that $wR_{\Gamma}w'$, $w' \Vdash^{+} A$.

Doubt has particularity built into it twice over.

2.3. Coda to these objections. For Parsons, these objections are both aspects of the same problem. The correct way to understand intentional operators is as a relation between agents and propositions. This is certainly a natural enough thought, and it may, in fact, be accommodated in a way that finesses the objections above, by a slightly different worlds-analysis of the semantics of intentional operators.

The semantics of intentional operators in TNB is based on an analogy with the standard semantics of modal operators. But there are also neighborhood semantics for these operators. (See Chellas, 1989, Part III.) These are most easily appreciated by thinking of propositions as classes of worlds. So the proposition expressed by A is the set $[A]$ of all worlds where A is true. An interpretation for the modal language has a set of worlds, W (but no accessibility relation), and assigns each constant and predicate a denotation in exactly the same way that the standard semantics do. But it also assigns each world, w, a collection of neighborhoods, $\Box_w$. The members of $\Box_w$ are all subsets of W. $\Box_w$ may be thought of as the set of propositions that are necessarily true at w. Hence, the truth conditions of the necessity operator may be stated as:

$w \Vdash \Box A$ iff $[A] \in \Box_w$.

The major feature of these semantics is that they invalidate nearly all manifestations of logical omniscience. None of the following, for example, holds:

If $\models A$ then $w \Vdash \Box A$
If $A \models B$ and $w \Vdash \Box A$ then $w \Vdash \Box B$
If $w \Vdash \Box A$ and $w \Vdash \Box B$ then $w \Vdash \Box(A \wedge B)$.

We can give an analogous semantics for intentional operators (bearing in mind that the propositions involved must now be "bipolar"). At each world, an intentional operator, Ψ, is assigned a pair $\Psi_w = \langle \Psi_w^+, \Psi_w^+ \rangle$, the members of each of the components of Ψ_w are subsets of W. If $[A]^+$ is the set of worlds where A is true, and $[A]^-$ is the set of worlds where it is false, then the truth/falsity conditions for intentional operators are:

$w \Vdash^{+} \Psi A$ iff $[A]^{+} \in \Psi_w^{+}$
$w \Vdash^{-} \Psi A$ iff $[A]^{-} \in \Psi_w^{-}$.

These semantics accommodate all of Parson's worries. The quantifiers in the truth conditions for Ψ have disappeared. ΨA is understood essentially as a property of the proposition (in $\mathcal{P}$) expressed by A, and we may add objectional propositional quantifiers to the language and accommodate Parson's inference as in Section 2.1.

Finally, there is, unfortunately, one form of logical omniscience that the neighborhood semantics does not break. The semantics still validates the condition:

If $\models A \leftrightarrow B$ then $\models \Psi A \leftrightarrow \Psi B$.

This is still not intuitively valid. Even in relevant logic, for example, $\models A \leftrightarrow (A \vee (A \wedge B))$; but someone may believe A without believing that $A \vee (A \wedge B)$. B may contain words for concepts that they do not possess. Hence, we still need open worlds or something similar.[14]

With the semantics of intentional operators just described, the rest of the account of TNB goes over intact, with the occasional minor and obvious modification.[15]

2.4. Descriptions. *Objection:*[16] Priest does not answer the question: when is the Characterization Principle (A(the thing that A), $A(\iota x(Ax))$) true? All we are given is that $A(\iota x(Ax))$ always holds in some worlds or others—which may or may not include the actual world. This may not be an objection, as such, but it is disappointing in comparison with other accounts, such as Parson's own.

Reply: In fact, the question is somewhat ambiguous, and the semantics does answer it, in those senses in which it is possible to do so. Let me explain. To avoid certain complexities irrelevant to Parson's worry, I do so with respect to indefinite descriptions. So when is $A(\varepsilon x(Ax))$ true?

The answer given in TNB, Section 4.5, is essentially as follows. If something satisfies the condition $A(x)$ in the actual world, then $\varepsilon x A(x)$ refers to one such (contextually determined) thing. Hence, $A(\varepsilon x(Ax))$ is true. If nothing satisfies this condition, then $A(\varepsilon x(Ax))$ refers to some other, contextually determined, object. This will normally be a nonexistent object, but it may not be. (Suppose, e.g., that no one is in the doorway, but we are speculating about an actually existing Harry being in the doorway, then, in that context, 'a man in the doorway' may refer to Harry; see TNB p. 113). But whatever it refers to, since nothing satisfies the condition $A(x)$, that thing will not. Hence, $A(\varepsilon x(Ax))$ is true iff something satisfies the condition $A(x)$. This gives a precise answer to the question; and it is essentially the same as Russell's (though for quite different reason)—or at least, accounts of indefinite descriptions with the same upshot, such as Hilbert's.

This will not completely satisfy Parsons. For he continues:

> ... we are not told what '[a] round square' stands for at this world, or what properties the thing which is not round and square actually has. This seems to me to be a significant gap in the account.

Assuming that the actual world is consistent, then nothing satisfies the condition 'x is round and square'. The description, then, will refer to some contextually determined object that does not satisfy this condition. What properties this object has depends, of course, on what object actually *is* picked out in the context. The fact that there is no determinate answer to the question of what properties it has is hardly objectionable, therefore, any more than any other case of contextual determinacy. Consider 'that was a good year'. Was the year an odd-numbered year or an even-numbered year; was it this century or a previous century? Outwith a context, there is no way of answering this question.

But this may not satisfy Parsons either. I suspect that his real worry is about the properties of nonexistents. So suppose that the term denotes a nonexistent object. What more can be said about its properties? For a start, it cannot have existence-entailing properties, by definition. So it cannot be on top of the Berkeley Clock Tower; and I cannot kick it. Exactly

[14] The neighborhood semantics described briefly in this section are investigated in much more detail in Priest (2009a).

[15] For example, the condition (*) on p. 93 needs to be rephrased in terms of neighborhoods.

[16] Parsons, Section 4.

what properties are existence entailing, we may, of course, debate. Arguably, being round and being square are of this kind. But certainly intentional properties are not. Thus it can have the property of being thought about by Meinong (or Quine). Maybe there is not much more to be said about the matter in general than this. But again, this is hardly a theoretical gap. The properties that the object has are, in general, quite contingent. If Quine had not written 'On What there is', he might never have thought about a round square. A complete and a priori answer to the question is not, therefore, to be expected.

2.5. Who is Holmes? *Objection:*[17] Consider a world, w, that realizes the Holmes stories, and the object x of which the stories are true in w. This thing is Holmes. Now consider another world, w', and the thing, y, different from x, which the stories are true of in w'. This is Holmes too. But that is impossible.

Reply: This objection is based on a false assumption, namely that if at some world a (unique) object satisfies the conditions of the Holmes stories, this is Holmes. Such is not my view.

When Conan Doyle started to write the Holmes stories, he imagined a character. Though he may have based his character on a certain existent object or objects, the object he imagined was purely imaginary—nonexistent. He characterized him in various ways, as living in Baker Street, as taking cocaine, and so on. In the worlds that realize these characterizations, he does indeed have those properties. But the name 'Holmes' does not pick out whatever it is, in a certain world, that satisfies the characterization. Conan Doyle imagined a certain object, and baptized him with the name 'Holmes'. The rest of us picked up the referent of 'Holmes', we may suppose, by a causal interaction with Conan Doyle, as the causal theory of names requires. (See TNB, Sections 6.3, 7.5.) There are certainly worlds where Holmes did not do the things Doyle characterized him as doing. This one, for example, where he does not exist. But even worlds where he does exist; for example, where he decided to set up rooms in Regent St. And there are worlds where there are things that satisfy the characterizing conditions, but which are not Holmes. There are worlds, dear reader, where you live in Baker St., take cocaine, and so on. But you are not Holmes. You are not the nonexistent object that Conan Doyle imagined.

What will trouble people most about this account, I suspect, it how Doyle managed to single out a certain nonexistent object, when there are many he could have chosen, with little to choose between them. The answer is by an act of primitive intentionality (see TNB, Section 7.5). Neither is there anything mysterious about such acts. They are quite natural, and you and I are quite familiar with them. Imagine a dwarf, short, a white beard, a red hat flopping to one side. Done it? That object is now phenomenologically present to you. You can even give it a name, if you like, say, 'Howard'. You can tell me that Howard has glasses. I can ask you whether Howard's beard goes down to the floor.[18] Mysterious? Not in the least.[19]

It should be noted that contemporary discussions of nonexistent objects started in the context of phenomenology. Meinong was a member of Brentano's school, and centrally

[17] Parsons, Section 5.

[18] Of course, Howard may be an incomplete object, so the answer may be neither yes nor no. Or he may be an inconsistent object, so the answer may be both yes and no.

[19] A somewhat different approach to the whole matter is to suppose that the agent creates the object at the moment of storytelling, and so does not have to "single it out." This nonrealist approach is discussed in Priest (2010).

concerned with the analysis of intentional states. The analysis of intentionality lapses in analytic philosophy after about 1920. 'Why?' is an interesting question, though let us not pursue the matter here. The discussions of nonexistent objects that then remain, such as Quine's, are pursued outwith this context. This is like pulling plants out of the ground and examining them just *in vitro*. Of course, if one does not understand the natural environment of something, all sorts of spurious puzzles are likely to arise.

§3. Hale.

3.1. The need for impossible worlds. *Objection:*[20] One does not need impossible worlds to handle counterfactuals with logically impossible antecedents. Instead of saying, for example (assuming classical logic to be correct):

If intuitionist logic were correct, the Law of Excluded Middle (LEM) would fail

one can say:

If one were to accept that intuitionist logic were correct, one would not accept the LEM.

Reply: This would seem to miss the point. One can, indeed, consider the second counterfactual, and this does not have an impossible antecedent. But it was the status of the first counterfactual that is in question. And if there are no impossible worlds, the first conditional is vacuously true (assuming some worlds-analysis of the usual kind for the conditionals). That's okay, but the conditional:

If intuitionist logic were correct, the Law of Non-Contradiction (LNC) would fail

would also be vacuously true (TNB, p. 15). Clearly it is not.

There are also conditionals where moving to talk of what we would accept will give manifestly the wrong consequences. Suppose that classical logic is correct. Then it is true that:

If dialetheism were true, it would be right to torture innocent people to death for fun.

(since dialetheism entails contradictions). But it is not true that:

If one were to accept that dialetheism were true, one would accept that it is right to torture innocent people to death for fun.

3.2. Conditionals. *Objection:*[21] Priest claims that a semantics of impossible (or open) worlds shows that $p \rightarrow (q \rightarrow q)$ is invalid. But it does not. At the world where p holds and $q \rightarrow q$ fails, '$q \rightarrow q$' does not express the proposition that $q \rightarrow q$, since it is 'treated as atomic'; and so the situation is not one in which the proposition expressed by p holds and the proposition expressed by $q \rightarrow q$ fails.

Reply: If I understand the force of this argument right, it assumes something like this. Take some operator (monadic, for the sake of simplicity), $*$. And let us suppose that it has the following truth conditions:

If w is a possible world, then $*A$ is true at w iff $\varphi(A)$
If w is an impossible world, then $*A$ is true at w iff $\psi(A)$

[20] Hale, Section 2.1.
[21] Hale, Section 2.1.

where φ and ψ are distinct. Then $*A$ expresses different propositions at possible and impossible worlds—that $\varphi(A)$ and $\psi(A)$, respectively.

But the fact that an operator has nonuniform truth conditions does not mean that it is ambiguous. We could express its truth conditions uniformly as:

$*A$ is true at w iff (w is possible and $\varphi(A)$) or (w is impossible and $\psi(A)$).

No one, I think, would suggest that the phrase 'citizen of Australia' is ambiguous simply because it has a disjunctive truth condition:

x is a citizen of Australia iff x was born in Australia, or x has undergone Australian naturalization.

Indeed, it does not seem to me to make much sense to suppose that the notion of expressing a proposition is world-relative. If we identity the proposition expressed by the formula A, as $\langle [A]^+, [A]^- \rangle$ in the way already described, then a sentence A express the proposition π iff $\langle [A]^+, [A]^- \rangle = \pi$. There is no world-relativity here at all.

3.3. The nature of identities. *Objection:*[22] To solve the problem about the substitutivity of identicals in the scope of intentional operators, Priest takes objects to be functions from worlds to identities. But it is obscure as to what identities are.

Reply: Identifying objects with functions is a matter of convenience (TNB, p. 43). One could suppose, instead, that associated with each object is a function that assigns its identity at each world.[23] The crucial idea is that the same object can have different identities at different worlds. It is true that I say little about what identities are (what little there is is on TNB, p. 47). Let me say a little more here.

Consider an actor, say Anthony Hopkins. In each play in which he plays, he has a role, or identity—Macbeth, Iago, Caesar. It is helpful to think of metaphysical identities as rather like this. (Identities vary only at open worlds, i.e., worlds which realize the contents of some intentional state). When one watches a play, one *thinks of* Hopkins as, Macbeth, Iago, and so on. This is who he is in a world which realizes how one thinks things to be.

Or consider a different metaphor. In many religions, a god may be embodied in the form of an avatar. Thus, for example, Visnu manifests himself as Krisna in the *Mahabrata*, and as Rama in the *Ramayana*. One may think of identities as avatars. An object transcends any particular world, but manifests itself, possibly in different ways, in different worlds.

The explanations I have been giving are, I am aware, analogies and metaphors. I do not know how to do better. I suspect that for such a fundamental metaphysical notion, metaphors and analogies are all we have. However, the metaphors are, it seems to me, suggestive and illuminating.

3.4. Identities and substitutivity. *Objection:*[24] Priest's identities are either ineffable or we have not solved the problem of substitutivity. For suppose that we may refer to these things; then we may refer to them by distinct names, for example, Macbeth (m) and the Thane of Cawdor (t). But clearly, we can then believe that Macbeth was Macbeth without believing that Macbeth was the Thane of Cawdor.

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22 Hale, Section 2.2.

23 On the other hand, perhaps it isn't so implausible to think of an object simply as a certain correlation between worlds and identities. It is simply that functional role.

24 Hale, Section 2.2.

Reply: The conclusion does not follow. Names refer to the objects in the domain of quantification, D. Identities are members of a different set, Q. But it does not follow that one cannot refer to identities. For Q may be a subset of D. In giving the truth conditions of sentences that refer directly to identities, one must of course make use of their identities at the appropriate worlds. Thus, $m = t$ is true at w iff $|\delta(m)|_w = |\delta(t)|_w$. Substitutivity of identical may therefore fail, even when we refer to identities.

Of course, this requires identities to have identities. But I do not see any particular problems about this. An actor may play, for example, the leader of the troupe of players in *Hamlet*. But in the play (within the play) mounted by the actors, the leader of the troupe plays Hamlet's father, and so has that identity.

3.5. Imagining. *Objection:*[25] For Priest, imagining is some sort of non-(existence-entailing), and so noncausal contact. 'I have not begun to grasp what this could be'.

Reply: Clearly, the last sentence is meant not simply as a report of Hale's psychological state, but as some kind of objection.[26] I have no clear idea what Hale is asking for here. I have no doubt that he is perfectly familiar with the phenomenon. When his kids were young, and he made up stories to tell them about dragons and queens, knights and battles, he had first-hand experience of contact of this kind with the objects of his thought. Similarly, when he says (p. 107):

> The relation of imagining that [Priest] takes to hold between authors and purely fictional objects is, I've already suggested, indecently obscure. I find his response (141–43) to the objection that the noneist can give no account of reference to non-existent objects equally mysterious and unsatisfactory.[27] To insist that an 'act of pure intention' can single out an object without the aid of discriminating information or causal contact, and if we find that hard to swallow, this is just 'the nature of the beast', does nothing to blunt the force of the objection. [What objection? GP]

If Hale would reflect on his own phenomenology, he would see at first hand how this can be done. What is going on in the brain on such occasions, I have to leave to neuroscientists to describe (see TNB, p. 144).[28]

3.6. Platonism in disguise. *Objection:*[29] Consider the following putative translation manual between noneism and platonism.

Noneist	**Platonist**
is an object	exists
exists	is a concrete object

[25] Hale, Section 3.1.

[26] Rhetorical devices of this kind play a rather frequent role in Hale's criticisms. Clearly, unless the report of the psychological state is accompanied by some *reasons* as to *why* there are problems about getting one's head around the thing in question, there is no *real* objection here of any kind.

[27] My footnote: This is an exageration. We may suppose that the causal theory of names applies just as much whether the object named exists or not (TNB, Section 7.5). What Hale is referring to is the singling out of an object for baptism.

[28] See, further, the reply in Section 2.5.

[29] Hale, Section 3.2.

A platonist may suggest that this shows that noneism is just platonism in disguise.[30] Priest claims, however, that the manual breaks down in modal contexts. According to the noneist, Holmes does not exist, but might have done so. Under the translation manual this becomes: Holmes isn't a concrete object, but might have been one. Priest claims that this cannot be right, since Holmes is a concrete object. But, at least on some views, Holmes is not a concrete object: he is a merely possible object. Hence, this does not provide a counterexample to the translation manual.

Reply: Standard platonists about what a noneist calls nonexistent objects take them to be abstract objects of some kind. Abstract objects are naturally taken to have this status necessarily. There is no possible world in which 3, for example, is a concrete object. According to TNB (p. 136–137), x is concrete iff:

if x were to exist it would enter into causal interactions

(or better, be disposed to do so).[31] Given these assumptions, the counterexample works. For a variation, try:

Routley existed, but might not have done so

(if, e.g., his parents had never met). This is true for a noneist. The translation is:

Routley was a concrete object, but might not have been one.

That cannot be right, since if Routley were an abstract object in any possible world, he would be an abstract object in this world.

Hale asks us to consider a different sort of view, according to which to be concrete is simply to be in space-time. Nonexistent objects are clearly not concrete in this sense; whether or not we call them abstract does not really matter; what is important is that their concreteness status can vary across possible worlds. Such a view is to be found, for example, in Williamson (2002).[32] Given this understanding, the example clearly does not show the translation manual to break down: Routley would not have been a concrete object had his parents never met. But the translation manual then breaks down in other places. The counterfactual:

If 3 were concrete, it would be in space-time.

is true on this understanding—indeed, trivially so. The translation is:

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[30] TNB, Section 7.9.

[31] TNB actually says 'causally interacts *with us*'. This would mean that denizens of the world in parts of the world causually isolated form us would not be concrete. Hale points out (p. 107, footnote 18) that TNB sometimes uses 'concrete' simply to mean, not the counterfactual, but simply the categorical 'entering into causal interactions'. He is right to note this confusion. The text to Hale's note points out the the counterfactual definition of concreteness rules out using concreteness as a crition for existence, and wonders what could be. Answer: entering into causal interactions.

[32] There, Williamson defends an argument to the effect that everything necessarily exists. It is easy to see where the argument breaks down from a noneist point of view. It appeals to the claim ((2), p. 233) that if proposition x is true, then x exists. This is false from a noneist perspective. Truth is not an existence-entailing property.

If 3 were existent, it would be in space-time.

This is false for a noneist (ask Plato[33])—and certainly not trivially true.

§4. Et alia.

4.1. Entailing existence. *Objection:*[34] Priest does not give a principled characterization of which properties are existence-entailing and which are not—which is similar to the problem about the nuclear–extranuclear distinction that he points out. (Reicher quotes me as saying that it seems hard to specify which properties are nuclear without feeling that the class of properties has been gerrymandered to avoid problems).

Reply: The matter is not at all the same with existence-entailing-properties. How to handle the Characterization Principle is crucial to noneism.[35] The naive view is that all properties are characterizing; but this cannot be correct on pain of triviality. Going the standard route, a principled way has to be found to restrict the Principle. By contrast, the naive view is that some predicates (like 'John kicked') are existence-entailing, and some (like 'John thought of') are not. Nothing I have said challenges this view; so no restriction—artificial or otherwise—needs to be formulated.

In fact, the question of what predicates are existence entailing is completely orthogonal to noneism. You could, if you wish, hold that kicking is not existence entailing. This would not damage the theory at all. (Though entering into causal processes, like kicking, could then no longer be taken as a criterion of existence.) Conversely, you could hold that all predicates are existence entailing if you wanted. It would follow that either you cannot fear Gollum, find Poirot amusing, and so on, or that these objects exist. These may be silly views, but they do not occasion a collapse into triviality. Common sense can, for the most part, determine which properties are existence entailing; and where common sense provides no verdict on the matter (as, perhaps, in the case of 'is a prime number'), other theoretical considerations will have to determine it.

4.2. Nonexistent objects and the actual world. *Objection:*[36] It is unclear what properties nonexistent objects have at the actual world. One might suggest that they have properties like *being round in some nonactual world*… If so, Priest's solution [to the characterisation problem? GP] becomes structurally similar to [Zalta's] dual copula strategy.

Reply: I am not exactly sure what the problem is supposed to be here. Nonexistent objects cannot have existence-entailing properties, by definition. For the rest, what properties a nonexistent object has depends on the object, as it does for existent objects.[37]

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[33] Hale says (p. 108) 'I haven't managed to figure out why [worlds where 3 is a cat, and so can be stroked] are *more* bizarre than [less similar to] ours than one in which 3 (impossibly) exists, but (mysteriously) in splendid causal isolation'. I take it that Plato's story is at least *possible*, if false.

[34] Reicher, Section 5.1.

[35] Note that Reicher attributes to me (*ibid.*) the view that nonexistent objects have the properties they are characterized as having only at the worlds at which they exist. This is not my view. Objects have their characterizing properties at the worlds which realize the way the objects are represented as being in the appropriate cognitive state (TNB, Section 4.2). They may not exist at such worlds—indeed it may be part of their characterization that they do not exist. Conversely, they may exist at worlds without having their characterizing properties there: there are worlds where Sherlock Holmes exists and is a doctor, not a detective.

[36] Reicher, Section 5.1

[37] See, further, the reply in Section 2.4.

According to me, the red unicorn is red (and a unicorn), at some nonactual world. And since this claim is true, the object does indeed have the property *is red at some nonactual world* (at this world). I take the point about Zalta's two copula view to be this: what I express by saying that an object has a property, Zalta expresses by saying that the object *exemplifies* the property; what I express by saying that an object has a property at its characterizing worlds (the worlds that realize the way the intentional state represents things to be), Zalta expresses by saying that the object *encodes* the property. There is, indeed a certain similarity here, but the accounts are not structurally identical. For one thing, a characterized object may have all sorts of properties at a characterizing world that are not part of its characterization. (For example, Holmes may be either right handed or left handed at a world—though neither of these is in his characterization.) And since they are not part of its characterization, the object does not, according to Zalta, encode them. For another, I claim that characterization can be applied to *any* condition. To avoid contradiction, Zalta has to say that properties that involve encoding are not allowed to be part of a characterizing property. (See, further, the discussion in Priest, 2009b, sec. 8.)[38]

4.3. It is actually the case that. *Objection:*[39] Let $\mathcal{A}$ be the operator *it is actually the case that*. Such an operator is required to express thoughts such as the following: I'm imagining that Caesar was half as tall as he actually was. (This is, in fact, ambiguous, depending whether the thought is *de re* or *de dicto* about the height: $\mathfrak{S}x(\mathcal{A}Cx \wedge \Psi C\frac{x}{2})$ or $\Psi\mathfrak{S}x(\mathcal{A}Cx \wedge \Psi C\frac{x}{2}$.) In the first of these, $\mathcal{A}$ is, in fact, playing no essential role, since it is equivalent at @ just to $\mathfrak{S}x(Cx \wedge \Psi C\frac{x}{2})$; in the second, it is essential.) Consider the condition $x = x \wedge \mathcal{A}B$, for an arbitrary B. Let b be the object characterized by this condition. Then at some world, w, $b = b \wedge \mathcal{A}B$. Hence, B is actually the case.

Reply: The fact that $\mathcal{A}B$ holds at w, does not imply that $\mathcal{A}B$, and so B, is true at @, that is, that it is actually true.

But can we not suppose that the truth conditions of $\mathcal{A}$ are as follows? For any world w:

Act $w \Vdash^{+} \mathcal{A}B$ iff $@ \Vdash^{+} B$.

The last step would then follow.

No. Consider the necessity operator, $\Box$, with truth conditions as follows. If w is any *possible* world:

Nec $w \Vdash^{+} \Box B$ iff for every (possible) w', $w' \Vdash^{+} B$.

At any possible world, $\Box B$ is true iff B is true at all possible worlds. But at impossible worlds, things may be different: in particular, what is necessarily true at them may be different. $\Box B$ may be true at such a world even if it is not true at all possible worlds. It follows that the truth conditions of $\Box$ must be different at impossible worlds (TNB, p. 85, footnote 3).

So it is with the actuality operator. The truth conditions given by **Act** are correct if w is a possible world. Thus, if B fails at @, $\mathcal{A}B$ fails to be a necessary truth. But it may yet hold at an impossible world. Hence the truth conditions of $\mathcal{A}$ must be different at impossible worlds. $\mathcal{A}B$ may therefore hold there without @ being compromised.

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[38] In a footnote, Reicher attributes to me the view that nonexistent worlds are partly constituted by existent objects, since some of the objects there have "existence-entailing properties." But this means only that the properties they have at those worlds entail that they exist *at those worlds*, not that they actually exist.

[39] Beall.

For example, $\mathcal{A}$ may be given an arbitrary extension at such a world (as are matrices at open worlds in TNB). Alternatively, assuming that we can quantify over worlds, and that we have the resources of set theory in the language, $\mathcal{A}B$ can be defined as $@ \Vdash^{+} B$—where this, itself, is defined set theoretically, in the usual way. Even if the extension of '$\in$' is the same at all possible worlds, it may vary at impossible worlds. And if it be objected that $\mathcal{A}$ does not mean 'actually' at such worlds because it has changed it meaning there, the reply is that it has no more changed its meaning than 'red' does if it has different extensions at different worlds.[40]

Quite generally, one is never at liberty to suppose that the truth conditions of an operator that involve a world-shift are uniform across all worlds. If one were, there would be formulas that held at *all* worlds, possible and impossible. But impossible worlds cannot be constrained in such a way: they can violate any constraint. Such, indeed, is the nature of the beasts.

In the context of intentionality, another way to see the point with respect to $\mathcal{A}$ is as follows. For any meaningful claim, in particular $\mathcal{A}B$, we can imagine that it is realized. If the truth conditions for $\mathcal{A}$ allowed information to bleed back from an arbitrary world to the actual world, then we would be able to infer that B is actually true. Clearly this is not kosher: one can never move from the contents of one's imaginings to the real world—nice as this would be sometimes.

4.4. Mutual intelligibility. *Objection:*[41] A Quinean has one form of quantifier, $\exists$ (there exists). A noneist has two, $\mathfrak{S}$ (some) and $\exists$ (there exists) (where $\exists x A$ is $\mathfrak{S}x(Ex \wedge A)$). How is one to understand the relationship between the quantifiers in the two accounts? There are two natural possibilities.

Translation 1: $\exists x A$ (noneist) = $\exists x A$ (Quinean)
Translation 2: $\mathfrak{S}x A$ (noneist) = $\exists x A$ (Quinean)

Which is the correct translation? Under the first translation, Quineans will find $\mathfrak{S}$ and its machinations unintelligible—and perhaps noneists will find this unintelligibility unintelligible. Under the second translation, each can at least understand the other, though they still may not agree. In particular, Quineans will understand $\exists$ as some kind of restricted quantification. Since mutual intelligibility is a desideratum of translation, Translation 2 is the correct translation, and the noneist has an extremely bloated ontology.

Reply: The argument is flawed methodologically. There is absolutely no reason why, in a dispute between noneists and Quineans, everything said by one side must be translated into terms intelligible to the other. No one ever suggested that the notions of the Special Theory of Relativity need to be translated into categories that make sense in Newtonian Dynamics (or vice versa); no one ever suggested that Marxian economics (with its labor theory of value) need be translated into the categories of Keynesean economics (or vice versa). Though there may be partial overlap, each side may just have to learn a new language game. (Though—it would seem to me—the Quinean failure to understand the noneist language game is largely feigned. Most Quineans I know seem to me to understand the noneist language game perfectly outside the seminar room.)

Indeed, one can turn the methodological point on its head. The homophonic Translation 1 is intuitively the correct translation—both proponents, after all, intend $\exists$ to capture the

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[40] See also the discussion of meaning in Section 3.2.
[41] Lewis (1990).

English 'there exists'. Since Quineans cannot express $\mathfrak{S}$, noneists have a richer conceptual scheme. Richer conceptual schemes are methodologically desirable. Hence Translation 1 is to be preferred. This does not commit a Quinean to being a noneist. They may hold that $\mathfrak{A}x Ex$ (i.e., $\mathfrak{A}x\exists y\, x = y$). In this language they can actually *express* their view, and not just presuppose it. Noneists do not, therefore have a bloated ontology—that is, an over-generous view of what is/exists.

4.5. The identity of indiscernibles. *Objection:*[42] TNB, p. 88, defines identity in terms of indiscernibility: two objects are the same if they have the same properties at all (closed) worlds. But the identity of indiscernibles fails. For example, $+i$ and $-i$ are indiscernible. Similarly, in quantum mechanics, distinct fundamental particles may be indiscernible. (See Ladyman, 2005)

Reply: First, the fact, if it is a fact, that these things are indiscernible at this world, does not mean that they have the same properties at all worlds. The subatomic particles, for example, could be discernible at another.

Next, the fact that such things are extensionally discernible does not mean that they are intentionally so. Thus, for example, $+i$ can be such that I am thinking about it, whilst $-i$ is not. (See TNB, p. 88.)

Third, and most importantly, if the account of identity breaks down for existent objects, some other account of has to be given for these. Maybe identity is a primitive relation. I do not mind what account is given. As long as it does not involve causality or some other existence-entailing notion, exactly the same account will work for nonexistent objects. The identity of nonexistent objects is no more problematic than the identity of existent objects.[43]

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[42] Ladyman.

[43] For further discussion, see Priest (2009b), Section 7.

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