Critical Notices

Exploring Meinong's Jungle and Beyond. RICHARD ROUTLEY. Canberra: Australian National University, Research School of Social Sciences, 1979. Pp. xix, 1035.

> . . . *the theory [of objects] should . . . be about every thing — (just as* this text is *intended to be, in principle at least,* about everything). (348)[1]

I. Exploring Routley's Jungle

Exploring Meinong's Jungle and Beyond is a lengthy work (over 1000 pages) of wide scope, its cast of characters ranging from Abelard to Zeno. The nominal star is Meinong, of course, yet the real hero is Reid.[2] Topically, Richard Routley presents us with a virtual encyclopedia of contemporary philosophy, containing original philosophical and logical analyses, as well as a valuable historical critique of Meinong's work.[3]

Josiah Royce once offered the image of a map that represents that which it maps in *every* detail.[4] Routley's guide to Meinong's "jungle" suffers from an analogous complexity, in addition to being somewhat of a patchwork of previously published material, material that has only circulated in manuscript, and much else besides — not always seamlessly stitched together. My goal in this review is to offer a map of a map — a guide to Routley's jungle.

Among the pleasant surprises are the first version in print of the legendary proof that the existence of God is equivalent to the Axiom of Choice (133), a demonstration of Quine's unintentional (because unintensional) theism (134), and the geographical location of an existing Golden Mountain (143).

On a more serious level, there are valuable discussions of free logics and impossibilia (75 ff., 137 ff.); a nice set of counterexamples to Russellian and other standard description theories (118 ff.); a long discussion of current theories of proper names (145 ff.); an important discussion of language change — something all too often left out of formal accounts of language (344 ff.); chapters devoted to tense logic and the philosophy of time (361 ff.), to a rebuttal to Quine's "On What There Is" (411 ff.), and to refutations of standard objections to Meinongian theories (427 ff.) — the latter two being somewhat redundant in view of recent scholarship, yet useful nonetheless; a chapter on fiction (537 ff.); a lengthy attack on empiricism (740 ff.), which develops out of a rejection of abstractions (such as sets) (732), out of which

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1 Numerals in parentheses refer to page numbers of Routley's book.

2 Cf., e.g., chap. 6, "The Theory of Objects as Commonsense," especially pp. 529 ff., and chap. 12, sec. 1.

3 See, *inter alia,* chap. 5, "Three Meinongs."

4 Royce 1899; cited in Borges 1981: 234; cf. Rapaport 1978: 163 f.

also arises philosophies of mathematics and science (769 ff.); and an appendix on "ultralogic" (advertised as a universal logic).

As I said, the book is encyclopedic in scope. There is also an immensely useful bibliography of Meinong scholarship to 1978 and a reasonably adequate index — as well as lovely photographs of a real jungle and a scattering of Escher engravings.

On the other hand, Routley is occasionally a bit too informal in his nonformal discussions. E.g., "to have a reference is to exist" (39): But what *has* a reference, viz., a word, is not what exists, viz., the referent. He is also rather superficial in places. E.g., he claims that his Advanced Independence Thesis (AIT) (that nonentities have a nature) entails the falsehood of Existentialism (that existence precedes essence) since AIT entails that essence precedes existence (51): But surely this can only be taken lightly, for the Existentialist motto is to be understood as meaning that a person is only an *F* if he acts as an *F* (and even *that* has to be explicated), yet surely *some* properties of persons (e.g., non-"personality" properties) are determined before (or at least simultaneously with) their existence. And he can be annoyingly cavalier (albeit humorous), continually referring to Leibniz's Law as Leibniz's Lie (e.g., 96) or to NBG set theory as "No Bloody Good" (224).

Other impedences to the exposition are a high degree of dependence upon earlier work (especially Goddard and Routley 1973); misprints and missing symbols (perhaps unavoidable in a book this size);[5] annoying shifts of notation (e.g., from $\sim f$ to f (92 f.)); unexplained abbreviations (e.g., 'r-opaque' (103)); and a habit of using notation before or without explaining it (e.g., 'qu(a)' (123)). One's impression is that much of the book consists of in-house memos for the cognoscenti.

II. Routley's Project

If Meinong and Reid are the heroes of this work, then the "Reference Theory" (RT) — the theory that "truth and meaning are functions just of reference" (i) — is the villain. Routley sees his task as offering a different paradigm, *noneism,* which "aims at . . . a very general theory of all items whatsoever" (5). Where RT and its classical logic fail to provide solutions to problems of non-existence, intensionality, deducibility, significance, and context (ii), the noneist Theory of Items will — it is claimed — not only solve all of these, but also enable philosophers to treat adequately for the first time problems from the history of philosophy (including Reid's philosophy, Epicureanism, nihilism, sophism, fatalism, the Third Man), the philosophy of religion, the logic of perception, quantified tense logic, the problem of universals, and more (8-11). Noneism is Routley's patent medicine for all philosophical ills.

While Routley does offer arguments against RT, his basic approach is Copernican in spirit: RT is all right in a narrow region, but, while it can be extended somewhat (though not without criticism), it cannot be extended without distortion to the realm of intensionalia and non-entities. Therefore Routley suggests taking the intensional (better: non-referential) view as central. He takes subjects of sentences not to occur referentially unless explicitly

[5] Routley does at least apologize in advance for such lapses (vi).

stated (58 f.).

The approach is not to *replace* natural language (as Reference Theorists want), but to *use* and *extend* it (ii). If the fabric of language can be pictured as having peaks and valleys — referential and non-referential features — then Routley's scheme may be described as a "flattening out" to the non-referential (or non-existentially-loaded) level.[6] Routley's insistence on the importance of natural language underlies much of what he does here (and has done elsewhere). Insofar as the history of logic can be seen as an attempt (*inter alia*!) to understand natural language, then what Routley is calling attention to is a certain stagnation that has set in: Logicians have made certain abstractions or simplifications that they have then deified, requiring *language* to change, rather than changing logic to match language (cf. Rapaport 1981). Consider, as a relevant example, the material conditional — a useful, important abstraction, but a simplification of the ordinary-language use of 'if-then', which, as Routley and the Anderson-Belnap team have tried to show, does have a logic of its own (cf. 140, 289 ff.).

III. Meinong's Theses

This book is *really* about Routley's Theory of Items, and I shall turn to his basic theses presently. But since it is *nominally* about Meinong's Theory of Objects, I must pause to quibble with Routley's statements of some of Meinong's principles.

Principle M1 — "Everything whatever — whether thinkable or not . . . — is an object" (2) — is either false or misleading. For Meinong, objects (*Gegenstände*) are always objects of thought, hence thinkable at least in principle, although *some* objects, viz., those whose Sosein involves a large or infinite number of determinations (i.e., properties, on most interpretations), may not be thinkable in practice. Routley does not seem to be equating "object" with "object of thought," but rather with "thing" (in a non-existentially-loaded sense). Even more disquieting, Routley later takes 'object' in the Meinongian sense: "knowledge of nonentities [which the context clearly indicates to mean "object"] may be obtained by a range of cognitive procedures, e.g. perception, imagination, dreams, memory, inference" (352) — yet he seems to think that here he's *dis*agreeing with Meinong.

Routley's formulation of M4 — "Existence is not a characterising property of any object" (2) — is at least misleading. True, for Meinong, *"real"* existence is not part of any Sosein, but there is a "watered-down" version thereof that can be. Routley's views on existence are puzzling; they will be considered in detail, later.

Routley's *interpretation* of M6 — "An object has those characterising properties used to characterise it" — *is* wrong. He says that this "holds for impossibilia: so, for example, Meinong's round square is both round and square, and thus both round and not round" (3). While M6 does indeed hold for impossibilia, it does not follow *from M6* that the round square is round and *not* round — *unless* one adds the missing premise that *all* objects that are square are not round. And that takes some arguing; nor is it necessarily part of Meinong's or Meinongian theories.

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[6] Cf. Descartes, Meditation III (HR 161 f.), and Rapaport 1978: 162 f.

IV. Routley's Basic Theses

A. Noneism.

Minimal noneism (356) consists of seven Meinongian theses (M1-M7): the three just discussed, and these others (all acceptable) (2-3):

(M2) "Very many objects do not exist. . . ."
(M3) "Non-existent objects are constituted in one way or another. . . ."
(M5) "Every object has the characteristics it has irrespective of whether it exists. . . ."
(M7) "Important quantifiers . . . conform neither to the existence nor to the identity and enumeration requirements that classical logicians . . . impose. . . ."

Basic noneism adds (356):

(M8) "Universals do not exist but they are something."
(M9) "It is false that whatever can be conceived is possible."

Since the Theory of Items is intended to "extend" noneism (3), and since Routley spends most of the first third of the book on it, I shall turn from these generally unexceptionable theses to what I take to be the heart of Routley's contribution. (They are, of course, unexceptionable at least to those who are sympathetic to Routley's project.)

B. The Theory of Items.

Where the noneist theses are primarily ontological in nature, the Basic Theses of the Theory of Items are primarily linguistic or semantic.

(BT I) *The Significance Thesis:* "Very many sentences the subjects of which do not refer to entities . . . are significant . . . independent[ly] of the existence, or possibility, of the items they are [purported to be] about" (14),

where "the significance of a sentence is a necessary condition for it to express a statement of any sort, consistent or inconsistent, true or false" (14). Most philosophers of Meinongian sympathies would accept this.

(BT II) *The Content Thesis:* "Many different sorts of statements about nonexistent items . . . are truth-valued" (14).

That is, there are no truth-value gaps for such statements. Indeed, there are none at all (hence BT II), since "the gap theory depends on the assumption that all objects exist" (19), which is false in view of M1.

Both BT I and BT II are consistent with the RT's Ontological Assumption (OA), *rejection* of which is the essence of the Theory of Items. I find four versions of OA in the text:

(OA.1) "no (genuine) statements about what does not exist are true" (22).
(OA.2) "a non-denoting expression cannot be the proper [i.e., logical] subject of a true statement" (22).
(OA.3) "[*i*] nonentities are featureless, [*ii*] only what exists can truly have properties" (22).
(OA.4) "it is not true that nonentities ever have properties" (23).

Of some interest is the fact that, as Routley observes, OA.3*i* is a formulation unavailable to proponents of OA.1 (or OA.2): Suppose OA.1; then OA.3*i* is a statement about what does not exist (since no nonentities exist, according to proponents of OA). Hence, OA.3*i* thus expressed would be false; conversely, if OA.3*i* is true, then OA.1 is false! (OA.3*ii*, on the other hand, says (roughly) that for all *x*, if *x* has a property *F*, then *x* exists. Suppose OA.1; then, for all *x*, if *x* does not exist, then *x* lacks all properties; hence, OA.3*ii*. Conversely, if OA.3*ii* is true, so is OA.1.)

The rejection of OA, in all its forms, does a lot of work: It dissolves the problem of negative existentials and the "riddle of non-being" as well as entailing a rejection of existential generalization (42-44). While Routley does not say so explicitly, the negation of OA is, thus, another basic thesis:

(~OA.1) Some statements about what does not exist are true.
(~OA.2) A non-denoting expression can be the proper subject of a true statement.

And what would be (~OA.3*ii*) is officially BT III:

(IT) *The Basic Independence Thesis:* "That an item has properties need not, and commonly does not, imply, or (pre)suppose, that it exists or has being" (24).

A distinct, but related, thesis, equivalent to M3, is

(AIT) *The Advanced Independence Thesis:* "Nonentities (can and commonly do) have a more or less determinate nature" (24).

That items *do have* properties does not follow from the conditionally expressed IT, hence the need for AIT. Clearly, however, IT follows from AIT. Another valuable and important consequence of AIT is that Meinongian objects-of-thought are thing-like objects (52).[7]

Of more importance is M6, in the guise of

(CP) *The Characterization Postulate:* "nonentities have their characterising properties" (24).

This thesis is central to Routley's project, since, first, it entails AIT (hence IT) (51) *but not conversely,* for an object's merely having a more or less determinate nature does not entail its having its *characterizing* properties. Second, CP is thus the core version of the rejection of OA.

[7] For a discussion of the difficulties of showing this, cf. Rapaport 1976: 31-36, 180-89, 202.

However, Routley claims that CP follows from IT. I believe he is wrong: I have shown that AIT does *not* follow from IT, and that CP does not follow from AIT; but if CP follows from IT, the circle has been closed. Routley offers a "transcendental" proof of IT → CP (45): IT is true because nonentities have, *inter alia*, intensional properties; to have these, they must have characterizing properties; hence, CP. But let 'N1' and 'N2' be distinct names for an item whose *only* property is the *intensional* one:

(P) being that which John is now thinking of.

Now, surely(?), someone *else*, Jane, can think about N1 without thinking about N2 (if she does not know that N1 = N2); so, N1 and N2 have *intensional* properties *without* characterizing properties, unless (P) is a characterizing property. But, as we shall see, Routley's characterization of characterizing properties — which does not come till much later — has troubles of its own.[8]

Since CP is so central, it will be worthwhile to examine it further. Routley wants some restrictions on CP, viz., "sentence negation cannot figure in" it (90). This needs to be spelled out; consider:

where f characterizes x, xf (i.e., x is f)
∴ where $\neg f$ characterizes x, $x\neg f$ (i.e., x is *non-f*)

but where f does *not* characterize x, it does not follow that $x\neg f$. *Does* it follow that $\sim xf$ (i.e., that not-(x is f))? Now, Routley considers the following argument purporting to show that the admission of impossibilia renders CP inconsistent:

(1) Let $L(y)$ be a law of logic for arbitrary y.
(2) Consider $\iota x \sim L(x)$.
(3) By (1), $L(\iota x \sim L(x))$.
(4) By CP, $\sim L(\iota x \sim L(x))$.

Routley's rebuttal is that $\iota x \sim L(x)$ is not "assumptible" — i.e., CP does not hold *because of* sentence negation. So which line of the argument is wrong? It must be (4), which means that where f does not characterize x, it does *not* follow that $\sim xf$. But then what does '$\sim xf$' mean?

Routley could have his cake and eat it, too, *if* he would allow for a *second* (or "internal") mode of predication (such as what I have called *constituency*) in addition to the usual "external" mode (called by me *exemplification*; cf. Rapaport 1978: 159-62). With its help, the above argument runs as follows (letting L be as before):

Let $y = <\overline{L}>$ (i.e., let y be the Meinongian object whose sole constituting property is the property of being *not-L*).
Now, y *exemplifies* L, on the assumption that L is a law of logic for arbitrary items.
But, by the nature of exemplification, not-(y exemplifies $\overline{L}$).

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[8] I might mention that a *second* formulation of CP is also puzzling (46):
(CP′) $\left\{\begin{smallmatrix}\text{the}\\ \text{an}\end{smallmatrix}\right\}$ x which is f is f, provided f is "assumptible".
Not all predicates, we are told, are assumptible; but what is assumptibility? And is 'is' ambiguous; i.e., are there *two* modes of predication?

Yet, $\overline{L}$ *is* a *constituent* of *y*.

There is no contradiction, yet we have an unrestricted CP. (Cf. Rapaport 1976: 169, 196n.35; in fact, even if *y* = <exemplifying *L*>, we can have an unrestricted CP and no contradiction.) A similar argument can be mounted against Routley's stronger thesis that, where τ is a descriptor,

(UCP) *A*(τ*xA*)

is false without qualification (255). Hence, Routley's claim that restricting UCP is necessary condition for a logic's being consistent is false.

But it should be noted that, in an excellent section (1.21.2, pp. 253 ff.), Routley discusses why it is important *not* to *assume* that, e.g., the round square is round — that such a claim requires an explicit *principle*. The usual one is UCP: "assumed and described items have the characteristics they are assumed to have or are (accurately) described as having" *or*, he adds, that follow from such characteristics. While I disagree with the second part of this (cf. sec. III, above), I agree fully with the first part — a part that Routley himself is forced to reject.

A further reason for its rejection, according to Routley, is that it is self-refuting (256). Consider τ*y*~*A*(τ*xA*) (where *y* is not free in *A*). By UCP, ~*A*(τ*xA*); hence, ~UCP. (This is rather quick, but it is Routley's style. Perhaps he means that, by UCP, ~*A*(τ*xA*)[τ*y*~*A*(τ*xA*)], from which he concludes that ~*A*(τ*xA*), presumably by the principle that if the *y* which is such that the *A* is not *A* *is* such that the *A* is not *A*, then it must be the case that the *A* is not *A*.) But consider, on my theory, ι*y*[*A* is not a constituent of <*A*>]; i.e., consider *y* = <being such that *A* ¢ <*A*>>. The property of being such that *A* ¢ <*A*> *is* a constituent of, but is not exemplified by, *y*.

Routley examines a few *restricted* CPs, of which the following is most important (263):

(HCP) (P*x*) (ch *f*) (*xf* ≡ *A*(*f*)), with *x* not free in *A*.

(Here, '(P*x*)' is a non-existentially-loaded, "particular" quantifier; '(ch *f*)' means: "for all characterizing *f*"; and '*A*(*f*)' means: "*A* determines *f*" — i.e., *A* is the wff that specifies which *f* are, so to speak, in *x*'s Sosein.) That is, for any specification *A*, HCP holds; i.e., given a Sosein *A*, some item *x* has all and only the *characterizing* properties of *A*.

What, then, are characterizing properties? Routley likens his characterizing/non-characterizing distinction to, *inter alia*, Parsons's nuclear/extranuclear distinction (cf. Parsons 1980: 22 ff.). One motivation for it is (roughly) this: Consider *d* = ι*x*(*xr* & *xs*), where *r* = is red, *s* = is simple (i.e., has only one property). If *r*,*s* are characterizing, then *dr* & *ds*. Hence, ~*ds*; hence, *r*,*s* are *not* both characterizing. "*The* resolution is simply that 'is simple' is extranuclear"; *s* "is a property of 'higher order'" (265; my emphasis). But surely there are other resolutions; e.g., *r*,*s* c <*r*,*s*>, but not-(<*r*,*s*> ex *s*): *s* is higher order with respect to the exemplification mode of predication, but not with respect to the constituency mode. (This move even seems to be available to Routley; cf. n. 8.)

On pp. 265 ff., Routley at last offers his "quasi-inductive elaboration" of the characterizing/non-characterizing distinction. But it is inconsistent:

Ch(1): Descriptive predicates (as contrasted with evaluative predicates) are characterizing; i.e., classificatory and essential predicates *as well as their predicate negations* are characterizing.

Ch(2): Compounds of characterizing predicates, *including conjunction*, are characterizing.

$\overline{\text{Ch}}(1)$: Ontic predicates (e.g., existence- and (non-existence)-implying predicates and their negations) are *not* characterizing.

There is more, but these will suffice, for:

red is characterizing, by Ch(1);
∴ ~*red* is characterizing, by Ch(1);
∴ *red & ~red is* characterizing, by Ch(2);
But *d* = ι*x*[*x*(*red* & ~*red*)] is such that *d*(*red* & ~*red*);
∴ ~*dE* (where '*E*' means: "exists");
∴ *red* & ~*red* is *non*-characterizing, by $\overline{\text{Ch}}(1)$.

V. Neutral Logic

The next step in Routley's overall argument is that "since classical logic embodies the Reference Theory and the Reference Theory is false, classical logic is wrong" (73). So a new logic is needed: *neutral logic*. It is approached by successive approximation (165 ff.).

After rejecting classical logic for its inability to deal adequately with non-significant and incomplete sentences, Routley offers us *zero-order logic*, dealing syntactically with subjects and predicates, but no quantifiers, with the following *objectual* semantics:

A *model* **M** = $<T,D,I>$ consists of the "real world" T, a domain D of *all* "objects" (whether existing or not), and an interpretation function I such that: where x is a subject, $I(x) \in D$; where f^n is an n-place predicate, $I(f^n) \in D^n$; and $I(xf,T) = 1$ iff $I(x)$ "instantiates" $I(f^n,T)$.

As a logic, this is neat. Yet some serious questions can be raised: What *are* objects? *Routley has not yet said* — in the 170 or so pages thus far, he seems to be taking this as a primitive notion. (But see below for a guess at what they are.) More importantly, though, what is "instantiation"? Routley also adds a predicate E, for 'exists', and claims (173) that, where $I(b)$ = Sherlock Holmes, $I(bE,T) \neq 1$; i.e., $I(b)$ does not "instantiate" $I(E)$. Now, first, $I(E)$ must be the subset of D consisting of all existents; so, $I(b)$ does not "instantiate" that subset. This makes sense if "instantiation" is set-membership; but, then, why — especially given Routley's "intensionocentric" methodology — does he employ such an *extensional* view of predication?

Neutral quantification logic adds two quantifiers, U ("for every") and P ("for some" or "there is (are)") — both in non-existentially-loaded senses — with the usual formation and interdefinability rules. Free and bound variables are introduced as usual, with the contention that if x is free for t in A, then $A(t/x) = S^x_t A$, else $A(t/x) = A$; function parameters and constants are added; and formation rules for terms are given. There are three new axiom schemata:

$Uxa \supset A(t/x)$
$Ux(A \supset B) \supset . A \supset (Ux)B$, if x is not free in A
$A \rightarrow UxA$

(What is '$\rightarrow$'?)

The semantics is provided by a model **M** = $<T,D,I>$ as before. Where f^n is an n-place *function*, $I(f^n,T)$ is an n-place *operation* on D^n; where t is a term and d is a function, $I(td) = I(t)I(d,T)$; and $I(UxA, T) = 1$ iff every interpretation I' agreeing with I on all variables and parameters except possibly on x is such that $I'(A,T) = 1$.

Note that classical logic is embedded in this, but D also contains inconsistent and incomplete objects. Routley *defines* the *existential* quantifier thus: $\exists xA =$df $Px(xE \;\&\; A)$.

This logic is then successively extended. First, he adds the predicate constant E (to which I shall return). Next comes the predicate constant $\Diamond$ ('is possible'), with two new quantifiers: ΣxA =df $Px(x\Diamond \;\&\; A)$, ΠxA =df $\sim\Sigma x{\sim}A$; no semantics is given, but presumably $I(x\Diamond,T) = 1$ iff $I(x) \in$ the subset of D containing the possibilia.

Another extension is to predicate negation: Syntactically, where h^n is a predicate parameter, so is $\sim h^n$; $t{\sim}{\sim}h \equiv th$; but $t{\sim}f \supset u{\sim}g \not\equiv ug \supset tf$. Semantically, $t{\sim}f$ is to be assigned a value *independently* of tf; but surely we would want $\sim f$ to be such that when $I(t) \in$ the subset of D consisting of existents, then $I(t{\sim}f) = I({\sim}tf)$.

Finally, there are extensions to general descriptors and to identity. With respect to the latter, a two-place predicate constant $\approx$ is added, such that $u \approx u$, $u \approx v \supset . A(u) \supset A(v)$, and $I(t_1 \approx t_2, T) = 1$ iff $I(t_1) = I(t_2)$. Note that, because there can be intensional predicates, $\approx$ is not *extensional* identity. That has to be defined in terms of extensional predicates plus the predicate 'the predicate —— is extensional'.

Of most interest is Routley's generalization of his model-theoretic semantics to *worlds semantics*. *Worlds* are objects where statements "hold":

$A\eta c$ =df statement A holds at world c.

Then $I(A,c) = 1$ iff $A\eta c$. By definition, c is a *complete possible world* iff for all wffs A,B, η is closed under $\sim$, &, v. The *range of* c, $r(c) = \{A: A\eta c\}$, is said to *represent* c. Only the "actual" world exists, but all worlds have "features". (The world T, which appeared in the model-theoretic semantics, is the *factual* (= actual?) *world*.) Where a,b are worlds, $b \leq a$ iff for all C, if $C\eta a$, then $C\eta b$ (*sic*; surely he means $\geq$).

Worlds have *domains*: $d(a)$ =df the set of objects "in" the world a (but "in" is not explained), $e(a) \subseteq d(a)$ is the set of *entities* (i.e., existents) of a, and $p(a) \subseteq d(a)$ is the set of possibilia of a. The domains of worlds can overlap — e.g., $d(a) \subseteq d(b)$ or $d(a) \cap d(b) \neq \varnothing$ — so the *same* Pegasus can be in more than one world: But will Pegasus have different properties in different worlds? If so, then *Routley's objects are bare particulars*![9] Also, since Pegasus $\in d(T)$, if Pegasus $\in e(a)$ for $a \neq T$, then Pegasus can *exist* in more than one world (while, of course, not existing in others).

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[9] So are mine; cf. Rapaport 1978: 170.

Finally, for any world a, its *referential impoverishment* is the world $c(a)$ such that $d(c(a)) = e(a)$. In particular, G =df $c(T)$ is the "actual referential world"; its range is a proper subset of $r(T)$.

Further extensions to the logic are made throughout the book, and relevance implication and entailment eventually make their expected appearance (288 ff.). I shall return to the predicate E in the next section, but I have one final observation: There is an interesting analogy between Routley's style and the style of artificial-intelligence research: Is the goal to produce an AI system that behaves *and* operates just like a human, or merely one that *behaves* like one? Similarly, do we want a semantics that mirrors the syntax *as well as* that tells us *what* objects are and *how* they have properties, or merely one that makes the syntax complete? My feeling is that Routley has offered us the latter, when what we want from him is the former: an *account* of what *objects* are, what *properties* are, and how they are related (i.e., an account of *predication*).

VI. Existence

These issues come to a head when questions concerning 'exists' and existence are raised. Routley says that for the same reason (viz., CP) that 'the golden mountain is golden' is true,

(*) The golden mountain which exists exists

is false *and that therefore* existence is not a ch-property (47).[10] But as is well known (cf., e.g., Rapaport 1978: 155, 165), there can be an equivocation on 'exists' in (*). Yet Routley neither mentions it nor says *why* (*) must be *false because of* CP.

What, then, is Routley's theory of 'exists' and existence, and does he really want to deny what virtually all other Meinongians affirm, viz., that (*) is true? "Existence is a property: however . . . it is not an ordinary (characterising) property" (180). Yet, if instantiation *is* set-membership (cf. sec. V, above), then there is *no* difference between E and any other predicate, i.e., between existence and any other property (i.e., subset of D). Why, then, does he say that existence is not a ch-property? (There is no argument for this in his Section 1.17.1 (180 ff.).)

The extension of neutral quantification logic by E ought to provide an answer: E is a one-place predicate constant; $\exists xA$ =df $\mathrm{P}x(xE \,\&\, A)$; $\forall xA$ =df $\sim(\exists x)\sim A$; and $\vdash \forall xB \equiv \mathrm{U}x(xE \supset \mathrm{B})$. We are told (188) that 'a does not exist' "can be explicated as" 'a' is a subject term without a referent. What does this mean? That $I(a) \notin D$? Surely not; for how, then, could we talk of round squares? The semantics make matters more puzzling: Where $D_e \subseteq D$ is the domain of *entities*, and $\mathbf{M} = <T,D,D_e,I>$ is a model, $I(xE,T) = 1$ iff $I(x) \in D_e$. But this is precisely the interpretation I gave before. Once again we must ask: How does existence differ from other properties?

Routley finally provides a definition of 'exists' (244):

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[10] Routley's example is about the round square, but the problem is best formulated in terms of the golden mountain, as Meinong observed (Meinong 1907: 223; trans. in Rapaport 1976: 92-94).

$xE =_{df} (\mathrm{U}\ \mathrm{ext}\ f)\ [\Box(x\text{-}f \supset {\sim}xf)\ \&\ \nabla\mathrm{T}({\sim}xf \supset x\text{-}f)]$,

where $\nabla\mathrm{T}A$ (it is contingently true that A) $=_{df}\ \nabla A\ \&\ A$ (by which I assume he means: A is contingent and A is true). That is, '*x* exists' means: for all extensional *f*, it is *necessarily* true that if *x* is *non-f*, then not-(*x* is *f*), while it is only *contingently* true that the converse holds. (But what does it mean to say that *A* is contingently true?)

But this makes *E* quite a different sort of predicate from others; indeed, the *mode* of predication is different, and it seems clearly not to be a ch-property. But why? If there are other ch-properties that have definitions like this, such as

(G) *x* is green =df *x* reflects light of wavelength 5500Å,

then existence *could* be a ch-property. That Routley now has (at least) two modes of predication falls out of his earlier claim (232 ff.) that $I(xE,a) = 1$ iff $I(x)$ instantiates $I(E)$, together with an interpretation of this definition as a cashing out of *what* instantiation *is* for *E* (just as (G) is cashing out of what instantiation is for 'is green'): It seems as if instantiation is different for different predicates. Yet Routley steadfastly denies that there is more than one mode of predication (in, e.g., his criticisms of my work (883 ff.); but cf. n. 8), and he goes to the trouble (as we shall shortly see) of introducing a *second* sort of existence (enabling him to deal with the existing golden mountain) that is not needed once more than one mode of predication is allowed.

Existence is different from other properties, since it is a second- or higher-order property of sorts: a property had by an object in virtue of its *other* properties. But then why treat *E* syntactically on a par with other properties? Of course, for natural-language purposes, it *should* be thus treated, but, then, why *isn't* it a ch-property? (Incidentally, since *E* as well as $\bar{E}$ are extensional (232), *E* is impredicatively defined.)

Existence seems at once to be and not to be a ch-property. The resolution — if such it is — is provided (270) by a new operator, *s*: Where *f* is a predicate, *sf* is the predicate: "presents itself as *f*"; it satisfies

if ${\sim}\mathrm{ch}(f)$, then $\mathrm{ch}(sf)$;
if $\mathrm{ch}(f)$, then $sf \approx f$.

(This is reminiscent of Grossmann's "is imagined to have"-operator (Grossmann 1974: 75), *which Routley attacks* (462 ff.)!)

A version of CP is available, as well as other principles:

(JCP) $sA(\xi xA)$, for all *A* such that *sA* is well-defined (where ξ is a general descriptor)
$s(tf) \approx tsf$ (where *t* is a term)
$s(A\ \&\ B) \approx s(A)\ \&\ s(B)$.

Thus, where $c \approx \xi x(xE\ \&\ xg\ \&\ xm)$ — i.e., where *c* is a golden mountain that exists — and where $\mathrm{ch}(g)$, $\mathrm{ch}(m)$, and ${\sim}\mathrm{ch}(E)$, JCP yields *csE, cg, cm*. So, *sE* is the "watered down" version of 'exists' needed to resolve the problem of the existing golden mountain.

If this is not confusing enough, Routley presents a different theory of existence in chapter 9. Here,

xE iff x has referentially acquired properties (728),

where a property is *non*-referentially-acquired if it is acquired "through assumption and characterisation" or "through intensional determination" — all of which can occur for entities as well as non-entities — and a property is *referentially* acquired if it is acquired "as a result of [the entity's] behavior in the real world G".

Now, these two ways of acquiring properties sound like two modes of predication, the former corresponding to "internal" predication (or constituency), the latter to "external" predication (or exemplification). Of course, for Routley, *entities* can acquire properties in both ways, non-entities only in the former. (On my theory, Meinongian objects can have properties in both ways, non-Meinongian actual objects can only exemplify properties; perhaps this is why Routley calls my theory a referential one (883). My theory *is* referential, but only in the harmless way that Routley characterizes as the "everyday sense" (53).)[11]

What is left at loose ends is how this relates to Routley's semantics for E.

VII. The New Lockeans

The chief problems with this book are its length (Routley asks us to treat his opus as a single theory (viii), but, if so, it threatens to be an inconsistent one) and its tendency to refute theories *en masse*. As a final example, consider what he calls the New Lockeanism. "New Lockeans" are "those who try to represent non-existent objects in terms of set-theoretical constructions of properties, or to reduce them to such" (876), including Castañeda (e.g., 1972), Parsons, and the present reviewer. But at most Castañeda falls under this rubric; Parsons and I both merely find talking about such sets as more perspicuous than talking about objects. But neither of us are reductionists, and mere representing should be no sin: Routley can do it, too, since corresponding to every object is the set of its (ch-)properties.

Routley says that in Castañeda's and Parsons's theories, "objects are or are represented by sets of properties" — true — "i.e., are set-theoretic functions of certain sets of properties" (879) — true for Castañeda, false for Parsons:

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[11] Cf. Rapaport 1976: 111f. Routley accuses me of implicitly accepting OA (885). But I don't see how: I agree with the negations of OA in all forms. E.g., (~OA.1) 'The golden mountain is golden' *is* true, (~OA.2) 'The golden mountain' *has* features, (~OA.3*ii*) 'The golden mountain' *has* properties. Routley says that invoking OA underlies my claim that Meinongian objects are actual, else they would not exemplify properties — i.e., that *non*-actual things cannot exemplify properties. That may *sound* like OA, but it is not, because of my distinction between two modes of predication: I accept the following:

Only what is *actual* can *exemplify* properties.
Only what is *actual* can *be constituted by* properties.

I deny the following:

Only what *exists* can *exemplify* properties.
Only what *exists* can *be constituted by* properties.

The round square does not exist but *does* exemplify the property of being a Meinongian object and *is* constituted by the property of being round. Perhaps Routley is *technically* right: I accept a *version* of OA — but a *harmless* one — and one that captures a *true* insight of philosophers from Parmenides on.

Castañeda's guises *are* identical to the result of a certain operator applied to sets of properties (the c-operator); but Parsons's objects are merely *isomorphic*, not identical, to such functions on sets. Routley says that "on each of the theories . . . Pegasus is a set, has elements . . ." (879); this is false even for Castañeda: While Pegasus = c{being winged, being a horse, . . .}, being winged $\notin$ Pegasus.

Most startling are Routley's main criticisms of Castañeda (881 ff.).[12] First,

(1) Let d = c$\{E,R,\overline{R}\}$, where $\overline{R}$ is the property of being such that the property of being round does not apply, R = being round, and E = exists;

∴ (2) dR

and

(3) $d\overline{R}$;

∴ (4) $\sim dR$ (from (3)).

But the move from (3) to (4) is not only not allowed in Castañeda's theory, distinguishing as it does between predicate and sentence negation, it is a move even Routley does not permit: Some 800 pages earlier (88), he, too, made the two-negations distinction.

Second,

(1) Let p = c{being true, materially implying s}

(2) Let s be a false proposition.

∴ (3) p

and

(4) $p \supset s$.

∴ (5) s

But Castañeda's theory does not sanction the move to (3) (understood as: p is-externally true; presumably, unless p is self-consubstantiated, i.e., exists); (4) holds only internally, also, so (5) would not follow; and, at worst, (1)-(5) would show that p is-internally true yet is-externally false — which is no contradiction, as Routley should well appreciate.

VIII. Conclusion

There is much to admire in Routley's compilation, as well as much to ponder, to question, and to criticize. The book would have been better had it been more coherent (in all sense of that word), but the effort required to plow through it is often rewarded.

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[12] I am indebted to correspondence with Castañeda on these points.

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Even among the closest associates of Husserl, hardly anyone has followed the long and involuted path trodden by the founder of phenomenology more closely than Ludwig Landgrebe. Heidegger, like Landgrebe at one time an assistant to Husserl, effectively broke with the style of Husserlian phenomenology years before the publication of his *Being and Time*. Eugen Fink and Oskar Becker, two other prominent assistants in Husserl's seminar, too have gone their own way. Fink's later works particularly seem to belie, both in themes preferred and methods applied, his earlier role as trusted interpreter of his master's most intricate thoughts. Landgrebe, by contrast, never ceased to identify himself with Husserl's main cause, and his numerous interpretive works document probably the most dedicated and consistent efforts to carry on Husserl's philosophy made by an insider of his original circle.[1]

[1] There are two books by Landgrebe now available in English translation: *Major Problems in Contemporary European Philosophy* (New York: Frederick Unger, 1966), and *The Phenomenology of Edmund Husserl: Six Essays by Ludwig Landgrebe,* ed. Donn Welton (Ithaca: Cornell University Press, 1981). The readers may be reminded of two additional articles in English translation that are especially relevant to the question of *aporia* discussed here: "Phenomenology as Transcendental Theory of History" in *Husserl: Exposition and Appraisals*, ed. Elliston and McCormick (Notre Dame: University of Notre Dame Press, 1977), pp. 101 ff., and "The Life-World and the Historicity of Human Existence" in *Research in Phenomenology*