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THREE CONCEPTIONS OF MODAL REALISM

by JOHN DIVERS

A THESIS SUBMITTED FOR THE DEGREE OF Ph.D IN THE FACULTY OF ARTS IN THE UNIVERSITY OF GLASGOW IN AUGUST 1990, BASED UPON RESEARCH CONDUCTED IN THE DEPARTMENT OF PHILOSOPHY

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ERRATA

p.1 para 3 line 2: Delete "of this cause".
para 3 line 8: Delete "tread", insert "trod".
p.14 para 1 line 2: Formula to read: $(\exists F)(\exists F(\text{things}) \& - \text{Actually } F(\text{things}))$.
p.18 para 2 line 7: Delete "(13)", insert "(15)". Delete (14), insert (16).
p.31 para 4 line 1: Insert "is" to form "natural justice is on the side..."
p.82 para 5 line 3: Typo: For "ths", read "this".
p.100 para 3 line 7-10: Delete the sentence "It will..... reality.". Insert "It will appeal to Lewis to view possible world talk as conforming to the Quinean history i.e. as ascending to a status whereby they are used successfully to record features of (modal) reality."
p.102 para 3 line 6 Delete "paints".
p.105 para 3 line 1 Delete "deal".
p.110 para 2 line 1 Delete "in some".
para 2 line 2 Delete "obtain", insert "obtains".
p.116 para 4 line 8 Typo: For "assertibilit", read "assertibility".
p.121 para 1 line 1 Delete "sufficient", insert "necessary".
p.125 para 1 line 9-13 Delete the sentence, "The relevance..... Appendix B." Insert the sentence, "I will show that the failure to draw this distinction leads McGinn erroneously to attribute to Putnam the acceptance of an extreme realism about modality - realism with independence."

para 2 line 6 Formula to read:

$(\text{IND}) \quad \Diamond (\exists x)(\exists y)(B^x \& B^y \& A^x \& -A^y)$

para 2 line 9 Formula to read:

$(\text{WEAK}) \quad [((\exists x)(B^x \& A^x)) \rightarrow (y)(B^y \rightarrow A^y)]$

p.137 para 1 line 5 Delete "in such instances".
p.144 para 1 line 1-2 Formula to read:

$(\text{SWR}) \quad [((\exists x)(B^x \& A^x)) \rightarrow (x)(B^x \rightarrow A^x)]$

p.169 para 2 line 19 Delete "not".
p.213 para 2 line 5 Delete "to".
p.216 para 3 line 1 Insert "to", to read "The most potent form of opposition to realism...."
p.221 para 3 line 18 Delete "[(12.@)]"
p.233 para 5 line 20 Typo. For "nomanilizing", read "nominalizing".
p.248 para 1 line 9 Formula to read:

$(\text{DFM2}) \quad L_1=\text{df}: \text{the language } L \text{ such that for any sentence of } L, S; \text{ TRUE (S,L) iff}$

【case (a) S="The moon is blue" & The moon is blue or case (b) S="Snow is white" & Snow is white】 & (syntactic restriction) no other inscription is a sentence of L.
ACKNOWLEDGEMENTS

In the period in which this thesis has been written, I have derived help, support and stimulation from many friends and colleagues. I am pleased to take this opportunity to acknowledge these contributions and to express my gratitude to all concerned. My thoughts on the issue of modal realism have developed over the last ten of the twelve years which I have spent in the Philosophy Dept. at Glasgow. In that time I have benefitted from, and enjoyed enormously, conversations and discussions with many, many friends, students and colleagues. In this respect, my gamble is to acknowledge ridiculously few of these contributors rather than risk the greater degree of offence that might be caused to anyone by unjust exclusion from a longer list.

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Other personal debts are less easily acknowledged in this context but to say nothing here would be a far worse offence than to fail, as seems inevitable, of an adequate expression of gratitude. My parents Betty & Robert Divers have always been totally supportive of my attempts to pursue my education and the sacrifices that they have made in order that I should have that choice reflect the importance and value which they associate with education. It is a cruel irony that they were prevented from pursuing their own education in virtue of their being part of the vast majority who are neither encouraged, nor can afford to do so regardless of their ability and potential. My wife and friend Lynn Divers has given an unbelievable amount to this project over the last eight years and without her support and consideration, the thesis would never have been completed. This thesis is in all but the most narrow sense a joint effort on our part.

John Divers
August 1990
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THREE CONCEPTIONS OF MODAL REALISM:
(SUMMARY)

The thesis is divided into three sections. The first of these is a critique of the conceptions of modal realism due to Lewis; the second, a critique of that due to McGinn. The third section comprises the development and initial evaluation of a third conception of moral realism which I term secondary modal realism. In Section One of the thesis [Ch.1- Ch.5] I argue against the acceptability of the objectual modal realism of David Lewis and I argue (tentatively) for one theory of the meaning of possible world statements which is consistent with this denial of the existence of possible worlds. Chapters 1- 4 concern the former argument, Ch.5 concerns the latter.

In Ch.1, I argue that there is no genuine semantic utility afforded by the adoption of realism about possible worlds. The case is (i) that the genuine semantical utility which does accrue via the ontological commitment to possible worlds can be had without that ontological commitment and (ii) that other claims to semanti utility which are associated with possible world semantics do not reflect legitimate semantic-explanatory interests. The main part of the discussion of objectual realism - constituted by Chapters 2, 3 & 4 - takes a different turn. Since Lewis is fond of comparing his modal realism to realism about the entities of mathematics, I attempt to show that, on both epistemological and metaphysical grounds, the comparison is quite unfavourable for objectual modal realism. In Ch.2, I defend the objectual modal realist's right to an a priori epistemology of modality in face of Benacerraf's dilemma, but, it is argued in Ch.3, even granted a priority, there is still a serious epistemological difficulty since the internal epistemology of modal realism which is proposed by Lewis is seriously flawed. In Ch.4, it is argued that there is at least one important metaphysical consideration which militates against an ontological commitment to worlds but which does not appear to have the same impact re. mathematical ontology, viz: that the mooted possible worlds are identification- transcendent. Having made the case for anti-realism about possible worlds I am concerned in Ch.5 with the outline of a theory of the meaning of possible world statements which is consistent with this ontological position. I argue for the unacceptability of a theory, outlined by Forbes, which depends upon the claim that possible world statements do not mean what they appear to mean. I then counterpose the options of an error theory and a metaphor theory of world-talk arguing that while both of these are prima facie tenable, the latter is preferable.

In Section Two of the thesis [Ch.6 - Ch.9] I deal with the non-objectual modal realism of McGinn. Having set out the salient theses of McGinn's conception of modal realism [Ch.6], the critique of this conception follows. Ch. 6: the variety and resources of anti-realisms about modality are seriously underestimated by McGinn. In particular the option of anti-realism based on the strategy of proposing a sceptical solution as a response to a sceptical paradox is ignored. Ch.7: McGinn proposes that the only defensible form of modal realism consists in endorsing the thesis of supervenience (without reduction) of the modal on the actual. However, the discussion of supervenience fails to acknowledge many of the difficulties associated with the
application of supervenience and related theses in the modal case. Furthermore, there is every reason to believe that acceptance of modal/actual supervenience involves no commitment to modal realism. Ch.8: consideration of the issues that flow from the discussion of the thesis of supervenience should point towards a central question of modal epistemology i.e. whether modal knowledge is attainable by conceptual means alone. However, McGinn's discussion of supervenience leads him away from this central question and as a result he mislocates the problematic nature of modal epistemology in the claim that we cannot represent modal facts as causally explaining our knowledge of them. Ch.9: The modal realism that McGinn offers is wholly unacceptable since it provides neither a clear conception of the truth-conditions of modal statements nor any account of how we detect modalities. The realism he offers is redolent of sceptical paradox and seems ripe for an anti-realist treatment in the form of a sceptical solution.

Hence, the upshot of the first two sections is that the existing conceptions of modal realism, i.e. those of Lewis and of McGinn respectively, are indefensible. In Section Three of the thesis [Ch.10 - Ch.12] the aim is to characterize and evaluate a third conception of modal realism - secondary modal realism. This project is inspired by (i) McDowell's secondary quality conception of moral reality and (ii) the observation of crucial similarities between the failings of more traditional conceptions of moral realism and those conceptions of modal realisms dealt with above.

In Ch.10, I argue that anthropocentricity as opposed to perceptibility is the feature of paradigmatic secondary properties which is an appropriately generalizable feature of secondary realism and that a proper conception of the standard of correctness for secondary property judgments facilitates the extrapolation of that standard to the cases of moral and modal judgement. In Ch.11, I argue that statements of metaphysical necessity - like statements of logical necessity and statements of moral evaluation - are statements which have an expressive role and whose acceptance is related constitutively to certain courses of conduct. Following an attempt to outline the nature of the commitment that is expressed in a claim of metaphysical necessity, I argue that the only recourse for modal realism is to accept the descriptive/ non-descriptive duality of the role of these modal claims. In Ch. 12, I gauge the degree of departure from more traditional realist themes to which the secondary modal realist is committed while emphasizing the contrast between secondary modal realism and sophisticated anti-realism in the form of Blackburn's quasi-realistic projectivism. I argue that modal parallels of those arguments which Blackburn deploys in an attempt to establish the superiority of projectivism over realism in the moral case either fail outright, or succeed against the target they characterize but remain irrelevant to secondary modal realism as developed here. Finally, I attempt to chart the course for further work by, first, noting a lacuna in McDowell's case for his favoured explanatory test for reality and then indicating how this might be filled to yield a (sketch of a) transcendental argument for modal reality
It is twenty years since Saul Kripke gave the lectures that made up his "Naming and Necessity" and so twenty years since the birth, or re-birth, of the concept of *metaphysical necessity* that features throughout contemporary discussions of metaphysics and modality. As such the concept of metaphysical necessity has flourished alongside, but with a surprising degree of independence from, the most recent attempts to characterize objectivity in what is commonly known as the realism/anti-realistm debate. This thesis is an attempt to integrate these two regions of contemporary philosophical interest with a view to establishing whether some conception of metaphysical necessity which is recognizably realist might emerge as tenable.

Before that can be pursued with good conscience, it is necessary, in my judgement, to attempt to "settle accounts" on two scores pertaining to possible worlds- hence Section One The first matter is the objectual modal realism proposed by David Lewis (i.e. the assertion of the existence of other possible worlds) and the second is the use of *possible world talk*. The compulsion to engage in David Lewis's challenging and sometimes infuriating dialectic was borne from a conviction that his objectual modal realism was for the most part attacked on inappropriate (generally nominalistic) grounds. The desire to provide a theory of the use of possible world-talk was borne out of a dissatisfaction with the degree of exposure that the issue has enjoyed hitherto, and with the atmosphere of complacency in which denial of the existence of worlds is not disturbed overmuch by the ubiquity of world talk.

In pursuing the integration of modal matters with the wider realism/anti-realism debate, of this cause I have drawn upon Colin McGinn's lengthy and important paper "Modal Reality" to the extent that one third of the thesis, Section Two, is concerned directly with the ideas contained with that paper. Although I find myself in extensive disagreement with many of the proposals and strategies which McGinn advances, I would be happy to view this thesis as an attempt to follow, one decade on, the path of investigation of modal realism that was first tread in "Modal Reality". My alternative to McGinn's modal realist problematic is offered in the final section of the thesis and it is less conclusive than I would have liked it to have been. However, the direction of theorizing which is suggested in that section - i.e. the construction of modal realism in the style of a more developed moral counterpart - strikes me as a genuinely promising strategy which will repay further work. If that strategy should strike the reader as less than promising, it is to be hoped that its airing will at least prompt superior alternatives in the modal realist/anti- realist debate which Simon Blackburn has characterized appropriately as an "infant industry".
David Lewis is an objectual realist about modality. By the term "modal realism" he intends an ontological, existential thesis which affirms the reality of modal objects i.e. non-actual possible worlds (and their contents). Lewis describes his own view as genuine modal realism since he conceives of the worlds whose existence he affirms as sui generis entities and he contrasts this view with ersatz modal realism, according to which possible worlds are constructs of entities of a more familiar kind such as propositions or imaginative acts. The definitive statement of the case for genuine modal realism is as follows:

"If we want the theoretical benefits that talk of possibilia brings, the most straightforward way to gain honest title to them is to accept such talk as the literal truth. It is my view that the price is right, if less spectacularly so than in the mathematical parallel. The benefits are worth the ontological cost. Modal realism is fruitful; that gives us good reason to believe that it is true.

Good reason; I do not say it is conclusive. Maybe the theoretical benefits to be gained are illusory, because the analyses that use possibilia do not succeed in their own terms. Maybe the price is higher than it seems, because modal realism has unacceptable hidden implications. Maybe the price is not right; even if I am right about what theoretical benefits can be had for what ontological cost, maybe the very idea of accepting controversial ontology for the sake of theoretical benefits is misguided. Maybe - and this is the doubt that most interests me - the benefits are not worth the cost because they can be had more cheaply elsewhere."

Anti-realism about worlds - the position that I wish to defend - has it that there are no (non-actual) possible worlds genuine or ersatz. The anti-realism on offer here will be articulated as a challenge to Lewis's argument from utility (outlined above). My discussion of objectual realism breaks into three parts. The first part is constituted by Chapter 1, in which I argue that there is no genuine semantic utility afforded by the adoption of realism about possible
worlds. The second part of the discussion of objectual realism - constituted by Chapters 2, 3 & 4 - takes a different turn. Since Lewis is fond of comparing his modal realism to realism about the entities of mathematics, I will evaluate this comparison and argue that the comparison is quite unfavourable for objectual modal realism. I will argue that even if we acknowledge that possible worlds and the abstract objects of mathematics give rise to a common epistemological problem (and solution) there are both epistemological and non-epistemological considerations that render realism about possible worlds far less attractive than realism about mathematical entities. In the third part, i.e. CH.5, I will classify a variety of ways of being an anti-realist about possible worlds and I will argue that the best of these is based upon treating possible world talk as metaphorical in nature.

Throughout this first section, when the terms "realism" and "anti-realism" are used without qualification, and where context does not indicate otherwise, they are intended as referring to the theses of the affirmation of the existence of possible worlds and the denial of the existence of possible worlds respectively.
CHAPTER 1

THE PURPORTED SEMANTIC UTILITY OF POSSIBLE WORLDS

(1.0) INTRODUCTION

Recent interest in possible worlds began in the metalogical province of the semantical analysis of modal logic\(^1\) and it has been further commented that the formal utility of possible world semantics has been largely responsible for promoting the popularity of a philosophically unattractive ontology.\(^2\) The purpose of this chapter is to evaluate the semantic utility of possible world semantics with a view to assessing the relevance of this utility to the general case for modal realism.

I consider three areas in which the assumption that there are possible worlds might be held to yield semantic utility viz:

(i) The characterization of validity for modal operator arguments.

\[(1.10) - (1.12)\]

(ii) The definition of truth for modal operator languages.

\[(1.2),\ APPENDIX\ A.\]

(iii) The explanation of the validity of modal operator arguments.

\[(1.30) - (1.43)\]

Regarding the characterization of validity and the definition of truth, I argue that the same results are to be had without the ontological cost. Regarding the explanation of \(L_m\) validity, I argue that no semantic utility arises from the purported explanation of validity since the validity of the arguments is not (in the relevant sense) explicable.

(1.10) THE NEED FOR A FORMAL SEMANTIC CHARACTERIZATION OF VALIDITY FOR MODAL ARGUMENTS DOES NOT SUPPORT REALISM ABOUT WORLDS.

Let us confine our attention initially to the semantical tasks which press upon logicians in respect of the characterization of validity for systems of modal logic. In point of fact \textit{model-theoretic} approaches have most frequently been exploited for this purpose.\(^3\) The model-theoretic characterization of validity for modal logics proceeds via the apparatus of \textit{Relational Frames}. A relational frame consists in a set of \textit{indices} and a \textit{binary relation} \(R\) defined over the
indices. A *valuation* for the modal language specifies a truth-value (over a frame) for every sentence of the language at every index in accordance with standard rules for the truth-functional connectives and modal operators. A frame is then said to *validate* a sentence iff every valuation over the frame makes the sentence true at every index, and validates a logic iff it validates every theorem of that logic. Beyond this concommittant definitions of completeness and logical consequence are available.

It would appear that no one is concerned to dispute the point that for these purposes, construed in a limited *algebraic* context, we need not engage the apparatus of possible worlds. Lewis writes that the indices of the frames.....

".....'may be regarded as' possible worlds, but in truth may be anything you please." 4

However, this constitutes no decisive victory for the anti-realist about possible worlds.

(1.11) AN ARGUMENT FOR REALISM BASED ON THE APPLICATION OF THE METALOGICAL RESULTS

It may be argued that while realism about possible worlds is not, strictly speaking, *indispensable* for these most limited of purposes, it facilitates the prospects of relevant *application* of the metalogical results. Lewis makes a case along the following lines.5

The model-theoretic results in respect of modal logics only become available if we accept the interpretation of the operators as quantifiers over indices. Now we face a kind of dilemma. If we interpret the domain of quantification as some arbitrary set of individuals (towns or whatever) then we get the required characterization of validity for the logic (construed as a syntactic system) but only at the cost of making the whole enterprise thoroughly irrelevant to *modality* i.e. these are instances in which *misinterpretations* validate the logic. On the other hand, if we are after a genuinely *modal* interpretation of the logic, we gain access to the metalogical results but only at the price of accepting the analysis of the operators as quantifiers. So, however we approach the issue, the only procedure which does justice to both our modal *and* metalogical concerns is one which entails the treatment of the operators as quantifiers over modal objects. While, as Lewis acknowledges, this is an argument for *ersatz* modal
realism as much as for the genuine modal realism he espouses, the point remains that it presents a serious challenge to outright anti-realism about worlds.6

(1.12) REPLY: THERE ARE SUBSTITUTIONAL ALTERNATIVES TO MODEL-THEORETIC SEMANTICS.

The anti-realist can respond by undermining the importance, or at least the centrality, of the model-theoretic semantic approach by promoting the cause of alternative semantic methods. We have no need of model-theoretic techniques in order to provide a genuinely modal interpretation of apparently modal arguments for, it would appear, substitutional methods will do just as well. The substitutional alternative proceeds by defining validity for a schema in terms of restrictions on the truth values of premises and conclusions in substituends of these schemas.7 In the terms of the utility argument, then, this reply should be categorized as a claim that the benefits in question - in this instance the semantic benefits - can be had more cheaply than at the cost of quantification over worlds.

(1.2) THE NEED FOR A SEMANTICAL THEORY OF TRUTH FOR MODAL OPERATOR LANGUAGES DOES NOT SUPPORT REALISM ABOUT WORLDS.

A further "formal" semantic consideration may be brought forth in order to boost the semantic utility case for realism about worlds. This consideration relates to theories of truth for languages containing modal operators. The provision of truth-definitions for formal languages may be attempted either model-theoretically (where definitions proceed by relativizing truth to a model) or via theories of absolute truth such as Tarski's.8 While philosophical attention has centred upon theories of absolute truth on the grounds that these better match the requirements of empirical theories of meaning,9 both types of theory have a claim to displaying semantic structure.10 If both types of theory are tenable then the objectual anti-realist will again be in a position to argue that quantification over worlds was unduly expensive in view of the availability of a non-quantificational alternative that is, at least, equally viable. However, since it has been argued that one cannot provide an adequate theory of (absolute)
truth for languages containing standard modal operators\textsuperscript{11}, we are faced with the prospect that only the model-theoretic approach may be tenable, and consequently that quantification over worlds has unrivalled utility in this respect. Consequently, it is important that the opponent of objectual modal realism should be able to meet the challenge mounted against the viability of a theory of absolute truth for languages containing modal operators.

I deal with this matter further in Appendix A where I argue that adequate theories of truth for modal operator languages are available. On the basis of that conclusion, I take the view that the objectual anti-realist should respond that truth definitions for modal operator languages are available more cheaply than at the cost of construing modal operators as (disguised) quantifiers over a domain of possible worlds.

I will now broaden the conception of semantic utility that may be associated with the acceptance of an ontology of possible worlds to take into account an argument that is presented by Forbes\textsuperscript{12}. This argument attempts to establish the added utility of realism about worlds on the grounds that realism about worlds funds an explanation of the validity of modal arguments.

(1.30) A SEMANTIC-EXPLANATORY ARGUMENT FOR OBJECTUAL REALISM STATED.

In what follows I will make use of Forbes'\textsuperscript{13} notation in formulating a possible worlds language,"$L_w$", and a 'parallel' modal operator language,"$L_m$". Briefly, their salient structures and items of vocabulary are these: $L_w$ is a first order language with world variables ("w", "u" etc.) and a constant, "w*", denoting the actual world; $L_m$ is a propositional modal language containing the sentential operators "□" and "◇". A syntactic translation scheme takes each sentence of $L_m$ into an $L_w$ "rendering" e.g.

\begin{align*}
\text{TRANS} ("◇P") &= "(\exists w)(Pw)" , \\
\text{TRANS} ("□(P & Q)") &= "(\forall w)(Pw & Qw)" .
\end{align*}

Forbes presents the following semantic case on behalf of the realist about worlds.\textsuperscript{14}

Acknowledging the dispensability of worlds in the light of other algebraic interpretations of the indices of quantification, this realist goes on to claim that quantification over worlds has the advantage that this, and only this, can found
an explanation of the validity or invalidity of operator inferences, as opposed to merely pronouncing on the question of whether any such inference is valid.

The structure of the case is as follows:

(i) Each L_m sentence is synonymous with its L_w 'rendering'.
(ii) The L_w renderings are prior to (give the real meanings of) the L_m sentences they render.
(iii) This combination of synonymy and L_w priority means that the (in)validity of L_m inferences can be explained via their L_w mappings just as the (in)validity of inferences involving sentences containing definite descriptions can be explained via Russellian renderings of these sentences.

If successful, this case apparently establishes an impressive semantic utility for possible worlds - they explain the validity of modal operator inferences - and so contributes to the broader case for realism about possible worlds.

(1.31) FORBES' CONCEPTION OF A RUSSELLIAN EXPLANATION OF VALIDITY

Forbes offers the following account of how inferences involving sentences containing definite descriptions can be explained via Russell's renderings of these sentences.15

The sentence (3) is said to have the 'real meaning' (4):

(3) The girl next door is blonde.
(4) There is exactly one girl next door and she is blonde.

These sentences are formalized according to their respective surface structures thus:

(5) B [(i x) Gx] (6) (3x) (Gx & (V y)(Gy --> y=x) & Bx)

This two-fold process grounds the claim that we have explained the logical powers of the operator,"i " , and, by the same token, that we have explained the validity of the inference from (3) to (7) viz:

(3) The girl next door is blonde |= (7) There is a girl next door

Finally, the central point:

"The suggestion is then that possible world semantics explains validity and invalidity in the same way; that is, the relationship between (1) and (2) [ these being (1) □P and (2) (3w)(Pw) -- J.D.]
**is the same as that between (5) and (6).**”

It is worth pausing to distinguish the three salient types of relation that feature in Forbes' version of the Russellian story: (a) The **real meaning** relation which obtains between sentences of a natural language and which captures both synonymy and priority; (b) The **regimentation** relation which obtains between English sentences and canonical descriptions of their surface structures and (c) The **real logical form** relation which obtains between canonical descriptions.

It is then claimed that

(6) \( \exists x (Gx \land (\forall y) (Gy \rightarrow y=x) \land Bx) \)

is the real logical form of

(5) \( B [(i \ x) \ Gx] \).

According to Forbes:

“(6) shows that (5) does not really contain a subject term ...”

and thereby we attribute the logical form of (6) to (5). The upshot is that the explanation of the validity of the inference from (3) to (7) viz:

(3) *The girl next door is blonde.* \( \vdash (7) \) *There is a girl next door.*

depends on portraying (6) as the real logical form of (5):

(6) \( \exists x (Gx \land (\forall y)(Gy \rightarrow y=x) \land Bx) \)

(5) \( B [(i \ x) \ Gx] \)

and on the role of (5) as the regimentation of (3):

(3) *The girl next door is blonde.*

All that remains then is to regiment (7) as (8):

(7) *There is a girl next door.*

(8) \( \exists x (Gx) \)

and, finally, to appeal to our acceptance of the inference (6) \( \vdash (8): \)

(6) \( \exists x (Gx \land (\forall y)(Gy \rightarrow y=x) \land Bx) \) \( \vdash (8) \exists x (Gx) \).

Ultimately, the substantive claim that sustains the purported explanatory force of this account is that (6) is the real logical form of (5) and the claim is supported by the following argument:

1. (4) gives/is the real meaning of (3).
2. (5) regiments (3)
3. (6) regiments (4)

\[ \therefore (6) \text{ is the real logical form of } (5) \]
We are being asked to entertain the proposal that possible world semantics "explains validity and invalidity in the same way". Hereafter, I will refer to this proposal as the Russellian explanation of Lm validity.

Forbes uses the arguments (A) and (B):

(A) ◻P, ◻Q ⊨ ◻(P & Q)

(B) (∃w)Pw, (∃w) Qw ⊨ (∃w) (Pw & Qw)

to exemplify the purportedly Russellian relationship between Lm inferences and Lw inferences i.e. the invalidity of (B) is being supposed to explain the invalidity of (A). This is supported by an appeal to the intuitive invalidity of (B) and the substantive claim that (2) is the real logical form of (1):

(1) ◻P.

(2) (∃w)(Pw)

But is this claim supportable in the same way as the (supposedly) parallel claim that (6) is the real logical form of (5)?

If the answer to that question is to be affirmative, we must be satisfied that there are sentences of our natural language for which (1) and (2) stand as adequate regimentations. To allow that matters might be otherwise would be to admit the possibility that there might be some kind of relation which could determine, quite independently of our natural linguistic practice, a non-arbitrary logical priority of one string of notation over another. Claims pertaining to these regimentations concerning synonymy and real logical form must surely be grounded, if at all, in facts about the use of sentences which the regimentations have been invoked to regiment.

But now we are in a position to propose an objection against the application of Russellian explanation to the case of Lm validity, for it has been claimed, by McGinn, that in effect there is no natural language analogue of the 'regimentation' (2) and if this is correct, then there is a fortiori no natural language analogue of the regimentation (2) available to facilitate the inference to the claim that (2) is/gives the real logical form of (1). If McGinn's claim can be sustained, it will entail that there is no basis in natural language use for the claim of synonymy-priority of (2) over (1). The objection that emerges, then, is that the purported Russellian explanation of validity in the modal case has no proper basis, since there are no possible world sentences in the natural
language.

There are two obvious strategies of response to this rejection. According to the first, (1.33), one might simply accept that there are no such sentences but argue that this fact does not constitute a decisive objection against the applicability of Russellian explanation. According to the second, (1.34) & (1.35), one might argue, contrary to the hypothesis, that there are such sentences and, consequently, that the objection to the applicability of Russellian explanation in the modal case is inappropriate.

(1.33) McGinn's Linguistic Constraint Endorsed.

McGinn makes the claim about the absence of possible world statements from English against the background of a "linguistic constraint" on the imputation of ontology to object language sentences for the purposes of giving their truth-conditions. As such, he is not directly concerned with the synonomy-priority issue which occupies us here. However, there are obvious implications in our region of concern for the position he adopts. If the linguistic constraint is appropriate, it counters the strategy which is based on acceptance of the absence of possible world sentences in natural language. He spells out the constraint thus:

"... if a semantic theorist imputes a certain kind of ontology to a range of sentences not superficially committed to such an ontology, then he is under a prima facie obligation either to point to other expressions in the language explicitly so committed, or to explain why it is that the ontology in question never surfaces. The motive behind this is to regulate and control departures from surface syntax. For it would seem implausible to discern reference to entities of a given kind if speakers were never found invoking those entities explicitly."

I take the view that we have no option but to accept this constraint (or something very much akin to it) if any control on departures from "surface syntax" is to be exerted in linguistic theorizing. The linguistic constraint constitutes a principled basis upon which we can oppose the proposal to accept that possible world statements are not to be found in natural language use while maintaining that

\[(2) (\exists w)(Pw)\]
gives the real meaning, and, \textit{a fortiori} the real logical form of (1) \(\Box P\).

Moreover, if the foregoing remarks are correct it is not open to the proponent of a Russellian explanation of the validity of modal operator inferences to argue along the following lines.

Agreed - there are no sentences which \textit{explicitly} quantify over worlds but that is no bar to our representing \textit{prima facie} non-quantificational modal idioms as really having quantificational structure. For we can defend the view that modal idioms are \textit{implicitly} quantificational by citing the presence in use of the natural language (intuitive) synonyms (9) and (10):

(9) \textit{There are ways the world might have been other than the way it actually is.}

(10) \textit{It might have been the case that the world differed from the way it actually is.}

to vindicate the synonymy of (2) and (1). (9) will suffice as a sentence in use corresponding to (2) which is capable of supporting a synonymy claim between (9) and (10) even though it does not explicitly quantify over possible worlds.

This \textit{reasoning from implicitness} constitutes a departure from a \textit{strict} analogy with the Russellian case, for a strict analogy clearly requires that the regimentation (2):

(2) \(\exists w)(P_w)\)

should stand in the relation of canonical description of \textit{surface structure} to a natural language sentence. In any event, the reasoning from implicitness won't do since the point arising from the linguistic constraint remains. The departure from surface grammar that is involved in regimenting (9) \textit{à la} (2) - there is no explicit quantification over possible worlds in (9) - stands in need of an explanation given that there is \textit{never explicit quantification over worlds} in natural language use. In the absence of such an explanation, there is no warrant for the procedure for using \(L_w\) formulae to provide canonical descriptions of the natural language sentences. But how might such an explanation proceed?

It is reasonable to expect that the technical medium of the explanation will be transformational grammar. More specifically, the explanation will depend upon the definition of appropriate \textit{deletion transformations} which will operate on
deep-structural $L_W$ formulae in such a way as to yield surface structures in which no quantification over worlds is discernible. (Davidson\textsuperscript{24} proposes an explanation of this nature in connection with his own semantic theory of adverbial modification as implicit quantification over events.)

Now, even if it is possible to define appropriate transformations over $L_W$ and an appropriate class of modal idioms of English, this, in itself, is quite inert. Given transformational grammar, the question would be: why do all transformational operations result in a deletion of world variables, names of worlds, etc? Davidson’s transformational account of adverbial modification gains purchase precisely because there are reasonably straightforward references to events in a variety of natural language locutions.

In short, there seems to be no warrant for reading into sentences an ontology which never surfaces in the language nor, equivalently, for venturing a canonical description of the sentences which has intended ontological import of that kind. Consequently, I do not find intelligible a position which accepts that the ontology of worlds never surfaces while claiming that reference to/quantification over worlds is a proper feature of canonical descriptions of sentences of the natural language. It is not surprising that no defence of such a position is forthcoming. The option of arguing that the ontology does surface proves more plausible and I now turn to consider this second strategy.

(1.34) LEWIS’S CASE FOR THE PRESENCE (IN ENGLISH) OF QUANTIFICATION OVER WORLDS

Many of the remarks of the last section presuppose agreement with McGinn’s view that no quantification over objects is involved in (9):

(9) There are ways the world might have been other than the way it actually is.

Famously, Lewis expresses disagreement with this view and argues that there is explicit quantification over ways-the-world-might-have-been and that making the shift to call these “possible worlds” is a mere \textit{facon de parler}.\textsuperscript{25} McGinn responds by alleging that Lewis’s quantificational regimentation of the sentence is neither obligatory nor natural. He adds:

"... what Lewis has encouraged us to do with individual variables over worlds...$(\exists x)(x \text{ is a world } \& \sim (x = \text{ the actual world}))$... we can
do, and do naturally, using second order quantification combined with modal operators...((\exists x)(\langle \rightarrow F(things) \rangle \& \sim \text{Actually } F(things)))^{26}

Now, I agree with McGinn that Lewis does not give an argument which forces us to construe the ways-the-world-might-have-been sentence in terms of (first-order) quantification. But what could forcing amount to here? We are not, surely, forced to view matters in the way McGinn suggests either. When Lewis offered what appears to be a linguistic argument for realism about possible worlds based on the evidence of ways-the-world-might-have-been sentences (such as (9)) he prefaced it with the remark:

"I believe that there are possible worlds other than the one we happen to inhabit. If an argument is wanted it is this."^{27}

(My emphasis.- J.D.)

This remark is, to say the least, puzzling. It seems to suggest that the ontological thesis stands in no need of support - as if it were not controversial! Furthermore, it prefaces what many, including McGinn, have seen as a thoroughly unconvincing argument.^{28}

What I want to suggest is that we can improve understanding by reading Lewis charitably and in the context of the problematic of the linguistic constraint. Lewis's 'linguistic argument', construed as an attempt to force us into accepting quantification over possible worlds is indeed, by itself, quite unconvincing. If this argument were convincing, we would have even better grounds for being objectual realists about values given the availability of locutions such as (11) and (12):

(11) There are values which this society has come to disregard.

(12) Among those values which ought to be promoted more vigorously are integrity and trust.

Values, in this regard, do much better than possible worlds! Like places, times and certain other controversial entities, purported reference to (objectual) values is executed through a "matrix of ontological locutions"^{29} i.e. a variety of names, descriptive singular terms, demonstrative functors etc. So there is a rich variety of idioms wherein the purported ontology surfaces. But no-one, surely, is in the business of arguing that such considerations of themselves compel ontological commitment. (That would be a position which deserved the title "naive realism".) The whole drift of ontological concern flows in the opposite
direction. The dominant question is *which are considerations that allow us to economize on ontological commitment in the face of matrices of ontological locutions of various sorts?*

The force of Lewis's point can be construed as an attempt to meet (anticipate) the negative point made by McGinn. McGinn's claim is that there is *no* surface-structural evidence of quantificational worldly vernacular in natural languages and Lewis can be viewed as offering a gesture to the effect that *there is some such evidence.* Were there none, perhaps that *would* be an overwhelming difficulty for the realist about worlds. But given that there is such *prima facie* evidence, and given how reluctant we are to be forced in these matters, we should say that the linguistic evidence that is to be gleaned from the existence of the ways-the-world-might-have-been sentences is inconclusive.

(1.35) **THE CLAIM THAT THERE IS NO EXPLICIT QUANTIFICATION OVER POSSIBLE WORLDS IN ENGLISH REFUTED**

An argument from the blatantly obvious concludes, contra McGinn and contra the critic of the Russellian analogy, that natural language use of possible world talk is alive, well and as explicit as you like. This thesis as well as the writings of Lewis, Forbes, McGinn etc. bears out that claim, for we all use possible world talk and herein we have the surfacing of quantification over worlds. It is predictable that this response will provoke a great deal of consternation. But on what grounds might it be rejected?

Is it that McGinn's claim should be taken as pertaining only to 'ordinary language' and not philosophical discourse? If so, the appropriate reply is that no portion of our language can very comfortably be styled 'ordinary' in the face of the complexity of our speech communities. If ordinary language is the *intersection* of the discourse across a whole speech community it is a corpus which is no longer *recognizably* ordinary. Arguably, it is *of the essence* of linguistic communities that they diversify in such a way that the union of use should outstrip the intersection. Consider, for example the theoretical terms of science. Do *they* feature in ordinary language? Perhaps every competent speaker (*ceteris paribus*) is acquainted with, or has some facility in the use of, terms such as 'atom', 'plant', and 'insect' - do these count on grounds of
intersection? We are due an account of such matters if the concept of ordinary language, is going to be doing any work in the present context. Could it be that it is not that possible world talk fails to be ordinary but that it succeeds in being philosophical and it is non-philosophical discourse that is devoid of worldly idioms? Perhaps so, but why should this be accepted as a reasonably motivated way of placing possible world discourse outside of language proper? It is true that philosophical vocabulary (including world talk) is invoked for the purposes of "theory". It is also true that such vocabulary is artificial in that it is consciously invented and introduced into our language. But can these or any other considerations of a suitably general - i.e. non ad hoc - nature be expected to exclude possible world talk without also excluding much of our linguistic invention, creativity and variety. Perhaps another of McGinn's points can be borrowed for the purpose of undermining this direct defence of world talk.

(1.36) RESPONSE : THE ARTIFICIAL NATURE OF WORLD TALK IS SHOWN BY THE ABSENCE OF AN APPROPRIATE VARIETY OF REFERENTIAL LOCUTIONS.

A fallback position might have it that while reference to possible worlds may be explicit in our usage, it can be excluded from the sphere of proper ontological consideration on the grounds that the relevant linguistic evidence does not exhibit sufficient variety. There is no matrix of worldly locutions in which the explicit quantification is embedded. Even if it is granted that we do use locutions of the type, "There are possible worlds such that ...", this is shown to be artificial, or otherwise unacceptable, by the absence of proper names for worlds (other than the actual world) and the absence of related worldly functors and demonstratives. We must acknowledge this absence of referential variety in world talk but there is a rejoinder available which depends upon a peculiarity of worlds, and, indeed, the world.

It is arguable that we cannot deny that a possible world exists when this claim is made in the context of the claim that the possibilia which are its contents exist. It is surely not the case that God creates all that there is except a world and then create a world to contain it. Think of the (actual) world and its contents! Why not say that worlds are ontological, (perhaps mereological)
constructs out of the entities that comprise them? Then we can say that while there is no matrix of ontological locutions referring to non-actual worlds per se, there is a rich matrix of locutions (apparently) involving reference to their possibilia. For example, while the introduction of names of persons who might or would have existed is not an entirely straightforward affair, but the practice enjoys prima facie viability. In fact, the proponents of the view that such names can properly be introduced have been known to argue that the names in question may be introduced by way of descriptions involving certain counterfactual functors. Peacocke gives the example of a proper name "a" whose referent does not actually exist but is nonetheless "introduced" by way of the description (13):

(13) The person who would result if gametes b and c combined and developed into a person. 33

and claims that relative to such a "convention" such sentences as (14):

(14) a would have had blue eyes.

need not be deprived of truth conditions.

Demonstratives are probably the most problematic referential constructions in this respect (see Ch.4) and on well known grounds direct quantification over possibilia is beset with difficulties.34 Again, Lewis or a like-minded theorist, would not say that a possibilist semantics of such referential apparatus is forced on us but merely that the surface presence of such phenomena belies the claim that there is no sufficiently varied network of locutions re possibilia.

There is ample reason to conclude, then, that the objection to the applicability of Russellian explanation to Lm validity which was introduced in (1.32) does not succeed. It has not been established that the Russellian explanation of Lm validity in terms of Lw validity lacks a warrant in the form of natural language use of possible world talk. The canonical notation Lw does describe the surface-structure grammar of sentences in use and, therefore, if the Russellian explanation of validity is to be found wanting, it must be on other grounds. Providing such grounds will be the business of the following sections. However it is worth noting at this juncture that the acceptance of possible world talk as a "legitimate" part of natural language use bequeaths the problem of providing an account of the meaning of possible world statements. This problem will be picked up in Chapter 5, but for the moment I will return to the matter of the
Russellian explanation of $L_m$ validity in terms of $L_w$ validity.

(1.40) THE STATEMENT OF THE CASE AGAINST THE RUSSELLIAN EXPLANATION OF $L_m$ VALIDITY
My case is that the Russellian explanation of the validity of modal inferences and the conception of the real meaning of a statement upon which it depends are indefensible in virtue of the fact that neither is sustained by an appropriate warrant in the use of modal language. In the first instance I will outline a modest conception of the explanation of validity which is gleaned from what I find acceptable in the idea of explaining the validity of inferences by way of the real meaning of statements that feature in those inferences. I will then proceed to discuss the Russellian explanation of the validity of inferences containing descriptive singular terms, concluding that the pattern of explanation is acceptable in this case since it can be construed modestly. My final and central point is that the purported Russellian explanation of the validity of modal inferences is not acceptable since it is not susceptible to modest construal.

(1.41) MODEST EXPLANATIONS OF VALIDITY AND FIRST-ORDER SEMANTIC REPRESENTATION.
The proponent of the Russellian explanation of validity in the modal case is claiming that (2) gives the real meaning and the real logical form of (1):

\[(1) \Box P \quad (2) (\exists w)(P_w)\]

Now, either the warrant for this claim derives from aspects of the use of the statements that these regimentations regiment or the claim has no warrant. Embracing the former commits the proponent of Russellian explanation to claiming with respect to the English sentences (13) and (14):

\[(15) \text{It is possible that Socrates is a woman.}\]
\[(16) \text{There is a possible world at which Socrates is a woman.}\]

that (16) is the real meaning of (15) and, moreover, that (15) really contains an existential quantifier. But in what sense is this strange claim warranted? I will argue in the context of concerns pertaining to the explanation of validity that we can allow a sense in which a claim of this kind, while not very happily expressed, may in fact be warranted.

The key to the issue is to enquire after aspects of the use of statements that
might lead us to postulate non-obvious semantic structures for them. In particular, why might we seek to regiment in first-order notation (for the purposes of semantic representation) a class of sentences of our language that do not have their purported quantificational content stamped on their faces? I suggest that motivation to proceed in this way may take the form of a (legitimate) desire to represent semantic structure as being in line with use i.e use *qua* inferential practice. What I have in mind is a case of the following type. There may arise in our inferential practices instances of forms of argument that are clearly and unreservedly endorsed as semantically valid arguments by the members of the language-speaking community but whose semantic validity cannot be clearly *displayed*. This is to say that in semantic representation, unless we depart to some extent from the natural (*prima facie* non-quantificational) syntax of the sentences that feature in those arguments, we cannot *reflect* the semantic validity of the arguments in the form of syntactic *validity*. My two-fold claim is (i) that we should allow that the aim of displaying as syntactically valid those inferences that the linguistic community clearly endorses as semantically valid serves a kind of explanatory interest that we have - this is what I call a *modest explanation of validity* - and (ii) that to represent one kind of statement in use, $S_i$, as giving the real meaning of another kind of statement in use, $S_j$, is justifiable only insofar as this enables us to explain aspects of the use of the $S_j$ that are not explicable by reference to semantic and syntactic properties that would obviously be associated with the $S_j$.

The now standard first-order (Fregean) regimentation of a sentence such as (17):

**(17) Something is green.**

exemplifies very clearly the kind of warrant that a real meaning claim may have in the context of a modest explanation of validity. Say we claim that (17) has the real meaning (18):

**(18) There is a thing that is green.**

and consequently that the real logical form of (17) is given by (19) rather than (20):

**(19) (∃x) Gx**

**(20) Gs**

The claim that (17) has the real meaning (18) may be held to be warranted on
the grounds that regimentation in the style of (19) allows the representation of inferences that are (uncontroversially) semantically invalid as syntactically invalid inferences. Regimentations in the style of (19) square with our treatment of the inference (C) as invalid:

\[(C) \text{ Something is green. Something is invisible.} \]
\[\vdash \text{ Something is green and invisible.} \]

whereas regimentations in the style of (20) do not.

It follows from this that we ought to be prepared to allow that we can justify the claim that a certain class of explicitly quantificational statements give the real meaning of their \textit{prima facie} non-quantificational "counterparts" in terms of the advantage gained in satisfying our broadly explanatory interest in representing as syntactically valid those inferences that the community's inferential practice endorses as semantically valid. This is to do no more than to make room for this kind of justification. It is clear that much more will have to be supplied in the way of constraints in order to characterize what is tolerable in semantic regimentation with respect to the kind and extent of departure from the syntax that we would naturally discern within our sentences. (For example, we must require that semantic representation should be \textit{systematic} since it is not acceptable to suppose that just any \textit{ad hoc} mapping of a (one-off) semantically valid inference that relates it to a syntactically valid inference can serve the purposes of a meaning based explanation of validity.)

I accept fully that the foregoing represents no more than a sketch of a justification of a modest conception of the explanation of validity. However, there is enough in this outline to enable us to appreciate that the case of first-order regimentation of \textit{(prima facie) modal operator sentences compares unfavourably - by the lights of the considerations that inform the modest conception - with that of the regimentation of sentences containing descriptive singular terms.}

\[1.42 \text{ THE RUSSELLIAN EXPLANATION OF VALIDITY FOR INFERENCES INVOLVING DESCRIPTIVE SINGULAR TERMS: A MODEST INTERPRETATION DEFENDED : A FULL-BLOODED INTERPRETATION REJECTED} \]

Just exactly what significance ought to be attached to Russell's \textit{analysis} of
sentences containing descriptive singular terms seems to be clearly a matter of dispute. On this basis I must take issue with Forbes who writes:

"The significance of the quantifier treatment of modal operators is akin to the significance which philosophers have generally attributed to regimentations of problematic sentences in standard first-order logic."  

(My emphasis J.D.)

This comment incorporates the quite implausible assumption that there is a generally accepted account of the significance of such regimentations. The assumption lacks plausibility since there are clearly distinguishable kinds of motivation for framing first-order regimentations of natural language sentences for semantic purposes.

It is my view that the real meaning relation that is purportedly instantiated by Russell's first-order regimentations is acceptable, if at all, in terms of the modest conception of the explanation of the validity of inferences involving descriptive singular terms. First of all let it be noted that there are clearly unacceptable grounds which stand as purported sources of justification of the real meaning claims.

It is clear that the significance of the analysis of sentences containing (prima facie) descriptive singular terms was held by Russell to arise from epistemological considerations i.e. the conception of the significance of the semantic analysis is articulated in the context of the precepts of logical atomism.

For Russell, the claim that (6) gives the real meaning (and the real logical form) of (5):

(5) B[(ix)Gx]  
(6) (∃x)(Gx & (∀y)(Gy→y=x)) & Bx

is supported in terms of the relative proximity of (6) to the terminus of analysis i.e. to an atomic sentence containing the logically proper names whose referents are the items of acquaintance.  

Now it seems clear that we can no longer accept that the value of the theory of descriptive singular terms can be sustained via reference to its logical-atomistic utility, for no-one is in the market for logical atomism. But how other than in terms of the modest conception of semantic explanation that has been proposed might the real meaning claims be sustained?

What I will call a full-blooded conception of semantic explanation is sustained by an equally full-blooded conception of the real meaning claims. In this
conception Russell's analysis reveals something of the semantic (ultimately psychological) deep structure of our language and is akin to a discovery of a semantic fact whose obtaining explains our use of the statements in question and, in particular, our recognition of semantic validity in inferences involving these statements. My suspicion is that the original (realist) claim that possible world semantics has utility in the explanation of the validity of modal arguments is made with this conception of semantic explanation in mind. Be this as it may, the conception of semantic explanation is, in any case, quite unacceptable.

It is a familiar but crucial point that an account of the meaning of our statements must be grounded in facts about the use of those statements and the practices to which the use of the statements is aligned. In the context of purported explanations of validity I take this slogan to have the following force. An explanation of validity must be, as it were, use-driven. The semantic structures of our sentences must be viewed as arising from the patterns of semantic relation that they exhibit in use. As such, where we have evidence of the community's treating as valid a given class of inferences we have a warrant for representing the sentences that they contain as having semantic structure that reflects or displays validity. The degree of structure we may attribute and the degree of departure that may be sanctioned from what we take to be the natural syntax of the sentences in question are important matters. But my immediate point concerns the appropriate conception of the direction of semantic explanation and it is simply that, ultimately, it is "surface" use that warrants the attribution of semantic structure. If we try to view our inferential practices as being susceptible to "deep" semantic explanation, this is to open up the possibility that we ought to regard our inferential practices as subject to revision in the light of what we might discover in deep semantic reality. That is to say, if the real meaning of a sentence is to be thought of as determined by or consisting in a semantic fact that is not determined by use then this appears to give rise to the possibility that we may be mistaking what the real meaning of a sentence requires of us in the way of use. It has, of course, been argued that these are no real possibilities at all.

I will settle for indicating my sympathy with this familiar line of thought rather than attempt any further development of it. Suffice it to say that herein lie my reasons for objecting to the full-blooded conception of meaning and semantic
explanation and, therefore, to the proposal that we should view Russellian claims of real meaning as being justifiable in that way.

Finally I want to claim, tentatively, that we can retain the form of the Russellian explanation of the validity of inferences containing (prima facie) descriptive singular terms if we are prepared to construe this form of explanation as operating under the use-driven constraints outlined in connection with the modest conception of the explanation of validity. This is to claim no more than that Russell's "theory of descriptions" has a reasonably strong claim to being able to satisfy the modest criteria that were adumbrated earlier. The mapping of "description sentences" onto their first-order Russellian renderings has strong claim to being a systematic meaning-preserving representation of the semantic structure of the description sentences because the shift to first-order representation secures the display of semantically valid inferences in the form of syntactic validity.

(1.43) THE RUSSELLIAN EXPLANATION OF \( \text{L}_m \) VALIDITY DOES NOT HAVE A MODEST (ACCEPTABLE) INTERPRETATION.

The case of first-order regimentation of (prima facie) modal operator sentences is extremely weak by the lights of the considerations that inform the modest conception of the explanation of validity.

(i) I have argued that we ought to be prepared to attribute primacy to the first-order regimentations if there were some aspect of our inferential practice that the non-first-order regimentation fails to reflect. However the \( \text{L}_m/\text{L}_w \) case does not seem to be of this kind, for there are no semantically (in)valid modal inferences whose syntactic (in)validity is represented in their \( \text{L}_w \) rendering but not their \( \text{L}_m \) rendering. So we certainly do not have as compelling a case for quantificational regimentation as we do in the case of the likes of "something" and "nothing".

(ii) In "central" cases\(^36\) such as (D):

\[(D) \quad \text{It is possible that Socrates has exactly one leg.} \]
\[
\text{It is possible that Socrates has more than one leg.}
\]
\[
\text{It is possible that Socrates has exactly one leg and Socrates has more than one leg.}
\]

semantic invalidity is in no way obscured by the (natural) syntax of the operator
regimentation of its premises and conclusion i.e.

(A)  \( \Diamond P, \Diamond Q \vdash \Diamond (P \land Q) \)

There is no apparent reason for claiming that the first-order regimentation of (D), i.e. (B) :

(B)  \( (\exists w)P_w, (\exists w)Q_w \vdash (\exists w)(P_w \land Q_w) \)

serves better than (A) the avowed goal of displaying semantic (in)validity as syntactic (in)validity. Indeed the only grounds which come to mind as a basis for such a comparative claim involve the concept of one regimentation being syntactically more complex and therefore potentially more structure-revealing than another. Notwithstanding the general conceptual difficulty with the notion of framing a sufficiently non-arbitrary and generalizable notion of syntactic complexity, there is no intuitive pull to the idea that (B) is syntactically more complex and therefore potentially more (semantic) structure-revealing than (A).

Given the rather bizarre nature of the claim for which motivation is being sought i.e. that sentences such as (15) :

(15) It is possible that Socrates is a woman.

really contain a quantifier over possible worlds, the absence of the antecedently familiar sources of motivation (as registered in points (i) and (ii)) emerges as a consideration that is extremely damaging to the applicability to \( L_m \) validity of a modest explanation. My contention, then, is that since there is no motivation to seek modest explanations of \( L_m \) validity in \( L_w \) terms, there is no justification arising from this source for making the implausible claim that the sentences of \( L_w \) give the real meaning of the sentences of \( L_m \) which they (are supposed to) regiment.

The original proposition was that realism about possible worlds could generate semantic utility by providing explanations of the validity of \( L_m \) inferences. I have argued that the explanation of validity must be use-driven and that in light of that constraint we can endorse only modest explanations of validity. However, there is no evidence to the effect that the structure that can be revealed by \( L_m \) syntax falls short of that required to represent as syntactically valid those inferences that involve sentences containing prima facie modal operators and whose semantic validity is endorsed in our inferential practice. Therefore, it is inappropriate to hold that the validity of \( L_m \) inferences is modestly explicable. Since modest explanation was being held to be the only kind of
A REMARK ON THE COMPARATIVE EXPLANATORY UTILITY OF RIVAL ONTOLOGIES

There is a moral to be drawn from the present case which is of relevance to the broader matter of arguments for ontological commitment based on explanatory utility.

While Lewis does not propose the semantic argument that I have discussed, he does claim that the modal theorist who accepts (his genuine, objectual) modal realism enjoys the advantage of being able to provide analyses and explanations where "the friend of diamonds and boxes" (as he refers to the modal theorist who opposes objectual realism) cannot do so. The "analysis" of the modal operators as disguised quantifiers (c.f. the real meaning relation) and the attendant explanation of the validity of the inferences in which the latter feature, stand as examples of the relatively large analytic and explanatory scope that the objectual realist claims. But this relatively large fund of "explanations" need not of itself constitute an advantage over a rival theory that purports less analysis and less explanation, for analysis and explanation are not always appropriate. My view is that the modal operators are semantically primitive i.e. the modal operators are not analysable and that the validity of arguments in which they feature is not (semantically) explicable.

The moral regarding the meaning of statements containing modal operators and the purported explanation of the validity of the arguments in which they feature is - as Hilary Putnam might have remarked - if it ain't broke, don't fix it!

THE THESIS THAT ALL MODALITY COMES PACKAGED IN DIAMONDS AND BOXES REPUDIATED

This is an appropriate point at which to clarify the issue of primitiveness and the related claims which are being made throughout this thesis on the behalf of
"diamonds and boxes". Lewis casts the interpretative dispute concerning sentential modal operators as obtaining between the proponents of possible world analysis (such as himself) and those who take the view that all of modality comes packaged in diamonds and boxes. However, there is no need for the opponent of possible world analysis to adopt the latter, untenable, position. What characterizes the present opposition to possible world analysis is precisely the view that the sentential modal operators are not analysable in terms of possible world interpretations. This position can sit quite consistently with the prospect of our discerning a vast inventory of complex modal constructions that outstrip the resources of a grammar whose modal resources are restricted to dual sentential modal operators. Lewis is certainly right to make the, now familiar, point that the dual modal operators must at least be augmented with resources sufficient to represent (and to locate the scope of) "actually" and cognate items. Also, Wiggins has made a compelling case for our recognizing in the context of semantic theory the natural interpretation of modal adverbs as predicate modifiers in such essentialist claims as (21):

(21) *Socrates is necessarily human.*

No doubt this is only to scratch the surface of our rich fund of semantically significant modal idioms. The position which is defended here is simply that the sentential modal operators, as well as the other recognized and *prima facie* non-objectual modal idioms which have been mentioned need not and should not be given possible world analyses. The decision to emphasize sentential modal operators among non-objectual modal idioms is grounded in considerations of convenience given their relative logical and semantic familiarity.

(1.5) **SUMMARY**
The conclusions of (1.1) and (1.2) are that there are available successful non-quantificational semantic approaches to both the characterization of validity of modal arguments and the definition of truth for languages containing (*prima facie*) modal operators. On both counts we are in a position to counter the objectual realist in terms that Lewis considers appropriate in claiming that the semantic benefits that ensue on the basis of acceptance of an ontology of possible worlds are to be had without accepting this ontology. The conclusion
of (1.4) is that since the validity of $L_m$ inferences is not in any acceptable sense explicable in terms of $L_w$ validity and the real meaning relation, the Russellian explanation of the validity of $L_m$ inferences does not in fact generate the semantic utility that the objectual realist purports that it does. Therefore, realism about possible worlds derives no significant support from semantic considerations.
CHAPTER TWO
WORLDS, ABSTRACTNESS, CAUSATION AND A PRIORITY

(2.0) THE SCOPE OF THE PRESENT CRITIQUE OF LEWIS'S MODAL REALISM

The critique of modal realism to be offered here involves no attempt to summarize the widespread criticisms of realism about worlds that have been made in the literature. Rather what is offered in these chapters (Ch.2, 3, 4) is one line of response to Lewis's most recent and comprehensive statement and defence of his position.¹ This chapter is intended as supplying the context in which the epistemological and metaphysical objections to objectual modal realism (proposed in Chapters 3 & 4) are to be understood. The scope of the present critique is limited by an important assumption that Lewis and I share i.e. that there is good reason to accept the ontological thesis of objectual realism in the mathematical case. Lewis does not offer any detailed defence, or even any detailed conception, of objectual realism about mathematics in order to make his case for their parallel justification. Nor do I intend to enter into such detail in framing an unfavourable comparison of objectual realism about modality with its mathematical counterpart. For my purposes, there is no need for any more delicate an instrument than a broad brush in the characterization of realism about mathematical entities and in this respect Lewis and I are on an equal footing.

In the present chapter I will indicate the extent to which I am prepared to go along with Lewis in his handling of the charge that possible worlds are abstract objects and the comparison of modal with mathematical epistemology to which this gives rise. Lewis argues that while there are various bases upon which the abstract/concrete distinction might be drawn, it turns out that possible worlds, as the genuine modal realist construes them, in fact warrant uniform categorization (minor reservations notwithstanding) as concrete entities relative to all of the "ways" he invokes to draw the distinction.² My response is that Lewis's discussion of the abstractness of possible worlds in relation to causal criteria of abstractness [(2.10)-(2.12)] is susceptible to the complaint that he is somewhat disingenuous in his classification of worlds as concrete relative to the causal criteria since the main difficulty that is associated with ontological
commitment to abstract objects clearly arises for possible worlds. Indeed, whether the worlds ought to be classified as abstract or not is, in a sense, neither here nor there given that, as Lewis and I agree, this central difficulty arises for the genuine objectual modal realist. [(2.13)] My epistemological objections to Lewis’s realism involve no quibble with his reaction to this central difficulty (i.e. his repudiation of a general minimal, purportedly necessary causal condition on knowledge [(2.20)]) and I argue for his prima facie entitlement to an a priori epistemology of modality [(2.21) - (2.3)].

(2.10) WORLDS, ABSTRACTNESS AND CAUSATION
The most important question with which Lewis deals in his discussion of the abstractness of worlds is whether possible worlds are abstract relative to causal criteria of abstractness. According to the third of Lewis’s "Negative Ways" (of characterizing abstractness) abstract entities are those which are incapable of causal interaction.³ His claim is that possible worlds are best viewed as concrete relative to this negative causal condition and argues this via two intermediate steps. Firstly, special features of worlds should lead us to apply the condition to worlds indirectly applying it directly to parts of worlds and secondly, "the" causal condition has to be disambiguated. I will deal with these steps in (2.11) and (2.12) respectively.

(2.11) WORLDS ARE A SPECIAL CASE: AN INDIRECT APPLICATION OF CAUSAL CONDITIONS IS WARRANTED.
The kind of consideration that is raised in the first step of the case is already familiar since we have already had cause to remark that it seems rather strange to treat a world as if it were something over and above its constituent parts.⁴ In general, it seems that it is appropriate to avoid such absolutism about worlds in order to avoid rather degenerate questions. In relation to present concerns, if we enquire whether a world stands in causal relations to its own parts, neither a positive nor a negative response is entirely comfortable. The question presents itself as a bad lot. Perhaps on balance it is easier to accept Lewis’s principle i.e. that no whole stands in such relations to its parts.⁵ Once we accept, as Lewis does, the additional claim that no world stands in any causal relation to any other world or other worldly parts it follows that possible worlds do not stand in
causal relations to anything i.e. they turn out to be abstract on application of the present condition. Lewis, however, suggests that this approach is unduly literalistic and urges that we should be charitable and allow worlds to inherit concreteness from their parts (given of course the concreteness of the parts).\textsuperscript{6} A natural initial response would have it that this appeal to charity has the look of an \textit{ad hoc} manœuvre, however it is possible to supply ample and reasonable motivation for acceptance of this surrogate concreteness.

Consider the (actual) world. Whether or not it is in fact the only world, it will turn out to be abstract by direct application of the causal condition if we accept Lewis's not implausible principle that wholes do not stand in causal relations to their constituent parts. Although the guidance of intuition is weak here the consequence concerning the actual world is not easily acceptable. Surely the actual world (especially if, as the anti-realist should say, it is the world and not part of a totality of worlds) ought to be concrete? It is probably not so important to take a position on this rather strange question as it is to dispel a potential misunderstanding. It is a crucial and distinctive claim of the genuine modal realist that we should not succumb to the (characteristically \textit{ersatzist} ) view that the other worlds are abstract and the actual world differs from them in being concrete. So from the viewpoint of the genuine modal realist it is arguably more important to emphasize the univocity of the totality of possible worlds than it is to arrive at a definitive position on the matter of which side of the abstract/concrete distinction it is on which (all) worlds fall.

The upshot is this. If we wish to apply the causal condition directly (and with allegedly undue literalism) to worlds, then we are bound to pronounce them abstract but then we may have to be prepared to accord the same treatment to the actual world. If we wish to avoid this way of proceeding we can apply the condition indirectly, i.e. to parts of worlds rather than to worlds themselves, and let worlds be concrete if some of their parts are. To opt for the latter seems preferable if only because it helps us to avoid the danger of crying wolf by taking issue with Lewis in the wrong place.

I now turn to the second stage of the case for the concreteness of worlds and the purported need to distinguish versions of "the" causal condition.
Lewis distinguishes two causal theses of abstractness:

(i) an entity is abstract iff it stands in no causal relations to us.

(ii) an entity is abstract iff it stands in no causal relations to anything.\(^7\)

The point of drawing this distinction is that the theses deliver different verdicts with respect to the abstractness of worlds. Since, in the case of possible worlds, we are to apply criteria of abstractness to the parts of worlds rather than to the worlds themselves we must ask the appropriate questions of such entities as other worldly donkeys. Do these entities (c.f (i)) stand in any causal relation to us? The genuine modal realist holds that they do not and so by the lights of (i) they turn out to be abstract as, by surrogacy, do the worlds in which they exist. Do these entities (c.f. (ii)) stand in any causal relation to anything? The genuine modal realist holds that they do stand in causal relations to some things (viz. some of their world mates) and so by the lights of (ii) they turn out to be concrete as, by surrogacy, do the worlds in which they exist.\(^8\)

Lewis argues for concreteness on the grounds that we ought to prefer thesis (ii) over thesis (i) given that the intended application of the abstract/concrete distinction is to mark a difference of a fundamental kind between entities. A difference which has, accordingly,..

"..no business being a symmetrical and relative affair ."\(^9\)

Indeed, natural justice on the side of one who claims that hitherto the abstract/concrete distinction, inchoate as it may be, has not been thought to be sensitive to the relativization which now threatens to render non-actual worlds and their contents abstract. Moreover, one who argues for relativism in this regard must take on board the somewhat counter-intuitive consequences of symmetry in the form of our own impending abstractness relative to other worlds. Were there no further relevant considerations, it might well be that we would be forced to opt for the stronger principle of abstractness and thereby acknowledge the concreteness of Lewis's worlds. However there are such considerations.

In order to deal appropriately with Lewis's case for the concreteness of worlds it will help to stand back and consider what it is that is at stake in deeming possible worlds abstract or otherwise. What the discussion of abstractness has lacked until this point is a guiding conception of why abstractness matters. We
can accept that Lewis does enough in proliferating "ways" of drawing the abstract/concrete distinction in order to convince us that we are ill-served by proceeding as though there is a uniquely correct characterization of the abstract/concrete distinction that it is our business to uncover. Given this concession, there are obvious advantages to be had if, in pursuit of our more fine grained purposes, we resolve to eschew inchoate talk of abstract objects in favour of talk of objects with this or that feature (aspatiality, sethood, acausality or whatever). We are now in a position to turn to the explanation of why a pronunciation of abstractness rather than concreteness is thought to matter.

(2.13) THE CENTRAL EPISTEMOLOGICAL PROBLEM ASSOCIATED WITH ABSTRACT OBJECTS ARISE FOR WORLDS WHETHER THEY ARE ABSTRACT OR NOT.

It is undeniable that salient among the concerns which have preoccupied philosophers of a "naturalistic bent" is the thought that abstractness threatens to bring in its wake epistemological catastrophe. In particular, as Benacerraff¹⁰ has observed in the case of mathematics, when we construe the truth-conditions of a class of statements as implicating abstract objects, we generate a tension with our "paradigm" conception of knowledge wherein knowledge of a state of affairs requires causal contact with that state of affairs. Now, whether or not it is a mistake to think that the abstract/concrete distinction ought to be implicitly or explicitly us-relative, it surely is of the essence of any appropriate causal condition on knowledge that it should be us-relative. The point may be put in the following way.

Suppose we concede the strong condition of abstractness as being the right one - an object is abstract iff it stands in no causal relations to anything - so that we have thereby captured the sober, objective, metaphysical truth. It is not, primarily, abstractness so construed that generates the tension which Benacerraff notes, for the weaker condition which requires only that an entity does not stand in any causal relations to us is, if satisfied, quite sufficient to generate that tension. It is precisely this feature of other possible worlds - that they stand in no causal relations to us - that ensures that the truth-conditions of modal statements (construed as implicating worlds) will generate a tension with "our best conception of epistemology", whether or not, as Lewis argues, they, or
better, their contents, stand in causal relations to other (non-actual) things. We need not articulate this epistemological difficulty concerning realistically construed possible worlds in terms of their abstractness. Non-actual worlds and their contents stand in no causal relation to us (human inhabitants of the actual world) and that creates a major problem regardless of whether there is a unique way of drawing the abstract/concrete distinction or whether abstractness can be a relativized concept. But what is the precise nature of the epistemological difficulty that is generated by this brand of causal isolation?

Benacerraf's widely disseminated view is that the causal theory of knowledge stands as our best conception of knowledge and, that in interpreting number-theoretic statements as requiring for their truth certain states of affairs involving causally impotent objects, our best conception of semantics stands in a relation of intractable tension with our best conception of knowledge. The point applies with equal force to genuine modal realism given the assumptions: (a) that the best conception of semantics for modal statements is to assign them truth-conditions which invoke quantification over possible worlds, and (b) that complete absence of causal influence on us is sufficient to fall foul of the strictures of "the causal theory".

An obvious, and perhaps inevitable, way to proceed in the face of this tension is to resolve it by eschewing either the relevant conception of semantics or the relevant conception of epistemology. But this position cannot be regarded as compelling the acceptance of the epistemology. Indeed, many authors have urged that this position re mathematics should not be construed as pointing towards the abandonment of the abstract object invoking semantics.

Transposing this overview to the modal arena, we can say that a tension of the kind which Benacerraf discerns, arises with respect to non-actual possible worlds, but that this represents a (substantial) difficulty for modal realism rather than an immediately overwhelming case against it. However, given the dilemma, the modal realist seems committed to the rejection of a causal theory of knowledge on pain of abandoning realism.
(2.20) IT IS A CONSEQUENCE OF GENUINE MODAL REALISM THAT MODAL KNOWLEDGE FAILS THE PURPORTEDLY NECESSARY CAUSAL CONDITION ON KNOWLEDGE.

The modern quest for a causal theory of knowledge arises in the context of Gettier's purported counter-examples to the thesis that knowledge is analysable as/constituted by justified true belief. Roughly speaking, Gettier examples seem to suggest that justified true belief can be induced in an appropriately placed agent fortuitously or accidentally, and that this feature disqualifies a proper claim to knowledge. The reaction can be viewed as an attempt to eliminate this element of the accidental by imposition of some (further) condition - or regulative constraint - formulated in terms of the causal connectedness of agent and the subject matter of the knowledge claim.

The difficulty is that while it is eminently possible to frame a conception of knowledge which captures naturalistic intuitions, it is notoriously difficult to improve on this initial declaration of intent to the extent of providing a theory. The spirit which motivates causal theorist might be captured in such formulations as:

"Knowledge that $P$ is an informational state induced in the mind of a sufficiently intelligent and perceptive, appropriately placed subject, by the very state of affairs that $P$."

Yet this does not appear as the content of a theory, for it provides no detailed causal restrictions on knowledge, far less any aspiration to sufficient conditions for knowledge that $P$. Now at a later stage of the proceedings I will argue that there is a sense in which the very idea of a causal-explanatory theory of knowledge is ill-conceived. However, even if that argument succeeds it still leaves open the option of claiming that although causal-explanatory theories of knowledge are not to be pursued, we must still impose a necessary condition of naturalistic acceptability on knowledge. Call this weak necessary condition (W):

(W) An agent $A$ knows that $P$ only if ($A$ believes that $P$ and) the subject matter of the proposition $P$ causes $A$'s belief that $P$.

It is clear that by these lights modal knowledge - given the genuine objectual modal realist's conception of the truth-conditions of modal statements - will fail to come up to scratch. Moreover, there is no joy to be had in the hope that modal knowledge (as construed by the genuine modal realist) might be
brought within the fold of causal respectability via the imposition of an even weaker causal restriction on knowledge. This weaker condition can be viewed as a reaction to the recognition that there are certain claims to knowledge that cannot be accommodated within the strictures of (W) but which are redeemable if we shift the focus of the causal connectedness requirement from the (subject matter of the) knowledge claim itself to (that of) the relevant justifying statements. Statements concerning future events and those involving unrestricted universal generalization have subject matters which are unlikely causes of our beliefs - the former requiring backward causation, the latter being too disparate in spatio-temporal distribution to be a cause of anything - and so fall foul of the weak causal condition (W). But given the standard construal of the justifying statements for these - in the former case singular statements about the past, in the latter singular statements pertaining to local regions of space-time - the shift to justifying statements brings causal respectability by the lights of a new necessary condition (J):

\[(J)\quad \text{An agent A knows that P only if (A believes that P and) A interacts causally with the subject matter of some justifying statement , J , of P .}\]

Yet the retreat from (W) to (J) does not assist the campaign for the causal respectability of claims concerning the totality of possible worlds (claims of necessity) for it seems that the only basis on which the retreat to justifying statements could gain any purchase in the case of possible worlds is in the context of a conception of knowledge concerning all worlds as the product of an inference of enumerative or mathematical induction inference from a singular statement concerning the actual world and these options have been refuted.\(^{17}\) The modal realist cannot make knowledge of necessity causally respectable even by the lights of (J) and so it is, as Lewis recognizes, clear which horn of Benacerraf's dilemma that the modal realist should grasp.

\section*{(2.21) THE GENUINE MODAL REALIST'S RETREAT TO A PRIORITY}

McGinn claims that the requirement that an agent knows that P only if there is some causal contact between the agent and the subject matter of some justifying statement of P is only properly applicable to, and is in fact constitutive of, knowledge that is \textit{a posteriori}.\(^{18}\) By these lights the appropriate strategy for
defending as knowledge a kind of knowledge claim that does not meet the causal requirements relating to a posteriori knowledge is to argue that it is a priori knowledge. This is the strategy that Lewis adopts. He takes our (supposedly) a priori knowledge of mathematics as a precedent that signals the limits of the proper domain of causal theories of knowledge and grasps the second horn of Benaceraff's dilemma. That is, we are to accept an interpretation of world statements that treats them as quantifying over objects (possible worlds) and we must acknowledge that the modal knowledge that we have is a priori. In particular, our modal knowledge is not in general the causal product of that which is known nor are there justifying statements of our knowledge claims to whose subject matter we stand in any causal relation. To some, arrival at this juncture and the embracing of a priori knowledge so characterized will signal a reductio of the genuine modal realist position. However, that kind of objection to genuine modal realism will not be advanced here. Rather, I am concerned to pursue a critique of realism about possible worlds from the standpoint of one who is prepared to accept that mathematical - and indeed modal - knowledge is a priori in this sense. Thus, the case against possible worlds from this point forth will be essentially comparative. It will be argued that one who accepts genuine objectual realism about (some) mathematical entities and who also accepts an a priori mathematical epistemology is still well placed to maintain anti-realism about possible worlds. My intention is to show that there are many crucial respects in which Lewis's comparison of modal realism with (objectual) mathematical realism can be shown to be extremely unfavourable to modal realism and thereby to undermine the case for realism about possible worlds. Before proceeding with the critical project, it is necessary to defend the prima facie entitlement of the genuine modal realist to the option of an a priori epistemology of modality in the light of foreseeable objections to this entitlement.

(2.3) CHALLENGES TO THE GENUINE MODAL REALIST'S RIGHT TO A PRIORITY REBUTTED: OBJECTIONS AND REPLIES. The following line of argument merits consideration. The failure of modal knowledge (as conceived by the genuine modal realist) to comply with the
causal conditions on knowing establishes by the realist's own admission that we do not have a posteriori knowledge of modality. However there is also good reason for claiming contra modal realism that we do not, indeed cannot, have a priori knowledge of modality either. So given both of these negative claims the modal realist will be left with no basis upon which to account for our modal knowledge.

The crux of this case is the availability or otherwise of support for the contention that there is good reason to hold that modal realism runs foul of appropriate strictures upon a priori knowledge. Lewis embraces a priority, but is he entitled to it? Is it the case that an a priori epistemology is compatible with the objectual realist's conception of the truth conditions of modal statements? In this section I will raise and evaluate a variety of objections against the a priori of modal knowledge in order to evaluate the force of the argument given above.

**OBJECTION 1a**

A priori knowledge must be of subject matter which is abstract, not concrete as Lewis proclaims his worlds to be, and so the right to a priority is compromised by this metaphysical claim.

**REPLY**

The objection as it stands appears susceptible to straightforward refutation on the grounds that there is no reason to hold that a priori knowledge must be of the abstract. Even if mathematics with its abstract objects is a central case of a priority, a little reflection shows that such truths as :

(a) No horse is a cow.
(b) If there are any books on my shelf which are red all over, they are not simultaneously green all over.

are excellent candidates for being about concrete objects and a priori. However, a rejoinder is available.

**OBJECTION 1b**

The examples given in response to the initial objection (1a) concern states of affairs which do not (easily) permit description as physical complexes (e.g. where are these states of affairs located?). Indeed, this goes some way to explaining their recalcitrance re the causal conditions on knowledge. However,
at least some other worldly states of affairs like there being possible but non-actual donkeys do permit description as physical complexes. Given the nature of the state of affairs which constitutes the truth of such possibilities, knowledge of those possibilities should be *a posteriori*.

**REPLY**
The most promising strategy for the genuine modal realist is to argue that the plausibility of the objection derives from a misconstrual of the nature of our modal knowledge. It might be argued that the objection would be appropriate if our modal knowledge - that there could have been donkeys other than those which actually exist - depended on our ability to stand in some cognitive relation to any particular other-worldly donkey but that in fact the knowledge depends on no such thing. What is known is that in some other possible world there is a donkey. It is not that we know of any given world that it contains a donkey or that we have knowledge of some particular non-actual (for us) donkey. If our modal knowledge were so particularized there might be a case for holding that it should be *a posteriori*, but since our modal knowledge is not particularized the case does not stick.21

**OBJECTION 2a**
The realist about possible worlds embraces an *a priori* epistemology at the price of rescinding the (much vaunted) analogy with the reality of places and times.22

**REPLY**
Certainly our knowledge of what is happening at time t in region r is not (in general) *a priori*. Arguably this is knowledge of particulars and on that basis as well as common sense it is no surprise that the knowledge depends on the application of *a posteriori* methods, paradigmatically, *inspection* of the appropriate spatio-temporal location. Moreover, there is, *ex hypothesi* , *a priori* and not *a posteriori* knowledge of modality. Yet a point of analogy with space and time can be secured when we reflect, again in Kantian mood, on the *a priori* status of certain general truths regarding space and time (e.g. the transitivity of the temporal precedence relation - *x precedes y*). It is, as we saw in Reply 1b, equally open to the realist about worlds to endorse the view that our modal knowledge is, in the relevant sense, general and known *a priori*. Knowledge of
what is actually the case may, in appropriate cases, require inspection; knowledge that some worlds are F or that all worlds are G requires reflection on the content of logical space.

**OBJECTION 2b**
While this reply may be successful it does not speak to the original source of disanalogy namely knowledge of what is the case at *particular* places and times.

**REPLY**
This is true but is unclear that this constitutes any but the most indirect of criticisms of modal realism. For the point is that the relationship mooted between logical space and physical space-time is only that of analogy. It is not any part of the modal realist's case that every aspect of the metaphysics or epistemology of space-time should find a mirror image in that of logical space. So the present point may be taken without the modal realist incurring any serious damage.

**OBJECTION 3**
This objection is due to McGinn whom I quote directly:

"*It is very plausible that at least for strict modalities, knowledge of the modality of a given sentence is arrived at a priori...Thus it may be said that we do not gain knowledge of...modalised sentences by quasi-empirical inspection of the possible worlds in virtue of which the sentences are true: rather we come to know them by some sort of grasp of concepts.*"\(^{23}\)

The modal realist is then asked to puzzle about the source of the modal knowledge being...

"...located in a region of reality which is both quite distinct from, and inexplicably related to, the region whose condition the modal knowledge is knowledge of...[since]... the concepts onto which the modal faculty is directed presumably exist in the actual world."\(^{24}\)

**REPLY**
Several points occur here. In the first place, there is obviously an assumption to the effect that *a priori* knowledge is knowledge given by some sort of grasp of
concepts and it simply is not clear whether the objectual modal realist can or should accept this. Lewis denies that modal knowledge is the product of empirical or indeed quasi-empirical inspection of worlds and while he affirms a priority he gives no indication of whether grasp of concepts - as opposed to say a special modal faculty - is efficacious in our modal cognition. In the second place, and more importantly, McGinn's emergent conception of concepts is dubious in the extreme. There would, of course, be a problem about the source of knowledge being located in a region of reality distinct from that which the modal knowledge is knowledge of. However there is a serious worry that McGinn's way of articulating the problem that arises from the conceptual source of modal knowledge encourages a distorted conception of the epistemology and ontology of concepts. As in the case of facts it seems appropriate to pursue relatively innocuous ways of construing talk which appears to commit us to the reification of concepts. But McGinn's usage points us in quite the opposite direction, for talk of concepts "existing in the actual world" and of concepts being "located in a region of reality" is redolent of an objectual metaphysic of concepts. Furthermore, such a metaphysical stance appears to lead inevitably to a vision of the epistemology of understanding which has the agent standing in a cognitive relation to an entity of some kind. The overwhelming difficulty here is that the present objection appears only to make sense if we entertain these metaphysical and epistemological precepts concerning concepts, but the precepts themselves seem quite indefensible. On this basis it is appropriate to rule that the objection does not succeed.

This draws to a close the initial evaluation of the entitlement of the genuine modal realist to the claim that modal knowledge is a priori.

(2.4) SUMMARY.

It has been argued that regardless of whether possible worlds ought to be considered concrete or abstract the modal realist is faced with the salient difficulty that is associated with abstractness i.e. Benacerraf's dilemma. Since it is clear that, causally isolated from us, non-actual worlds cannot meet even the weakest requirements of a causal "theory" of knowledge, it is clear that the modal realist must persevere with the ontology of possible worlds and reject the
unrestricted generality of the causal theory of knowledge. The genuine modal realist's right to pursue (with mathematical realist precedent) an *a priori* epistemology was subject to challenge under a battery of initial objections but it has been argued that the stated objections do not stand as an obstacle to the prima facie right of the genuine modal realist to proceed in this way. Hence, Lewis is granted all that he asks up to this point but it will be argued that beyond this point the analogy with mathematical realism gives out to the detriment of genuine modal realism.

There are in fact two areas in which the campaign against objectual realism can be advanced. The first of these is in what we might call the "internal" epistemology of Lewis's modal realism i.e. the issues of the relationship between modal awareness and imagination, the standard of reliability of modal beliefs etc. The second area covers aspects of the metaphysics of possible worlds which give rise to difficulties other than the purported difficulties associated with abstractness *per se*. In Ch.3 I will deal with the internal epistemology of genuine modal realism and in Ch.4 I will turn to the metaphysical issues.
CHAPTER 3

THE INTERNAL EPistemology OF LEWIS'S MODAL REALISM.

(3.0) INTRODUCTION: THE SCOPE OF INTERNAL EPistemology.

It has been argued that regardless of whether possible worlds ought to be considered concrete or abstract the modal realist is faced with the salient difficulty that is associated with abstractness, i.e. Benacerraf's dilemma. Since it is clear that non-actual worlds that are causally isolated from us cannot meet even the weakest requirements of a causal "theory" of knowledge, it is clear that the modal realist must persevere with the ontology of possible worlds and reject the unrestricted generality of the causal theory of knowledge. The genuine modal realist's right to pursue (with mathematical realist precedent) an a priori epistemology was subject to challenge under a battery of initial objections but it has been argued that the stated objections do not stand as an obstacle to the prima facie right of the genuine modal realist to proceed in this way. Thus, Lewis is granted all that he asks concerning the epistemology of modality up to this point but it will be argued that beyond this point the analogy with mathematical realism gives out, to the detriment of genuine modal realism.

The dissatisfaction stated in this chapter concerns what we might call the "internal" epistemology of Lewis's modal realism. Internal epistemology is to be contrasted with the external epistemology. The latter is concerned with the nature of the connection between external fact and internal representation. The former is concerned with our processes of justification and inference that relate our beliefs one to another and the standard of reliability of our beliefs etc. Thus the external epistemology of mathematics is concerned with the nature of the connection between mathematical reality and the minds in which it is represented - is this process causal?; does it involve the operation of a special non-natural cognitive faculty of intuition? etc. The internal epistemology is oblivious of such issues and is concerned with such questions as the constitution of proof and the purported certainty of mathematical theorems. In the case of objectually construed modality internal epistemology is not concerned, as its external foil is, with the question of how we can have thoughts about other possible worlds at all, but rather with such matters as the methods whereby we come to form certain modal beliefs on the basis of others, and the
reliability that is conferred on modal beliefs so delivered. What we are entitled to expect in the internal epistemology of modality, and what is indeed forthcoming from Lewis, is an account, in some detail of the intellectual procedures - a priority granted - whereby we arrive at our specific modal beliefs. My central contention is that Lewis's internal epistemology of modal realism falls apart under the pressure that he imposes upon it by his insistence that the canonical method of establishing modal beliefs (i.e. the method of recombination) is - analogously to its mathematical counterpart (i.e. proof) - infallible. In the first place, the claim of infallibility, even when rendered remotely plausible by sympathetic interpretation ([(3.3)], is inconsistent with other theses of his on the formation of our modal beliefs [(3.1) - (3.41)]. In the second place, even if Lewis can earn the right to resolve this inconsistency in a way that allows him to hold on to the method of recombination, the claim of infallibility is subject to an independent critique which shows the claim to be either trivial or false [(3.50) - (3.513)].

I feel obliged to give notice at the outset of this chapter that I find great difficulty in interpreting Lewis on recombination and that the interpretation that I propose is not a very charitable one. This combination of features cannot but raise one's own suspicions that misinterpretation has occurred. In response to these suspicions, I will attempt to defend my interpretation wherever possible by direct appeal to textual evidence. To this measure I can add only the statement that I can see no better way of making sense of Lewis's material pertaining to the internal epistemological matters.

(3.1) INTRODUCING AND INTERPRETING THE PRINCIPLE OF RECOMBINATION.

The first step in the exposition of Lewis's internal epistemological views is to introduce the principle of recombination. Lewis holds that ..

"..our everyday modal opinions are in large measure consequences of a principle of recombination."  

The inferential role of the principle of recombination is exemplified as follows:

"To imagine a unicorn and infer its possibility is to reason that a unicorn is possible because a horse and a horn, which are possible because actual, might be juxtaposed in the imagined way. "

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The principle of recombination, then, governs *compossibility*. The principle is viewed as articulating, with a measure of adjusted emphasis, the Humean denial of necessary connection between distinct existences.\(^3\) We are offered the following general sketch:

"**Roughly speaking, the principle is that anything can co-exist with anything else, at least provided that they occupy distinct spatio-temporal positions.**"\(^4\)

There is clearly a need to clarify the structure of the reasoning and the role that is being attributed to imagination in this account of the formation of modal opinion. My view is that we should *not* interpret Lewis as intending that the reasoning to the possibility that there are unicorns contains premises *about* any agent's imaginings. The principle of recombination is intended, I think, as a metaphysical principle; it speaks (recursively) of what is possible given what else is possible. Imagination guides us in synthesizing complex "states of affairs" from simpler components and so it grounds our appreciation of what the synthesis of possible states of affairs might yield. Consequently, I propose the following interpretation of the reasoning that is implicit in Lewis's unicorn example:

1. It is possible that there is a horse. [Justification: P I- Poss P.]
2. It is possible that there is a horn. [Justification: P I- Poss P.]
3. It is possible that there is a horse-horn. [Recombination (1),(2).]

The conclusion of the reasoning to this stage *is not* that it is possible that there is a unicorn. The formulation of the intermediate conclusion (3) reflects a rather open-ended presentation of the content of the synthesized, complex possibility inferred and this again appears to accord with Lewis's intentions.\(^5\) It follows, then, that a further sub-inference is required in reasoning to the possibility that there could be a unicorn i.e. the inference indicated above is to be supplemented with (3) \(\models (4)\):

4. It is possible that there is a horse-horn.

(4) It is possible that there is a unicorn.
In this section I will offer substantial textual evidence in order to attempt to obviate any suspicion that one or more of the theses (a)-(c) that I attribute to Lewis is not in fact advocated by him.

The analogy between modal epistemology and the epistemology of arithmetic is mooted in the context of an extended passage which issues in the claim that the method of recombination is an infallible, general method of arriving at modal beliefs:

"Finally I can take the question how we know as a sceptical challenge: put this alleged knowledge on a firm foundation, show that it is derived by an infallible method. My first response would be to say that here as elsewhere, it is unreasonable to hope for firm foundations or infallible methods. But on second thought, it seems that infallible methods can be had and with the greatest of ease. Probably the right thing to say is that the demand for an infallible method does not make very good sense for knowledge of non-contingent matters, because it is too easily trivialised. For if it is a necessary truth that so and so then believing that so and so is an infallible method of being right. If what I believe is a necessary truth then there is no possibility of being wrong. That is so whatever the subject matter of the necessary truth and no matter how it came to be believed. So perhaps an infallible general method is what is demanded. But that too is suspiciously easy. How about the method of reasoning from certain specified premises which are themselves non-contingent? In the modal case the reasoning might be highly informal consisting mainly of imaginative experiments implicitly premised on a principle of recombination: in the mathematical case the reasoning might proceed more or less rigorously from axioms of iterative set theory or from the axioms of some limited branch of mathematics. Suppose for example that you accept every theorem that you can deduce from the Peano axioms..."
within a certain deductive system. If in fact the axioms are necessarily true (as they are), and the deductive system necessarily preserves truth then you cannot possibly go wrong. You are following a method of arriving at arithmetical opinions that is both infallible and general."6

The clear claim that emerges is that the demand for an infallible and general method of arriving at modal beliefs can be met - and moreover with suspicious ease! - with the citation of the method of reasoning from premises by means of imaginative experiments implicitly premised on the principle of recombination.

Thus thesis (a):

(a) Imaginative experiment premised on the principle of recombination is an infallible general method.

I will postpone discussion of this thesis and proceed to introduce two other theses that Lewis proposes. The first of these is (b):

(b) The method of recombination is dependent on the conducting of imaginative experiments.

This thesis is distilled from such remarks as the following concerning the method of arriving at modal beliefs by reasoning from non-contingent premises:

"In the modal case the reasoning might be highly informal, consisting mainly of imaginative experiments implicitly premised on a principle of recombination."7 (My emphasis - J.D.)

and concerning the principle of recombination:

"(O)ne could imagine reasoning rigorously from a precise formulation of it but in fact our reasoning is more likely to take the form of imaginative experiments."8 (My emphasis - J.D.)

I have no wish to represent Lewis as claiming that our opinions about possibility or compossibility always involve the principle of recombination for this clearly is not his view.9 Nor do I wish to represent him as claiming that recombination is always dependent upon imaginative experiments. However, it emerges plainly that to a large extent, if not the most part, the method of recombination is dependent on the conducting of imaginative experiments and this is the precise way in which thesis (a) should be understood.

There is no difficulty whatsoever concerning the attribution to Lewis of the thesis (c):

(c) (/ OVER).
(c) It is possible to imagine that which is impossible.

In the following crucial passage the relationship between imagination and possibility is set out.

"We sometimes persuade ourselves that things are possible by experiments in imagination. We imagine a horse, imagine a horn on it, and thereby we are persuaded that a unicorn is possible. But imaginability is a poor criterion of possibility. We can imagine the impossible provided we do not imagine it in perfect detail or all at once.....It is impossible to construct a regular polygon of nineteen sides with ruler and compass; it is possible but very complicated to construct one of seventeen sides. In whatever sense I can imagine the possible construction, I can imagine the impossible construction just as well. In both cases, I imagine a texture of arcs and lines with the polygon in the middle. I do not imagine it arc by arc and line by line,......which is how I fail to notice the impossibility."^{10}

It is now obvious that there is at least a threat of mutual inconsistency among (a)-(c). It appears to be the case that (b) and (c) jointly imply that the application of the method of re-combination may yield as output the belief that P where, because this belief is the product in part of imaginative experiments, we cannot rule out that the inferential/imaginative output P is in fact a conception of an impossible state of affairs. This is surely to say that the method of recombination is fallible, but then this would be to conflict directly with (a) which claims the infallibility of the method of recombination.

If the theses (a)-(c) are mutually inconsistent then clearly Lewis is in serious difficulty and must face up to the charge that the epistemological component of his theory of modality "does not work on its own terms"- a charge that he recognizes in advance as an entirely appropriate response to his utilitarian argument for realism.^{11}

(3.3) INFALLIBILITY AS ABSOLUTE JUSTIFICATION

Any attempt to reconcile the theses (a)-(c) is bound to centre upon the concept of infallibility. A favourable resolution of the "tension" between the theses will show that the method of reasoning from recombination is infallible (in this
sense) despite the possibility of imagining the impossible. Lewis's comments on the epistemology of arithmetic suggest a starting point for the development of an appropriate concept of infallibility. The hallmarks of infallibility in the arithmetic case which are noted by Lewis are:

(i) That the premises should be necessarily true.

(ii) That the reasoning should be necessarily truth-preserving.

To these we should add - even if only for the purposes of emphasis:

(iii) That the steps of the reasoning should comprise a genuine proof.

We can then say that when all three conditions are met we have an absolute justification for our belief in the theorem. In speaking of a given argument "genuinely" being a proof one appeals implicitly to a standard which a purported proof must meet in order to be a proof. Let us make this standard explicit. Let us say, as a matter of fiat, that a publicly inspectable sequence of steps in a piece of mathematical reasoning is (genuinely) a proof if it is asserted to be so by appropriate members of the community (i.e. competent judges) after arbitrarily many checks under optimal conditions of assessment.

Now, any purported standard of genuine proof must be able to preserve the status of mathematical claims as judgements and this involves the preservation of a distinction between apparent and genuine proof. The proposed standard achieves this since it does not endorse as a (genuine, real) proof just whatever any one judge accepts as a proof on the basis of one inspection, and this is as it should be since it is uncontroversial that there may be errors of reasoning that survive that extent of verification undetected. In particular every conception of mathematical epistemology must be permitted to distance itself from the ridiculous claim that error cannot arise in the attempt to apply a rule of inference and from the equally ridiculous claim that mathematical proof is infallible in the sense that it depends only upon rules which are (nobody knows how!) protected from the possibility of misapplication.

Now that we have to hand an explicit conception of the nature of absolute justification in mathematics, we can interpret infallibility as absolute justification and then proceed to investigate the consistency of the thesis of the infallibility (so interpreted) of the method of recombination with the thesis of the imaginability of the impossible.
Is the method of recombination a form of absolute justification? According to the concept of absolute justification that has been introduced there are three necessary conditions to consider. I have no quibble concerning the satisfaction of the first condition which requires that the premises of the reasoning are necessarily true. This condition is not of central concern and we can grant it to Lewis in the case of all premises which are governed by a possibility operator including (1),(2) and (3) of the example given at (3.1) above. It is a confusion to allege that these premises state possibilities and are not therefore - in general - necessities, for the relevant question is whether statements that are governed by possibility operators are, if true, necessary. The necessity of possibilities is guaranteed by the S5 principle:

\[(S5) \quad \Diamond P \vdash \Box \Diamond P\]

and for present purposes we should take this for granted.

I will argue that we cannot accept that recombinative reasoning has the status of absolute justification. Firstly, [(3.41)], because there is some reason to hold that the first sub-inferential step that is involved in recombinative reasoning is not necessarily truth-preserving. Moreover it is all but explicit in Lewis's epistemology that this is the case. Secondly, [(3.42)], because the claim that the second sub-inferential step is necessarily truth-preserving is quite untenable.

The second and third conditions on absolute justification - i.e. that the steps of the reasoning should be necessarily truth-preserving and that they should not constitute mis-applications of relevant "rules" - must be considered in conjunction. These must be considered in tandem because of the existence of a strategy for handling *prima facie* counterexamples to truth-preservingness. The strategy is applied in the case of deductive reasoning where it is natural to operate a policy of looking to explain *prima facie* counterexamples to truth-preservingness as *misapplications* of valid rules of inference. There is, *on the face of it*, no reason to think that what is given in recombinative imagination from possibilities must be possible and, moreover, this seems to
be a principal lesson of Lewis's polygon example. If we imagine drawing this line and then that one and so forth - synthesizing the image so that we come to imagine having constructed (by relevantly restricted means) a regular polygon of nineteen sides - a _de facto_ impossibility, we are told, has been imagined. Hence the first sub-inferential step, represented in our example by (1), (2) \( \vdash (3): \)

(1) It is possible that there is a horse.

(2) It is possible that there is a horn)

(3) It is possible that there is a horse-horn. [Recombination (1),(2)]

is not necessarily truth-preserving despite its eminent plausibility in this instance, where we are faced with no difficulty of perspective, detail or other complexity. The obvious way around this difficulty is to sacrifice the theoretical description of the polygon example as a case of imagining the impossible i.e. to give up the description of the process as a genuine imagining that \( P \) and to discount it as a case of _seeming to imagine that_ \( P \) or a case in which _one imagines a non-\( P \)-but-\( P \)-seeming_ state of affairs. It would be a natural consequence of adopting this policy that one should abandon the thesis (c) i.e. that it is possible (genuinely) to imagine the impossible.

Why does Lewis eschew this option? He is reluctant to say that the agent has _not_ imagined a process of 19-agon construction, and understandably so, for it is far from obvious that we _should_ say that one cannot really imagine the impossible. One might, for example, be inclined to take the view that ascriptions of imaginative content have what Putnam calls _the appearance logic_ \(^\text{15}\) and so to endorse the validity of the inference (AL):

(\text{AL}) X THINKS THAT ( X IMAGINES THAT P) \( \vdash X \text{ IMAGINES THAT P} \)

The salient problem with taking the appearance logic position (in any case) is that it threatens to conflict head-on with the requirement of _judgements_ that there should be a constitutive distinction between what is right and what seems to the judge to be right.\(^\text{16}\) In any event, it is unlikely that Lewis would take this view since he refuses to accept this conception of the "logic" of pain ascriptions\(^\text{17}\) - supposedly the paradigm case - and the retreat to the appearance logic is less promising in the case of imagination. Whatever one thinks of pain-ascriptions in this regard, the point is that the temptation to the
appearance logic in the pain case is augmented by the lack of appeal that attends such discriminations as *seeming to be in pain* or *being in a pain seeming state* when these are counterposed to that of *being in pain*. Intuition suggests that there is nothing like so potent a case to be made for the claim that the parallel discriminations with respect to imagination are distinctions in the absence of difference. However, even if ascriptions of imaginative content ought to be contrasted with pain-ascriptions with respect to their susceptibility to an appearance logic treatment, they should also be contrasted with ascriptions of proof-possession, in which *no-one* will be found wanting to disavow the propriety of the distinctions between *seeming to prove that P*, *proving a P-like theorem* and *proving that P*.

The point is not that Lewis in opting for the thesis of the imaginability of the impossible is opting for a thesis that is obviously false, but rather that he is opting for a thesis that stands in opposition to a central requirement of his own modal epistemology, i.e. that recombinative reasoning should be necessarily truth-preserving. The situation is even more perplexing when we take into account the fact that Lewis clearly regards the phenomenon of imagining the impossible as a by-product of cognitive *limitation* as when he states (above) that we can imagine the impossible "provided that we do not imagine it in perfect detail or all at once". Why, given that he is prepared to go this far, does he not take the further step of classifying the imaginative process as involving errors and thereby facilitate a defence of the claim that recombinative reasoning is necessarily truth-preserving?

I will not attempt to pursue this question. Rather, I will settle for suggesting that Lewis makes a *strategic error* in attempting to maintain the thesis (c). As things stand, he holds inconsistently that it is possible to imagine the (logically) impossible, that reasoning from recombination is dependent upon imaginative experiments and that such reasoning constitutes an infallible method.

But what if this inconsistency were resolved by simply dropping the thesis (c)? After all (c) hardly seems essential to genuine modal realism *per se* and it has already been indicated that neither the assertion nor the denial of the imaginability of the logically impossible is glaringly false. If Lewis were to accept that the thesis (c) is false would there remain any barriers to the claim that recombinative reasoning confers absolute justification upon the conclusions
that it generates?
The account that I offered of recombinative reasoning at (3.1) represented the modal conclusion a consequence of the two sub-inferences, \((1), (2) \models (3)\) and \((3) \models (4)\). The foregoing objection was that the purported possibility of imagining the impossible undermines the claim to necessary truth-preservingness of the inference \((1), (2) \models (3)\). Even if the spectre of thesis \((c)\) were to be exorcised along with any other doubts that might attend the necessary truth-preservingness of the first sub-inference, there is still the second sub-inference of recombinative reasoning to consider. If the inference \((3) \models (4)\) is not necessarily truth-preserving then neither is the inference \((1) \models (4)\) and the method of reasoning from recombination does not confer absolute justification on the conclusions that it generates.

\((3.50)\) THE SUB-INFERENCE \((3) \models (4)\): FROM HORSE-HORN TO UNICORN

The second sub-inference is \((3) \models (4)\):

\(3\) It is possible that there is a horse-horn.

\(4\) It is possible that there is a unicorn.

The principle of recombination rules out failures of the \textit{plenitude} of logical space for, as Lewis sees it, plenitude amounts to a re-iteration of the Humean thesis that any thing can exist with or without any other thing, and the principle of recombination is intended as an expression of this.\(^{18}\) So plenitude requires and recombination ensures that...

"...(l)f there could be a talking head contiguous to the rest of a \textit{living human body} but there couldn't be a talking head separate from the rest of a human body, that...would be a failure of \textit{plenitude}...." \(^{19}\)

In other words, it is an intended consequence of recombination that there could be a talking head separate from the rest of a human body since there could be a talking head contiguous to the rest of a human body and anything could exist with(out) any other thing. Also, as we have already seen, it is an intended consequence of the principle that there could be a unicorn.

It is of the utmost importance to separate out what is controversial and what is uncontroversial in Lewis's conception of the deliverances of recombination. No-one would want to argue that there could not be entities consisting of a
contiguity or juxtaposition of the horse-like with the horn-like. No-one would want to argue that there could not be unicorn-like entities, where it is understood that this description is neutral with respect to the issue of whether the entities in question would be unicorns or not. Now we are in a position to state that what is controversial in Lewis's deployment of recombination is his claim that these unicorn-like creatures would be unicorns. I say that this final claim depends upon a substantive inference from what imaginative recombination uncontroversially delivers and, furthermore, that Lewis has to show that the inferential passage in this and similar cases is necessarily truth-preserving, if the claim to absolute justification is to be sustained.

Naturally, Lewis accepts that we are faced with judgements concerning what is possible with respect to which our pictoral-imaginative powers are of no help. He accepts, for example, that the possible topographies of space-time cannot be settled via an appeal to imaginative re-combination. The need for recourse to methods other than imaginative recombination is not in the least surprising, for recombination is hard pushed to gain a foot-hold where we are dealing with elements that are not imaginable (in the pictorially oriented sense) in the first place. In the topography of space-time the pictoral conception cannot even get started. On the other hand, in the constructive geometry of n-sided polygons (at least for manageably small n) we have a case in which the pictoral conception of imagination and the (publicly manifestable) manipulation of pictorial elements is thoroughly relevant (if not decisive) with respect to judgements of possibility.

However, what must also be acknowledged is that there are cases of an intermediate type as well i.e. cases which do not defy picturing but in which there is no good reason to believe that our modal opinions ought to be settled in virtue of pictoral considerations. We have, in effect, a three-fold distinction of cases as far as the role of pictoral imagination is concerned. Cases in which the picturing is: (i) applicable and decisive; (ii) inapplicable; (iii) applicable and indecisive. Putative talking donkeys, unicorns and autonomous talking heads are all examples of the third kind, for in each case the suspicion that we are imagining the impossible is unmoved by the availability of an imaginative picture to be associated with the controversial possibility. It is not a picture that we lack in these cases: otherwise the possibility of a unicorn should not even be
a matter of dispute, but a matter of dispute it certainly is. If one accepts that there are indeed cases of this third kind in which a picture is available but quite indecisive then one surely must accept that it is appropriate to present recombinative reasoning as constituted by two sub-inferential steps. To represent the recombinative reasoning in a truncated form (1), (2) $\vdash$ (4) viz:

(1) It is possible that there is a horse. [Justification: $P \vdash$ Poss $P$]
(2) It is possible that there is a horn. [Justification: $P \vdash$ Poss $P$]
(4) It is possible that there is a unicorn. [Recombination (1),(2).]

is to represent in a highly tendentious fashion the result of the juxtapositional imaginative experiment. The only role that picturing is actually playing here is to allow us to grasp the juxtaposition of the horse-like with the horn-like but the possibility of a unicorn is not decided by this. The burning question is, why is that a picture of that possibility? and no less than an answer which convinces us that the picture literally must be of that possibility can sustain the purported necessary truth-preservingness of recombinative reasoning. Lewis, I say, must provide an account of what it is that licenses the transition from (3) to (4):

(3) It is possible that there is a horse-horn.
(4) It is possible that there is a unicorn.

given that neither he nor anyone else can take the view that pictorial equivalence suffices.

(3.510) LEWIS'S TREATMENT OF THE SUB-INFERENCE (3) $\vdash$ (4) REJECTED

Would Lewis accept that he has an obligation to provide an account of this inference? In fact, an extremely perplexing passage suggests that his attitude to the challenge at the end of the last section would be ambivalent in the extreme. In this passage he is referring to his acceptance, on the grounds of plenitude/recombination that there could be such things as a talking head not contiguous to any body, a dragon and a unicorn:

"I mean that plenitude requires that there could be a separate thing exactly like a talking head contiguous to a human body. Perhaps you would not wish to call that thing a "head" or you would not wish
to call what it does "talking". I am somewhat inclined to disagree, and somewhat inclined to doubt that usage establishes a settled answer to such a far-fetched question; but never mind. What the thing is called is entirely beside the point. Likewise when I speak of possible dragons or unicorns, I mean animals that fit the stereotypes we associate with those names. I am not here concerned with Kripke's problem of whether such animals are rightly called by those names."

The passage is perplexing since Lewis seems to be making a variety of claims and qualifications which are not easily seen to be mutually consistent. At the same time he seems to be saying that he is claiming that it is the possibility of a detached talking-head-like thing and not the possibility of a detached talking head that the imaginative experiment establishes; that a detached talking-head like thing would be a detached talking head and that it is indeterminate whether a detached talking-head-like thing can rightly be called a talking head. On top of these claims we are also given the strange remark concerning "Kripke's problem". I will attempt to work through these claims and their inter-relations.

**KRIPKE'S PROBLEM?**

Let us first consider "Kripke's problem". The disavowal of concern with what the thing is called or whether things are rightly called by such and such a name is quite inappropriate. Lewis writes as if there are entities that literally confront us and since we know that it is these things of which we are speaking, what we call them is neither here nor there. This is not only inaccurate but it neglects a crucial connection between language and reality.

When it comes to speaking of what we imagine the position is that because we are not confronted with something in the communal environment there can be no question of using demonstratives to specify directly the semantic content of our thoughts. The only way in which the content of imaginings can be specified is by the use of descriptions (an x such that Fx & Gx...) and indirect or comparative demonstratives (an x that is like this except in that Hx), all of this in the context of constraints of conversational implicature. The semantic content of imaginings are specified in this way or not at all. Therefore, when we are dealing with the imagined, everything depends upon what "the thing" (sic) is
called and how it is described, for we have no other way of fixing upon the kind of thing of which we wish to speak. More generally and perhaps more importantly it is quite wrong to attempt to discard the matter of whether a thing can rightly be called by such and such a name. Kripke's problem is indeed in the first instance one that seems to be entirely internal to linguistic concerns for he is dealing with the question of whether, in different kinds of case, it is true that \( x \) fits the "F"-stereotype if and only if \( x \) is rightly called "F". But the question of whether a thing can rightly be called "F" cannot but be metaphysically substantive for it is partly constitutive of the normativity of language use and the connection between language and reality that \( x \) ought to be called an "F" if and only if \( x \) is an F.

Let us suppose that (in the actual world) we discover on Mars creatures which are exactly like tigers both superficially and in respect of internal structure but which are not sprung from the same stock as Earth tigers. Now it is obvious that it is not obvious whether these things are tigers. What we actually choose to call them is indeed entirely beside the point in the sense that we do not make it the case that these creatures are (or are not) tigers in choosing to apply (or withhold) the appellation "tiger". However, it is also the case is that once we do everything within our powers at a given time to arrive at a judgement as to whether the creatures ought to be called "tigers" we have done everything in our power at that time to establish whether they are tigers and vice-versa. Our best judgement as to whether the creatures are tigers determines and is determined by our best judgement as to whether the creatures ought to be called "tigers". So, "Kripke's problem" of whether given animals are rightly called by a particular (kind) name "F" is not separable from the problem of whether the animals are F's. There is no question of being concerned with one problem but not the other. Given these two considerations the question of whether it is possible that there is a talking head separate from a human body is entirely exhausted in our asking whether there could be a thing satisfying such and such conditions that would rightly be called "a talking head".

(3.512) INDETERMINACY.

Let us now deal with the indeterminacy or underdetermination that Lewis appears to discern regarding the issue of whether the controversial thing should
be called a "talking head", as when he writes:

"I am....somewhat inclined to doubt that usage establishes a settled answer to such a far-fetched question..."^{26}

It is not clear why this view is taken, but whether the source of under-determination is some deep-rooted semantic indeterminacy, vagueness or the *open-endedness* of our concepts, let us accept it. All that we need be taken to admit thereby is that there is no question of characterizing the relationship between (3) and (4) as being such that (4) is *entailed by* - i.e. is a classical analytic, synonymy-based semantic consequence of - (3). The very most that can reasonably demanded of the inference (3) $\vdash$ (4) is the maximal similarity to analytic entailment that our post-Quinean, post-Wittgensteinian sophistication can tolerate and this is, I believe, a qualification that Lewis would expect us to bring to bear in our reading of his claim to necessary truth-preservingness in this context. It is notable that the acknowledgement of this indeterminacy does not stop Lewis from taking a position on the question of whether we should apply the terms "talking" and "head". He cannot, therefore expect an opponent who acknowledges indeterminacy to hold back on such opinions either. So the dispute may proceed without further reference to indeterminacy.

*(3.513) EXACT LIKENESS AND STEREOTYPES.*

What is left to settle is whether Lewis does *indeed* intend, as we have been led to believe throughout, that recombinative inference establishes that there could be detached talking heads, unicorns, dragons etc. In the quoted passage he seems to be entering a qualification of this position when he says:

"... when I speak of possible dragons or unicorns, I mean animals that fit the stereotypes we associate with those names. "^{27}

Moreover, there is also the suggestion that he takes this to be equivalent to the claim that...

".....plenitude requires that there could be a separate thing *exactly like* a talking head contiguous to a human body. "^{28}

Now Lewis is doing one of two things here. Firstly, he may be weakening his claim and arguing that all that recombinative reasoning establishes infallibly is the weaker of these possibilities, i.e. (3). Secondly, he may be arguing that, in
these cases at least, anything that fits the "F"-stereotype is an "F" in which case if (3) is to be understood as constituting the possibility that there is something that fits the "unicorn"-stereotype then this additional argument licenses the inference (3) |= (4) i.e. to the possibility that there is a unicorn.

The first option then is to interpret Lewis as remaining agnostic on the issue of whether the inference (3) |= (4) is necessarily truth-preserving but arguing instead for the necessary truth-preservingness of the inference (1), (2) |= (3') where (3') is a more specific version of our (3) viz:

\[(3') \text{ It is possible that there is an } x \text{ such that } x \text{ fits the "unicorn" stereotype.}\]

In effect this strategy has been tackled at (3.50). Even if we restrict attention to cases where the fallibility of the imagination with respect to complexity of pictorial detail and perspective cannot seriously be held to undermine the soundness of the inference (e.g. talking heads, unicorns and dragons) all that seems to transpire is that Lewis's claim becomes trivial. There is, to re-iterate, no serious debate as to whether there could be satisfiers of the stereotypes that are associated with "unicorn" etc. but in modal theorizing we have an interest in much more than these possibilities. We have an interest, for example, in whether a person can survive bodily death, in whether pain could be unfelt and in whether there could be language-speaking horses, but an imaginative/recombinative epistemology under this weak interpretation does not address these stronger possibilities in whose endorsement or rejection we have an interest, for this interest is neither extinguished nor appeased when we are convinced that there could be or indeed are such \(P\)-seeming states of affairs.

The second strategy involves arguing that the inference from "F" stereotype to \(F\) - (3) |= (4) - is truth-preserving. When this strategy is at issue it is thoroughly inappropriate to use the highly tendentious "exactly like" formulation:

"......plenitude requires that there could be a separate thing exactly like a talking head contiguous to a human body."\(^{29}\)

in order to provide support for the soundness of this style of inference. The point is that this \textit{formulation} can satisfy everyone for its implicit appeal is to the trivial truth of the platitude that \textit{what is exactly like a }\&\text{ is a }\&\text{ but of course the point is that modal theorists dispute what exact likeness must amount to in order to sustain this truth. For example let us consider the putative detached talking
head which is supposedly exactly like a head except in not being contiguous to
a body. This specification is extremely vague as it stands and remember that
when we are trying to fix the content of our imaginings these means of
specification are all that we have. Let us try to do better. Say that we have in
mind a thing which until time \( t \) is exactly like your body-contiguous head; it is
the head of a human being, that human being is a member of a language
speaking community; at each instant of its history this thing has been
fundamental-particle-indiscernible from your head at the comparative instant.
Then at \( t \) this 'head' is separated from its body but under unspecified further
circumstances it continues to execute intelligible, intelligent and responsive
verbal behaviour and continues to be recognized and treated as a competent
speaker of the language. This I think is among the strongest detailed versions
of exact likeness that can be mustered here and I am inclined to say that
something that conformed to this specification would indeed be a talking head
detached from a body. However, I am also inclined to say that the specification
can be no weaker than this if \textit{that very possibility - the possibility of a talking
head} - is to be sustained. In particular, there are certain conceptions of \textit{exact
likeness} that won't do. It won't do to just to specify a non-bodily-contiguous
entity that is \textit{physically indiscernible from} your talking head in the absence of
any other specification of biological or social context, for, arguably, this
arrangement of particles could be all that there is, in which case the notion of a
language becomes untenable as does the notion of talking (talking \textit{about
what}?). Perhaps the foregoing is contentious, but it is not contentious (surely!)
that the specification \textit{looks like a detached talking head} is not sufficient to
determine the application of the term "talking head" to the detached thing. This
would be, in effect, to argue that the possibility at issue is one in which the
availability of a mental picture is decisive and this is a thoroughly implausible
outcome. To register the point with a different emphasis,"exactly like" cannot be
restricted to a phenomenalistic interpretation if the inference from \textit{it is possible
that there is something exactly like an F} to \textit{it is possible that there is an F} is
to have any credibility.

Given these observations it seems fair to say that the introduction of \textit{exact
likeness} is extremely unhelpful, and all the more so given that it seems that
Lewis has a straightforwardly statable interpretation of \textit{exact likeness} in mind,
i.e. in these cases at least, anything that fits the "F"-stereotype is an "F". The convincingness of this thesis is case sensitive as can be seen from the divergent claims that are made by e.g. Putnam and Kripke with respect to such predicates as "Pain (x)" and "Water (x)", so the very least that Lewis owes us is a characterization of the range of cases in which he wants to say that the inference from "F"-stereotype to "F" does preserve truth. But even if this can be done convincingly for a small range of predicates it is absolutely clear that for the most part if not always the inference will not preserve truth, for the whole point of introducing the concept of a stereotype is to locate the modally relevant difference - in the case of natural kind terms in particular - between satisfying the "F"-stereotype and (rightly) satisfying the predicate "F".

My conclusion is that Lewis has not made clear his strategy with respect to the handling of the apparently indispensable sub-inference (3) \( \vdash (4) \) and that the different strategies that he may be interpreted as intending are both quite unsatisfactory. In sum, there is, and always was every reason to hold that the inferential move from (3) to (4) is not necessarily truth-preserving and Lewis has given us no reason to think otherwise.

(3.6) **A CAUTIOUS APPRAISAL OF THE FOREGOING CASE AGAINST RECOMBINATIVE EPISTEMOLOGY**

Even if the argument of this chapter were held to have established conclusively that Lewis's internal epistemology of modal realism is in disarray - and I do not claim that it does - there would inevitably remain the suspicion that this is no argument against the ontological thesis of modal realism *per se*. Of course it will be accepted that the genuine modal realist cannot simply remain silent on questions of epistemology, but it might also be held that there is no need to accept Lewis's recombinative epistemology as the inevitable or even the natural epistemological component of a total modal theory based upon the ontological commitments of modal realism. In short, it might be argued that the efforts of this chapter are at best contributions towards a critique of recombination, and that the genuine modal realist is at liberty to benefit from this critique and to construct an alternative or re-vamped conception of the epistemology of modality.

This appraisal of the relevance of the foregoing discussion may not be unfair
but the criticism of Lewis's modal epistemology does carry rather more significance than this appraisal would suggest, since it is (as far as I am aware) the only attempt that there has been by a proponent of genuine modal realism to discharge the obligation to deal with the question of how we know in matters of possibility and necessity. The criticism that is implicit in the cautious appraisal of the arguments against the recombinative epistemology is that these arguments do not show that there can be no viable epistemology of genuine modal realism and, of course, that point is well taken. However the chapter stands as a critique of modal realist epistemology such as it is and this cannot be irrelevant to the evaluation of the viability of modal realism.
CHAPTER FOUR.
THE METAPHYSICAL CASE AGAINST POSSIBLE WORLDS

(4.0) INTRODUCTION
This chapter is based upon the development and re-orientation of two related metaphysical objections which McGinn raises against the status of possible worlds as genuine individuals. These objections are allegations that possible worlds fail to satisfy two conditions which are mooted as necessary conditions of individuality. The conditions will be labelled the essentialist and the extra-linguistic conditions respectively. Among the many metaphysical objections which have been launched against Lewis’s realism these objections have been selected for discussion and development since they give rise to a challenging comparison of possible worlds with the (abstract) entities of mathematics. It will be argued [(4.20)-(4.23)] that the objection based upon the essentialist condition is attractive but indecisive. It will then be argued [(4.30)-(4.34)] that an objection derived from the extra-linguistic condition (which constitutes a substantial amendment of McGinn’s initial objection) delivers a devastating blow to realism about possible worlds. Before developing these objections, it will be helpful first to state McGinn’s version of the objections and to remark upon the dialectical significance that ought to be associated with them.

(4.1) McGINN’S OBJECTIONS STATED AND THEIR DIALECTICAL SIGNIFICANCE ASSESSED.
McGinn’s objections are posed as a two-pronged attack on the notion that possible worlds are genuine individuals. The objections are stated and their philosophical motivation supplied in the following passage:

"... (I)t is not easy to define the notion of an individual, vital as that notion is, but the following two conditions seem necessary to individuality: something is a genuine individual only if (a) it admits of proper identification short of exhaustive characterization, and (b) its properties partition (non-trivially) into the essential and the accidental. Condition (a) captures the idea that an individual is an extra-linguistic entity whose properties exceed those we happen to
fix upon in referring to it: and this is essential if we are to apply the picture of first identifying an individual as a potential object of predication, and then informatively characterizing it by coupling the identifying singular term with a predicative expression. Condition (b) tells us that an individual is something that has certain properties essentially, but it is also such that it can exist through variation in respect of other of its properties. Both conditions ensure that an individual is something distinct from the descriptions true of it."

Lewis's explicit ontological claims are that possible worlds are individuals and in the context of his genuine modal realism, this is to say that they are sui generis entities of a kind with the actual world. This genuine realist outlook is to be distinguished from its ersatzist rivals and in particular from linguistic ersatzism which is the thesis that possible worlds are to be identified with abstract individuals which have the status of linguistic representations of the actual world. Lewis, therefore, ought to relish the prospect of developing criteria which facilitate the demonstration of the status of possible worlds as individual language-independent entities and McGinn's purported necessary conditions of genuine (extra-linguistic) individuality constitute criteria of this nature. As such the dialectical burden which falls to the genuine modal realist is to show either that McGinn is wrong in alleging that possible worlds fail the condition(s) or to challenge the status of the proposed conditions as (genuinely) necessary conditions of individuality. But what ought to be the dialectical position of the proponent of these objections?

On this issue Lewis and I stand on one side and McGinn stands on the other. McGinn takes the dialectical significance of these objections to be such that their success would point the way towards a non-objectual construal of possible worlds. As he puts it:

"Indeed, it seems more natural to construe what are called possible worlds (sic) as ontologically of the nature of states and properties; but if so modality belongs rather with predicate position: it is not properly associated with values of individual variables."  

And then:

"So formulas containing alleged world variables should be viewed
with suspicion: we do not understand their import just because we can write them down - we must satisfy ourselves that they can really mean what they purport to. It seems to me that the indicated problematic status of possible worlds as individuals renders surprising the reluctance of our language to treat them so. "5

My unease with this assessment of the position can be articulated in two ways. The first of these is to re-iterate the worry of Ch.1 concerning the real meaning of statements.6 There it was argued that the notion that possible world statements give the real semantic structure of their modal operator counterparts was deeply misconceived, and in Ch.5 I will argue that the reverse tactic of arguing that modal operator statements give the real semantic structure of possible world sentences is equally misconceived.7 The arguments for these claims will not be rehearsed (anticipated) here. The point is that McGinn's suggestions that we should consider construing possible worlds as being non-objectual and that we do not really understand the import of "alleged world variables" are redolent of the claim that apparently first-order quantificational possible world sentences do not mean what they appear to mean and, I argue elsewhere, this is an unsatisfactory way to interpret these sentences.

The second way of articulating unease about McGinn's conception of the consequence of the success of his objections is by staking the more generally appreciable claim that his proposal to deal with possible world statements as something other than first-order quantifications over worldly objects constitutes a stretching of the meaning of the term "possible world" beyond acceptable limits.

Lewis notes and dismisses an attempt to reconcile his views with those of his ersatzist opponents. This attempt at reconciliation proceeds on the basis of the claim that there is agreement on the question of whether there are possible worlds and disagreement only on the matter of what their nature is.8

He writes:

"Compare the foolish suggestion that all of us at least agree that God exists, although we disagree about His nature: some say He's a supernatural person, some say He's the cosmos in all its glory, some say He's the triumphal march of history,... Given that much disagreement about 'His' nature, there's nothing we all believe
This response, harsh sentiments aside, is, I believe, quite appropriately directed at McGinn's attempt to construe possible worlds as entities other than the values of first-order variables. Matters are simplified and better interpretation ensues if we say that either possible worlds are individuals or there are no possible worlds and, accordingly, if an argument is successful in showing that possible worlds are not individuals, then it is successful in showing that there are no possible worlds. Lewis, I contend, will be committed to viewing the dialectical position in the same way - what turns upon the success of McGinn's objections is the matter of the existence of possible worlds and the viability of any non-objectual construal of modality is quite a separate matter. Thus, I wish to consider McGinn's objections in the context of a conception of their dialectical significance which is stronger than McGinn seems prepared to allow, but which Lewis would (should!) welcome. To reiterate, the genuine modal realist must show either that McGinn is wrong in alleging that possible worlds fail the condition(s) or challenge the status of the proposed conditions as (genuinely) necessary conditions of individuality. If the status of the conditions can be maintained and possible worlds can be shown to fail them, then what is shown thereby is that there are no possible worlds.

(4.20) THE ESSENTIALIST CONDITION (ESS)

The essentialist necessary condition on individuality (ESS) is as follows:

\[(\text{ESS}) \text{ Entities of a purported kind are genuine individuals only if their properties admit of proper partition into the essential and the accidental.}\]

The (nominal) choice facing the modal realist is to choose between challenging the status of the condition and establishing that possible worlds do not fall foul of its strictures. In fact only the former is tenable, since the genuine modal realist cannot accept the latter. That the genuine modal realist cannot accept the non-trivial partition of the properties of worlds into accidental and essential is something that can be shown more easily when presented as a consequence of the second of two cases that the realist can make for challenging the status of the condition. These points will be addressed in due course [(4.23)]. However, there is a distinct kind of reason that may be adduced for the purpose of
challenging the status of the condition (ESS) which merits first consideration.

(4.21) **THE STRATEGY OF UNDERMINING (ESS) BY MEANS OF A COUNTEREXAMPLE**

The modal realist might refuse to accept the essential/accidental partition as a necessary condition of individuality on the grounds that McGinn has provided no positive case for its acceptance. But this would be to claim the high ground in the matter of the burden of proof in a situation where the right of either protagonist to do so is extremely dubious. It seems more promising and more reasonable to attempt to proceed indirectly and to evaluate the plausibility of the condition by considering the consequences that it has in terms of the candidates that it functions to exclude from the class of real, genuine individuals. In the context of this evaluative procedure, the modal realist will strive to point to (other) cases where antecedently acceptable candidates are excluded as a result of the imposition of the condition and thereby to undermine the plausibility of the condition. McGinn argues convincingly that places and times can be regarded as having both essential and contingent properties but, perhaps surprisingly, he does not consider mathematical entities. Let us consider, then, the mathematical realm as a prospective source of counterexamples which will serve to undermine the authority of (ESS).

(4.22) **A TENTATIVELY PESSIMISTIC EVALUATION OF THE PROSPECTS OF A MATHEMATICAL COUNTER-EXAMPLE.**

Whether natural numbers are to be regarded as having contingent properties or not seems to be entirely a matter of what ought to be counted as a property. Such properties as *being Saul's favourite number*, or *numbering the moons of Venus*, might be treated as contingent properties of the number two, but it is clear that the modality of the association of these properties with the number two is traceable to the contingency of certain psychological facts about Saul, on one hand, and the contingency of certain astronomical states of affairs on the other. However, there appears to be no unproblematic way of dealing with such prima facie contingent properties.

Card-carrying platonist Katz, categorizes pure mathematical properties as the basic properties of numbers and other properties as non-basic. This allows
us to effect an intuitively compelling distinction between different kinds of property while avoiding the strain of a definitive exclusion of non-pure-mathematical candidates from the range of a number’s properties. On the basis of this taxonomy of properties, presumably, both of our problematic properties will emerge as non-basic properties of the number two, but contingent properties of the number two nonetheless. So, the proper partition of essential and accidental properties is secured by this liberal construal which includes non-basic properties within the range of properties tout court.

On the other hand, one’s inclination might be to accept the strain and attempt to enforce the exclusion of non-basic properties from the range of genuine properties of the number two. The main difficulty associated with this option is that the exclusion will require independent and non ad hoc philosophical motivation if it is not to smack of the gerrymandering of the range of properties to suit the purpose of undermining (ESS). We should retain an open mind about the prospects of developing an appropriately principled basis upon which the restriction to basic properties might be secured.

If the case of natural numbers is indecisive, what of the case of sets? There is intuitive appeal in the idea that the only genuine properties of sets are the properties of their composition, i.e. the properties of having such and such members. Moreover, since there are overwhelming and independent reasons for holding that it is of the essence of a set that it should have exactly the members that it has12 (and hence exactly the cardinality that it has) there is intuitive appeal to the claim that the properties of sets do not admit of proper partition into the essential and the accidental. But even if we accept that the only genuine properties of sets are the properties of their composition we simply force the issue one stage back to the question of which properties count as properties of composition. To see this consider the following two-stage, pro-contingency argument:

(1) It is necessary that x is a member of S
(2) It is contingent that x is blue.

(1), (2) I= (3)

(3) It is contingent that S has a member which is blue.

Then, (3)I=(4)
(4) It is a contingent property of S that it has a blue member.
There just seems to be no determinate answer to the question of whether having a blue member is a property of composition of S or not, nor, for that matter, to the question of whether the inference from (3) to (4) is necessarily truth-preserving.

In sum, it is not to be ruled out that the modal realist might be able to construct a case for the ineffectiveness of (ESS) which is based upon its independent ineffectiveness in excluding from the range of genuine individuals mathematical entities such as natural numbers and/or sets. But the prospects for the success of this strategy look meagre for two main reasons.
The first is that it is difficult to see how a satisfactory and non-tendentious conception of the range of the properties of numbers or sets might be circumscribed and the success of the strategy would appear to depend upon this possibility. The second is that even if it could somehow be established that natural numbers and/or sets do fall foul of the restriction that (ESS) imposes upon individuals, the option of arguing that natural numbers and/or sets were rightly excluded from the realm of individuals would remain to be addressed. McGinn is rightly coy about the standing of the notion of an individual and it would be unwise to attempt to place too much weight upon a claim of pre-analytical understanding of its content. I have no suggestions as to how we might attempt to settle the question of whether sets are individuals. However, it may be worth noting that Lewis does not contest the practice of contrasting sets with individuals.13 This is of interest given that the price of acceptance of this contrast will be to deprive the opponent of (ESS) of a potential counter-example to its effectiveness.

The opponent of (ESS) would be well justified in remarking that the authority of the condition is far more problematic a matter than McGinn's brief discussion would suggest. However, the condition does enjoy substantial intuitive appeal and the authority which it derives from its intuitive appeal is not immediately threatened by the prospect of a clear mathematical counter-example.

(4.23) A TENTATIVELY OPTIMISTIC EVALUATION OF THE STRATEGY OF UNDERMINING (ESS) BY ALLEGING ILLICIT PRESUPPOSITION
In the event that no counter-example to (ESS), mathematical or otherwise, is to
be had, the prospect of insisting upon realism about possible worlds at the expense of the condition is one that can hold little attraction for the modal realist. But the modal realist is not reduced to blank insistence upon realism in the absence of a counterexample for a second strategy is available for the undermining of (ESS).

The attempt to apply the condition (ESS) to worlds is of quite distinct significance from any attempt to apply the condition to places, times, numbers or sets. For possible worlds are - while places, times, numbers and sets are not - purported to comprise the *analysans* of the modal notions of essential property and accidental property. It is open to the genuine modal realist to argue that the formulation of any claim according to which a possible world has a property *with this or that modality* involves an illicit presupposition. Such claims will be viewed as illicit attempts to reinstate non-objectual modal idioms *behind* the possible worlds and thereby to beg the question against the central modal realist tenet that possible worlds are part of the analysans of modal distinctions and not vice versa. The modal realist cannot accept that (ESS) is true because this would be to endorse the propriety of speaking modally of worlds. Equally, there is a wrong way for the consistent modal realist to go about denying the susceptibility of worlds to the non-trivial partitioning of their properties into the essential and the accidental.

To the modal realist the idea of *endorsing a trivial partition* of a world's properties into the essential and the accidental is no more acceptable than endorsing a non-trivial partition. Even though there is a sense in which the modal realist will agree that, as McGinn puts it,...

"...what transpires in a world is essential to its identity; the identity of a world is fixed by its content." 14

The genuine modal realist cannot entertain what might seem to be otherwise perfectly natural and equivalent propositions i.e. (5) & (6):

(5) *Each world has all of its properties essentially.*

(6) *If some world w has some property P, then it is necessary that w has P.*

To gain entitlement to these propositions the modal realist would have to opt for one of two unpalatable alternatives. The first of these would be to accept the irreducibility of the non-objectual modal items ("essentially", "it is necessary
that.....") and this would be to abandon the claim that possible worlds can base an analysis of such modal idioms.\textsuperscript{15} The second would be to provide a further realm of modal ontology (possible universes, possible super-worlds) in order to fund the analysis of the modalities of worlds. Apart from the fact that this route threatens ramified ontological commitment as we regress to the modalities of these newly postulated entities, it conflicts with the modal realist's avowal that possible worlds and their contents constitute literally and unrestrictedly \textit{all} that there is.\textsuperscript{16}

The condition \textbf{(ESS)} is unacceptable since its truth requires that we can speak meaningfully of modalities of possible worlds and this, the modal realist will argue, we cannot do without begging the question against the analytical aspirations of modal realism. An appropriate question then is whether these analytical goals are independently tenable. However, it appears that the allegation of illicit pre-supposition does give the modal realist a \textit{prima facie} means of challenging the applicability of the condition \textbf{(ESS)} to the case of possible worlds.

The upshot then is that the genuine modal realist ought not to invest any real hope in the prospect of undermining \textbf{(ESS)} by producing an embarrassing instance which can be deployed as a counterexample but that there is some mileage in alleging that the imposition of \textbf{(ESS)} constitutes something tantamount to begging the question against the possible worlds as the analysans of the other modal idioms. On balance caution appears advisable here, especially given the absence of any defence or justification of the status of \textbf{(ESS)} or its universal applicability. The modal realist cannot reasonably be held to have been defeated decisively at the hands of a \textit{clearly acceptable} criterion of individuality and given what is at stake it is appropriate to judge that the \textbf{(ESS)} based case against modal realism is not proven.\textsuperscript{17} However, the indecision in the verdict arising from the essentialist condition is mitigated by considerations arising from the extra-linguistic condition.

\textbf{(4.30) \quad THE EXTRA-LINGUISTIC CONDITION}

The extra-linguistic condition on individuality is susceptible to straightforward formulation:
Entities of a purported kind are genuine individuals only if they admit of proper identification short of exhaustive characterization.

The obvious course for the modal realist, in the first instance at least, is to attempt to show that genuine possible worlds are pronounced genuine individuals by the standard of (EXL). If the modal realist seeks a source of motivation for pursuing this direction of theorizing, it may be supplied in the following form.

Non-actual possible worlds, it is held, are on a metaphysical par with the possible world that we inhabit. It follows that if the actual world is an individual by the lights of the condition (EXL) then we should expect that non-actual possible worlds should also emerge as individuals relative to (EXL).

Now there is no obvious reason for denying the individuality of the actual world and no reason at all for denying its extra-linguistic status. From the point of view of the genuine modal realist the actual world is to be regarded as an individual and moreover an element among a totality of worlds. From the point of view of the anti-realist, it is difficult to see what might turn on the question of whether the actual world is an individual since, it will be held, there is no call to deal with questions of its identity or difference with other things of its kind. Given this intuitive individuality of the actual world, its emergence as an individual by the standards of (EXL) stands as something of a test of the plausibility of that condition. So, the crucial question now is: does the actual world admit to identification short of exhaustive characterization?

The answer is that it seems that it does. The main reason for holding that it does is that there appears to be no difficulty associated with indexical or token-reflexive reference to the (actual) world.18 Lewis himself has argued that the term "actual" functions as a modal indexical whose reference is contextually determined in a way that is analogous to the contextual determination of the referent of a spatial indexical ("here") or a temporal indexical ("now") in a given token utterance.19 Similarly, it might be held that the actual world is identifiable by way of the demonstrative noun phrase "this world " or by the token-reflexive definite description "the world which we inhabit ". Clearly, we credit ourselves with a facility to identify the world on the basis of the most direct of our referential resources, exploiting to the full the contextual features of reference.
determination with which we imbue both implicitly and explicitly token-reflexive semantic items and functors ("this", "we"). Furthermore, although it hardly needs emphasizing, there is no question of these modes of identification amounting to anything but the barest of characterizations of the actual world far less exhaustive characterizations of the actual world. To put matters another way we can have thoughts about the actual world qua individual, if at all, because we are acquainted with it.

(4.31) THERE IS NO QUESTION OF CAUSALLY DEPENDENT INDEXICAL IDENTIFICATION OF NON-ACTUAL POSSIBLE WORLDS.

The crucial point is that the very feature of our language which sustains our (perhaps tentative) conception of ourselves as being able to identify the actual world in the absence of an exhaustive characterization - i.e. the contextual determination of reference for indexical terms - threatens to ensure that this procedure of identification is not generalizable to other, non-actual possible worlds.

The difficulty arises because of the crucial role that causal factors have in the determination of context. If causal factors (partially) determine context, and context (partially) determines reference for token occurrences of indexical items of the language, then it will be the case that there is at least a risk of a failure of determinate reference in the use of indexical items in the absence of appropriate causal factors. For paradigmatically concrete objects, there is a strong case for holding that causal factors are crucial in determining whether a speaker's indexical thought or saying is about one such object rather than another. In the case of the actual world, our use of indexical terms such as this world or even the actual world can be regarded as identifying a unique individual precisely because the matter of which individual is identified seems to be settled entirely by our causal embedding and the indexical character of the terms "this" and "actual". In the case of non-actual (relative to us) worlds there is no question of the content of such hopeful indexical characterizations as that world being settled by appeal to causal considerations, for the fact is that non-actual possible worlds stand in no causal relations to us. Hence, it would appear that there is no possibility of identifying a non-actual world by way of the use of an implicitly or explicitly indexical mode of identification.
DESCRIPTIVE IDENTIFICATION OF POSSIBLE WORLDS IS ALSO UNTENABLE.

The failure of causally-dependent determination of which possible world one is speaking or thinking still leaves open the possibility of identifying possible worlds in some other way. McGinn argues that the only way in which this identification can be effected is such that it entails collapse into exhaustive characterization and, thereby, failure to satisfy the necessary condition of individuality. He writes:

"...it seems clear that a world has not been uniquely specified until all of its properties have been listed; it is not determinate of which world we are speaking until its whole content has been specified."\(^{20}\)

Thus a world could only be identified by a description which represents a kind of brute enumeration of its properties: a description of the form (12)

\[
(12) \quad (w)(w=W_1 \iff (P_1w \& P_2w \& - P_3w \& \ldots \ldots)).
\]

However, even though recourse to this kind of procedure may be the only option left on the table, there is no good reason to assume, as McGinn does, that an appeal to a procedure of this kind is legitimate or successful in identifying possible worlds.

Worries concerning the legitimacy of the appeal to a listing of all of a world's properties can hardly fail to raise suspicions of intelligibility pertaining both to the apparent vagueness of the specification and to the cardinality of the (purported) totality. Moreover, for worlds of the size and complexity of the actual world it is thoroughly implausible to suppose that on the basis of any intelligible extension of our capacities, such a world might be susceptible to exhaustive, never mind unique, descriptive specification. No intelligible procedure could even put us into a position of having to hand a world description whose uniqueness or otherwise was left to trouble us. But it is important to emphasize that there is more to the question of identification than the problems that arise from large worlds.

Let worlds be as small as you like and there remains the matter of non-identical but indiscernible worlds. If one permits, as Lewis does as a consequence of the principle of recombination,\(^{21}\) that there are possible worlds which contain only a single sheet of paper such as this page (and no doubt the space-time it
occupies) we have no way of specifying any such world uniquely in the face of indiscernible others. The obvious way of dealing with this difficulty would be to wield Occam's razor and to deny that there are indiscernible (but non-identical) worlds but Lewis refuses to do so and for good reason.

McGinn's point was that the satisfaction of (EXL) is part of what it is for a class of individuals to be distinct from the linguistic structures which characterize them. It is perfectly in keeping with Lewis's views on ontological commitment and theoretical utility that he should take the view that the cheaper option of linguistic ersatzism would win out over genuine realism were possible worlds subject to identification by exhaustive description and therefore, perhaps, susceptible to elimination in favour of linguistic representations. Lewis, therefore sees the need to distinguish possible worlds from their linguistic ersatz shadows and for this reason enters the explicit claims:

"...(2) We cannot have two indiscernible descriptions; whereas maybe there are indiscernible worlds, and in any case there are indiscernible parts of worlds. (3) What can be described is limited to what we have words for; whereas worlds can out run our means of describing them."23

Lewis's case for maintaining his own genuine modal realism in the face of competition from linguistic ersatzism depends clearly upon maintaining that possible worlds transcend descriptive representation. Accordingly, it is clear that McGinn's claim that possible worlds are susceptible to descriptive identification is, by Lewis's lights and my own, wrong.

(4.33) A PRIMA FACIE CASE AGAINST THE POSSIBILITY OF PROPER NAMES FOR POSSIBLE WORLDS

Before proceeding to evaluate the results of (4.31) & (4.32), there is a further mode of linguistic representation of individuals which must be considered in connection with the matter of the identification of possible worlds. Evidence for the possibility of non causally dependent, non-descriptive representation of individuals is afforded by our mathematical practice and, in particular, the phenomenon of the use of proper names for numbers. Hence, we may have a precedent for our crediting ourselves with the ability to identify unique referents of non-indexical, non-descriptive singular terms (names) where these referents
are abstract (or at least causally isolated from us) objects.

The problem is to try to understand how representation of this character is possible while eschewing reduction of the individuals in question, i.e. to make sense of such representation other than at a cost of forcing the represented entities into the (our) causal nexus. If a satisfactory response to this question were forthcoming, it may be ventured, this response may provide a basis from which we might develop a conception of an equivalent mode of identification for possible worlds.

This is an ambitious strategy which cannot be dismissed lightly, but there are good if rather inchoate reasons that can be brought to bear in order to indicate what it is about the case of numbers that permits their representation by way of proper names and which is absent in the case of possible worlds.

The means whereby proper names refer to individuals can only be understood in terms of other, intuitively more fundamental, modes of linguistic representation. Hence, the two great competing theoretical pictures of proper names as covert descriptions and covert indexicals. The compelling Kripkean account of the determination of reference for proper names exploits to the full the role of indexical, causally dependent phenomena in this process, and it is for the most part as convincing as a positive account as it is as an assault on the descriptive theory. However there is an obvious limit to the causal-indexical conception of the functioning of proper names and that is the (apparent) functioning of proper names of abstract objects. Thus while it is the case that the descriptive "associations" of proper names are marginalized in the determination of the referents of concrete objects, it seems inevitable that descriptive content cannot but be assigned a central role in a theory of the determination of reference for proper names of abstract objects since, magical bare semantic connections aside, there is no presently intelligible alternative mode of representation once the causal-indexical mode has been discounted.

There is however, no question of a simple correlation of proper names for numbers say with definite descriptions. A more subtle conception is required and this begins with the observation that the determination of reference for proper names of abstract objects depends upon those names being used in a linguistic medium which includes other modes of representation of the objects in question. In particular, the presence in the language of informative identity
statements involving names of numbers is a crucial feature of the sense (i.e. the
determination of reference) of such names.26 I do not propose to attempt to
elaborate upon this claim but in a sense no elaboration is required in order to
make the following point.
It would be difficult enough to see how there could be informative identity
statements concerning worlds were the modes of representation of possible
worlds limited to complex descriptive singular terms. This is the difficulty that
McGinn associates with the lack of variety of modes of representation of
possible worlds27 but he underestimates significantly the degree of poverty of
representational resources. I am urging a different point concerning the "lack of
variety" of representational resources for worlds namely - given that there are
neither indexical nor descriptive modes of representation of possible worlds to
enable their identification, there can be no question of their being identifiable by
way of proper names either. This is the crucial difference between possible
worlds and natural numbers with respect to the possibility of their identification
by way of proper names.28

(4.34) THE IDENTIFICATION-TRANSCENDENCE OF POSSIBLE WORLDS IS
A DECISIVE CONSIDERATION IN FAVOUR OF ANTI-REALISM

Possible worlds, then, are not susceptible to identification by explicitly indexical
means or by description and this recalcitrance is matched by, and perhaps
entails, the insusceptibility of possible worlds to identification via the use of
proper names. Thus, particular possible worlds cannot be identified at all.
Hence, possible worlds fail to satisfy (EXL):

(EXL) Entities of a purported kind are genuine individuals only if they admit of proper identification short of exhaustive characterization.

Moreover, the failure is more dramatic than McGinn would have us believe
since possible worlds do not admit of proper identification tout court. That is to
say, possible worlds fail to satisfy a (purportedly) necessary condition of
individuality which requires the identifiability of individuals:

(ID) Entities of a purported kind are genuine individuals only if they admit of proper identification.

The only course of defence that remains to the genuine modal realist when
presented with the failure of possible worlds to satisfy (ID) is to contest the status of the condition as a genuine (partial) determinant of the class of individuals. This, I take it, would be for the genuine modal realist to show us why we need *not* observe the desideratum of *no entity without identity*, and as such the genuine modal realist is placed in a desperate and unenviable position. This is not to say that the condition (ID) is unassailable but to say that the prospects of assailing it are bleak.

There is one direction of response which can be anticipated and whose irrelevance should be emphasized. It is no doubt true that there are more kinds of things in the world than are dreamt of in our physics and metaphysics and, therefore, true that there are kinds of particulars which exist and for which, since we do not recognize their existence, we are in no position to supply identity conditions. In this sense there are, no doubt entities which we are in no position to identify. But this is no more than to give vent to an appropriately and modestly realistic attitude to the question of *what there is*. The point is that when we are faced specific case by specific case with the question of whether we ought to judge that there are individuals of such and such a kind in the world the requirement that they be properly identifiable is essential to the very idea that there are such things of that kind. It is essential to the notion of an individual that there should be a clear conceptual basis upon which we can anchor judgements of the sameness and difference of individuals and that requires that we should be in possession of criteria of identity. Unlike those individuals which *do* exert strong claims to admission into our ontology such as the concrete individuals which are located in the spatio-temporal nexus that we occupy, and the abstract objects of mathematics, possible worlds can be associated with no proper criteria of identity. Hence, my case is rested on the claim that Lewis's general Quinean argument\(^{29}\) for postulating an ontology of possible worlds is undermined by equally Quinean standards.

(4.4) **SUMMARY**

This concludes the case against Lewis's modal realism. The conclusion - based on internal epistemological and on metaphysical grounds - is that there are no possible worlds. The second section of the thesis will be devoted to a critique of a second grade of modal realism, viz McGinn's conception of non-objectual
modal realism. However, before turning to this second conception of modal realism there is one important issue which remains to be addressed. In adopting the stance of anti-realism about worlds we are now faced with the challenge that is implicit in Lewis's observation that even those who scoff at possible worlds cannot resist the use of possible world talk. This is the challenge to the anti-realist about possible worlds to give a coherent account of the meaning of possible world statements while remaining an anti-realist. The challenge is taken up in the final chapter of this first section.
(5.00) INTRODUCTION: WRIGHT'S CONDITIONS & OBJECTUAL ANTI-REALISM.

In this chapter I will review a number of anti-realist conceptions of the meaning of possible world statements and I will defend my own account of world-talk as metaphor. I will begin by introducing a set of conditions that have been proposed as individually necessary and jointly sufficient for the existence of a kind of object given a class of statements that involve *prima facie* reference to and quantification over objects of that kind. These conditions are deployed here on the basis that they generate a taxonomy of ways of objectual anti-realism corresponding to the denial of one or more of the necessary conditions.

A proposal due to Wright yields three "Fregean" conditions that are individually necessary and jointly sufficient for the existence of a class of objects given a class of *prima facie* object-invoking statements.¹

(i) The statements are apt to record or misrecord features of reality.

(ii) The grammar of the statements is such that if any statement is to be true there must exist objects of the kind in question.

(iii) Some of the statements are, by ordinary criteria, true.

Let us call these the conditions of *recording, grammar, and truth* respectively.

Before proceeding with the main business of the chapter some clarifications and qualifications are required concerning the condition of truth (5.01) and the condition of recording (5.02).

(5.01) THE CONDITION OF TRUTH.

The range of statements to which the conditions are applied will have to be restricted so as to exclude the trivial satisfaction of the condition of truth. Trivial satisfaction of the condition of truth is threatened from three sources only the last of which pertains specifically to the case of possible world statements. The first of these is the crop of negative existential statements that will (naturally be held to) be true if there are no objects of the relevant kind. The second is the crop of existential statements whose truth is guaranteed, regardless of the
values of bound variables, by first-order logic i.e. logical truths. Accordingly the conditions should be understood as applying only to sentences involving (prima facie) reference to or quantification over the purported objects and which contain no logical operators other than the existential quantifier itself. There is a further threat of triviality that arises in the specific case of possible world sentences on a trivial basis viz. that some statements of the type "(∃w)(Pw)" will be made true by the actual world and which any anti-realist is bound to accept to be true. It seems quite reasonable to exempt from the scope of application of the condition those statements that are made true in this way in order to preserve the connection between anti-realism about worlds and the falsehood of statements that purport to quantify over them. The obvious way to achieve the desired effect is to read the conditions as applying to statements in relation not to possible worlds, thereby risking inclusion of the actual world, but to non-actual possible worlds. I propose to proceed on the basis of this stipulation.

(5.02) THE CONDITION OF RECORDING.

It has proved necessary to depart from Wright's formulation of these conditions in one crucial respect. Wright introduces the first condition as the condition that the statements in question should articulate objective judgements where he understands the notion of the objectivity of judgement as......

"......the kind of objectivity statements have when they are apt to record or misrecord features of the real world, features which would be appreciable to any creature possessed of appropriate cognitive powers, whatever its emotional capacities or affective dispositions."2

The difficulty is that the condition of objectivity of judgement so understood conflates two theses that must be distinguished in the context of the large scale project of discriminating kinds of modal realism. The secondary realist wants to view standard non-objectual modal statements as recording features of reality but, definitively, does not want to say that what is recorded therein is appreciable by any creature irrespective of affective dispositions. Thus secondary realism is to be distinguished from any position, such as Blackburn's quasi-realism, which is based upon the claim that the role of modal statements is not to record features of the real world. I have taken the view that both the
short-term taxonomic purposes of this chapter and the objective of avoiding confusion at a later stage are both served by the supplanting of Wright's original condition of objective judgement by the more managable, albeit inchoate, recording condition. In any case, it would seem that the recording condition is not so far away from Wright's original intentions given that its repudiation is a feature of those philosophical theories that he cites as examples of the repudiation of objectivity of judgement. (Such theories as Hume's "non-cognitivism" about attributions of value and necessity, the sceptical solution offered by Kripke's Wittgenstein to the sceptical paradox concerning meaning and instrumentalism concerning statements involving apparent reference to scientific unobservables.3)

I have also taken the view that the phrase "features of reality" is to be preferred to the original "features of the real world" given that the latter may prove tendentious in the context of a discussion of Lewis's modal realism.

(5.1) GENUINE REALISM LOCATED. ERSATZ REALISM DISCOUNTED.

There is no doubt that the genuine modal realist holds that world-statements function to (mis-)record (henceforth simply record) reality. Equally, there is no scope for serious doubt concerning the acceptability of the other two parts of the Fregean condition to the genuine modal realist in respect of possible world talk. Consequently, and happily, the genuine modal realist is an objectual realist by (Wright's) Fregean lights. It is useful to assess how ersatz realism fares in these terms.

It is not possible to provide a straightforward and unqualified answer to the question of whether the ersatz realist will assent to the proposition that the grammar of world statements is such that if any statement is to be true there must exist objects of the kind in question. The dispute between the ersatz and the genuine modal realist turns specifically on the precise nature of the (supposed) objects and so the ersatzist response to the proposition will depend upon exactly which kind of object is in question. If the objects in question are the genuine realist's sui generis worlds, then the ersatzist denies that the condition on grammar is satisfied, for by his lights it is another kind of object whose existence is relevant to whether sentences of the type "(∃w)Pw " are true. If his own ersatz worlds are at issue, then all conditions are acceptable and he
is (happily) an objectual realist by present standards. The only point that we need bear in mind is that from the perspective of the dispute within realism about possible worlds it is necessary to distinguish whether the conditions of recording, grammar and truth pertain to genuine or ersatz worlds.

Having noted this subtlety regarding ersatz realism I will proceed in what follows to ignore ersatz realism as an option. I will consider only genuine realism under the heading of objectual realism and although I will carry forward the assumption that the conditions are to be understood as pertaining to genuine possible worlds, I will not risk the confusion that would be risked in classifying ersatz realism as a form of anti-realism relative to genuine objectual realism. Henceforth by anti-realism I intend only out and out anti-realism, i.e. the view that there are no non-actual possible worlds of any kind.

(5.2) THREE WAYS OF ANTI-REALISM.

The anti-realist about possible worlds must deny at least one of the conditions of recording, grammar or truth and with reference to these conditions, three distinctive points of departure for anti-realist strategies can be discerned. The strategy of denying the condition of recording (Blackburn's) will be rejected as will the strategy of denying the condition of grammar (Forbes'). The strategy of denying the condition of truth will be endorsed and within this strategic framework I will delineate two theories of possible world discourse arguing (tentatively) for the relative merits of a metaphor theory over an error theory.

(5.3) DENYING THE RECORDING CONDITION - THE STRATEGY REJECTED.

Blackburn is largely indifferent to whether we choose to formulate our modal commitments in terms of the objectual idiom of possible world talk or not. However, he is sufficiently impressed with the worth of the worldly idioms to lay down this marker in his characterization of a successful theory of modality:

"The eventual theory...... would be one which maintains the benefits of possible world imagery, but disallows the metaphysical extravagance."

In terms of our discussion of objectual realism Blackburn is an anti-realist in virtue of rejection of the recording condition i.e Blackburn is denying that worldly statements are apt to record features of reality. The denial of the condition is
borne from the view that statements involving possible world talk do not describe anything but function, rather, as expressive projections of imaginative limitations. Given this conception of the role of the sayings there is no danger of metaphysical extravagance in the form of ontological commitment to possible worlds.

I will not deal with this way of anti-realism here, for the attitude that Blackburn takes to possible world talk is the attitude that he takes to all modal discourse and his non-descriptivist attitude to possible world talk owes nothing specific to considerations pertaining to possible worlds as opposed to modality in general. I will deal with this generalized non-descriptivism about modality in Ch.12 rather than attempt to take up the relevant issues in the context of the discussion of objectual modal realism.

However, it seems appropriate to remark that the success of non-descriptivism about non-objectual modal statements would not have clear implications for possible world talk. A univocal conception of the role of objectual and non-objectual modal idioms may appeal to objectual anti-realists on the grounds that it bases an inference from (i) the non-recording role of non-objectual modal sayings to (ii) the non-recording role of objectual modal sayings (by univocity) and so to (iii) the elimination of ontological commitment from world talk (by the denial of the condition of recording). But there is no obvious reason why objectual modal idioms must be treated as featuring in sayings of the same kind (vis a vis aptitude to record features of reality) as their non-objectual counterparts. Hence, the success of a non-descriptive account of non-objectual modal statements would not establish automatically that the proper course of opposition to objectual realism was to deny the condition of recording for objectual modal statements. That we should have a univocal account of the meaning of possible world statements and their non-objectual counterparts is an option that proves very popular but no argument is forthcoming for the necessity or even the desirability of univocity per se.

(5.40) DENYING THE GRAMMAR CONDITION - THE STRATEGY REJECTED

Forbes' preferred version of anti-realism proceeds by way of what is in effect a denial of the condition of grammar. He denies that the truth of $L_W$ sentences requires that there are such things as possible worlds, arguing that these
sentences have their "real meaning" imputed to them by their Lm translations. It follows from the thesis of synonymy and the auxiliary premise that some sentences of Lm are true that Forbes will hold that some sentences of Lw are true and, therefore that the condition of truth in relation to Lw is satisfied. He will also accept the condition of recording re. Lw statements as a consequence of synonymy and his apparent acceptance of the condition re. Lm statements. So, Forbes' anti-realism is based on acceptance of the conditions of recording and truth and rejection of the condition of grammar. My view is that this strategy is untenable.

Forbes' anti-realist strategy is prompted by the thought that the real meaning claim that is involved in the Russellian argument for realism can be turned on its head:

"Instead of saying that the meaning of a modal sentence is given by its Lw rendering, we can say that the meaning of an Lw sentence is given by its rendering in (reverse translation into) Lm." This manoeuvre is prompted by the commitment that the anti-realist......

".....has to say that objectual quantifiers when they range over possible worlds do not have their literal meaning, the meaning they have in ordinary first-order languages; in turn then, the sentences of possible world language do not mean what they appear literally to mean."

The realist was telling us that a sentence such as (1):

(1) *It is possible that Nixon is honest.*

really does contain a quantifier over possible worlds, now Forbes' anti-realist is telling us that a sentence such as (2):

(2) *There is a possible world at which Nixon is honest.*

really does not contain a quantifier over possible worlds. What grounds might there be for the startling claim that (2) and its ilk contain no quantifier over worlds?

I have already argued that such departures from natural syntax for the purposes of representing logical form were justified only insofar as we were confronted with semantically valid inferences which could not be displayed as syntactically valid. In the case with which we are now confronted it is obvious that no such revision of natural syntax is required for the validity of inferences containing
possible world statements can be displayed straightforwardly in the natural first-order syntax of Lw. What other grounds might there be for the claim that sentences exhibiting prima facie quantifications over possible worlds do not mean what they appear literally to mean?

(5.41) **FORBES' CASE FOR Lm/Lw SYNONYMITY.**

Forbes views the claim as a consequence of the thesis of the synonymy of Lm sentences with their Lw counterparts in conjunction with the characteristically realist claim that the sentences of Lw have priority over - i.e. impute meaning to - those of Lm. It is the purported anti-realist commitment to synonymy that supports the weight of the revisionary stance over the meaning of Lw sentences and it is this commitment that must be scrutinized.

The realist had an interest in accepting synonymy as part of the package of explaining the validity of modal operator inferences via possible world semantics. But why should the anti-realist accept synonymy? Here is Forbes' response:

"The challenge for the anti-realist is to give an interpretation of the appealing features of possible worlds semantics which shows how these features can arise even though there are no such things as worlds; he cannot just ignore the semantics given the intuitions that we have about its naturalness, for this is a phenomenon which surely requires explanation. Furthermore his interpretation must posit some semantic relationship between sentences of modal language..Lm , and their renderings in possible worlds language ..Lw ; for without such a relationship, it must seem positively miraculous that the semantics agrees with our intuitions about validity and invalidity. And we saw earlier that it is hard to think of any candidate for this relationship other than synonymy."  

This case for synonymy is based upon the claim that two features of possible world semantics merit explanation: (a) the delivery of agreement with intuitions about modal validity; (b) the naturalness of the semantics. It will be argued that it is doubtful whether possible world semantics can be viewed as having these features simultaneously and that if it can be so viewed, the explanatory burden can be accepted and discharged without appeal to synonymy.
FORBES' CASE FOR SYNONYMY REJECTED: (a) THE TENSION BETWEEN AGREEMENT ON VALIDITY AND NATURALNESS.

The claim of agreement on intuitions about modal validity and the claim of naturalness stand in a relation of extreme tension. The claim that possible world semantics delivers agreement with intuitive judgements of validity must be understood as being limited to central cases for it would appear that these are the only cases that we have intuitions about.\(^{15}\) This being the case a possible world semantic theory insofar as it conforms to \textit{and does not outstrip} our intuitions about modal validity will be an interpretation that validates only the central and uncontroversial core of the set of \textit{arguably} valid modal inferences. In that case the appropriate semantics will be one that validates only the theorems of a weak modal logic such as \(T\) and therefore a semantics that depends upon the functioning of restrictions upon the notorious accessibility relation. It does not matter whether it is in fact \(T\) or another weak logic that is appropriate here. The point is that the only modal logic for which we can characterize the validity of the theorems without giving a substantive role to the accessibility relation is \(S5\) and the strength of this logic far outstrips our intuitions about validity and invalidity. So, \textit{either} we get the right range of agreement with intuitions about validity and are landed with the extremely \textit{unnatural} accessibility relation to explain \textit{or}, we endorse the logic that alleviates the explanatory burden that the accessibility relation brings in its wake and thereby court an objectionable revisionism by endorsing as valid a range of modal inferences which far outstrips the range whose validity is endorsed in our practices and can lay claim to sound intuitive appeal.

(5.421) FORBES' CASE FOR SYNONYMY REJECTED: (b) ALTERNATIVE EXPLANATIONS OF THE APPEALING FEATURES OF POSSIBLE WORLD SEMANTICS.

Even if the tension discerned in the last section is acknowledged it will still be open to a theorist of Forbes' persuasion to hit upon one of these features as \textit{the} appealing feature of the semantics and argue that synonymy explains \textit{it}. It is important, therefore, to establish that these phenomena can be explained without appeal to synonymy.
The agreement of possible world semantics with intuitions about modal validity.

The question that was posed in the context of the semantic argument for realism\textsuperscript{16} was whether possible world semantics could lay claim to any more than that it pronounced valid the right inferences. This question was important because, it was generally agreed, from the point of view of the requirement of delivering the right results with respect to validity we could take the domain of quantification of the interpreting language $L_w$ to be anything we pleased. If possible semantics was to be the semantics of modal operator languages this would be because some feature(s) of possible world semantics selected it from among the range of quantificational interpretations that could do the job with respect to validity. (The suggested features were the naturalness and explanatory potential of possible world semantics.) The crucial point that is to be taken from this reminder is that the power of possible world semantics to generate agreement with our intuitions about modal validity does not depend upon our construing the values of $L_w$ variables to be possible worlds. Since agreement on modal validity can be secured no matter what the values of $L_w$ variables are taken to be, agreement must be explicable, if at all, without reference to possible worlds. What explains the delivery of agreement is the first-order quantificational structure of possible world semantics. There are use-driven structural similarities between the existential and universal quantifiers on one hand and the possibility and necessity operators on the other and these similarities have been noted and exploited ingeniously for the purposes of the semantics of modal logic.

The intuitive semantic-structural similarities between the dual modal operators and dual first-order quantifiers can be characterized informally in terms of abstractions from patterns of natural deduction relations:

1. Common sequent structure: $O_1(A) = \rightarrow \neg O_2\neg(A), O_1(A) = \rightarrow \neg O_2\neg(A)$
   - (M1) $\square A = \rightarrow \neg A$
   - (Q1) $(\exists x)A = \rightarrow (\neg (\exists x)\neg A)$

2. Common sequent structure: $O_1(A) \models P, P ! = O_2(A)$
   - (M2) $\square A \models A$
   - (Q2) $(x)(Ax) \models Am$

The third important pattern concerns the invalidity of parallel inferences.
This, I am inclined to say, is the bottom line and there is no need to go any further in seeking explanation of the delivery of agreement. As such the explanation of agreement falls well short of requiring the hypothesis of synonymy.

(b) *The naturalness of the semantics.*

Possible world semantic interpretations of modal operators, qua possible world interpretations, have an intuitive appeal that is not shared by other equally validity-effective quantificational interpretations. How is this to be explained other than via synonymy?

There are two eminent features of possible world talk that contribute to the apparent naturalness of possible world semantics. The first is that possible world talk is recognizably modal and the second is that there exists a use-determined association of possible talk idioms and modal operators which is independent from (and pre-dates) the deployment of possible world talk in semantic theory for the purposes of interpreting modal operator languages.

Now if these features are what the naturalness of possible world semantics consists in, and this is the case, there is simply no compulsion to accept synonymy in order to explain naturalness. The alternative that I will propose in due course is that these features of the use of possible world talk can be accommodated in a conception of possible world statements as metaphors; their use does not state but conveys what is stated in the standard use of their modal operator counterparts. Accordingly, it is necessary to posit only a broadly semantic relationship between possible world statements and their modal operator counterparts in order to sustain the explanation of naturalness.

(5.44) **DIRECT OBJECTIONS AGAINST THE SYNONYMY THESIS.**

So far, it has been argued that there is no need to posit $L_m/L_w$ synonymy and now it will be argued that there are two major disadvantages of the thesis of synonymy which suggest that we cannot accept synonymy. The first is that the thesis (in conjunction with modal operator priority) entails commitment to the
view that possible world statements do not mean what they appear literally to mean. The second is that there is, to say the least, a major doubt as to whether the thesis of synonymy works on its own terms. I have already dealt with the real meaning issue and so it remains only to expand upon this second allegation.

There are sentences that can be formulated in the notation of Lw which are prima facie statements of identity, difference and number of worlds and which have no natural interpretation in Lm - e.g. "(w)(w=w)" - and no matter how many ad hoc restrictions on well-formedness in Lw that we manage to contrive it remains the case that.....

"...in formulating possible worlds model theory, especially if an accessibility relation is involved, one makes stipulations which if formalized in first-order language, would be Lw sentences with no Lm interpretation."

Forbes acknowledges that this constitutes a serious problem for his synonymy-based anti-realism and sees the clear need to attempt to meet this difficulty. He responds to this problem by proposing that we should secure a match of expressive power between Lm and Lw by leaving the problematic sentences of Lw uninterpreted. Since these sentences are left uninterpreted they do not express anything and a fortiori they do not express anything that cannot be expressed in Lm. The justification that is proposed for making use of these uninterpreted sentences ("stipulations") in the model theory is compared with Hilbert's justification of the deployment of certain sentences in mathematics i.e. the stipulations are justified since they enable us to establish facts of interest about the interpreted sentences. In the case of uninterpreted Lw statements...

"...the justification for the...making of such stipulations, is that a semantical theory conforming to them is in agreement, over questions of validity with the fundamental account of validity for Lm."

There are two major obstacles to the acceptability of this response. The first is that this "Hilbertian" style of the justification is in general unconvincing. We cannot give ourselves permission to abjure from the interpretation of sentences of a theory and the ontological commitment that interpretation entails when we find the sentences in practice indispensible. There is an over-riding obligation either to accept the ontology that comes in the wake of interpretation or to show
that the desirable results can be achieved without the deployment of the problematic sentences in inferences. The second is that there is a strong whiff of objectionable circularity in the case to which Forbes wishes to apply this style of justification. On the one hand the thesis of synonymy is being deployed for the purposes of explaining *inter alia* the fact that possible world semantics delivers the right results on modal validity. On the other hand the refusal to interpret the problematic sentences of $L_W$ which amounts to a stipulation of synonymy is being justified on the basis that this secures the right results on validity. In light of these points I claim that the positive case in favour of synonymy is far from compelling.

(5.50) **DENYING THE CONDITION OF TRUTH - THE STRATEGY ENDORSED.**

A third strategy for anti-realism, and the strategy that will be endorsed, proceeds by acknowledging that possible world talk is what it is and not another thing. Sentences involving prima facie quantification over possible worlds *do* contain quantifiers over worlds and these sentences mean what they appear literally to mean. Furthermore - and contra the synonymy thesis - the possible world sentences that we have been considering are always false while many of their modal operator "associates" are true. The focus of this anti-realism is the denial of the condition of truth with respect to possible world statements.

(5.51) **AN INTERPRETATION BASED ARGUMENT AGAINST THE REJECTION OF THE CONDITION OF TRUTH.**

I will introduce an argument which seeks to establish that neither Forbes' strategy nor this third strategy is adequate with respect to constraints on the interpretation of possible world talk. I do not intend to press the argument as an additional objection against Forbes although this is what I take it to be. My central point is that the argument fails to register with respect to the third strategy. I will develop two theories of anti-realism based upon the denial of the condition of truth and I will show that neither violates the desiderata of adequate interpretation.

Any conception of the meaning of possible world talk that incorporates acceptance of the conditions of grammar and recording alongside the denial of
the condition of truth stands as a target for an objection that focuses on the interpretative methodology which is implicit within it. Interpretation involves a trade off between charity and compositionality. Charity requires that the interpretation should maximize truth (ceteris paribus) in the utterances of the community under study and compositionality requires that the semantic properties assigned to (provisionally identified) syntactic items should characterize their semantic contribution to the totality of recursively specifiable sentences in which they feature. Forbes' anti-realism encounters no apparent difficulty with charity, for world sentences will be true just in case their operator renderings are true by our lights and we assume that this is so in a substantial number of cases. The cost of charity in this case is a heavy cost, for semantic content must be assigned non-uniformly to items of syntactic structure. The semantic contribution of the symbols that would generally be treated as quantifiers is not uniform since these function semantically on some occasions as quantifiers and then on other occasions, in select contexts, as sentential operators depending on the style of the "variable" that is involved. Forbes then has the task of explaining why we express our truly non-objectual modal claims in a way which must be regarded as thoroughly misleading given the interpretation of quantifier syntax in other contexts. Perhaps this criticism is no more than a re-orientation of the major objection against Forbes' anti-realism, articulating in terms of the theory of interpretation what it is that is unsatisfactory about the claim that possible world statements do not mean what they appear literally to mean.

In any case the point is not to seek out additional reasons for rejecting what has already been rejected. What is of major concern is that the third strategy of anti-realism appears to fare equally badly under the scrutiny of interpretative methodology. A theory which is based on the acceptance of the condition of grammar can claim to be able to offer a uniform and standard interpretation of the (prima facie) quantificational syntax across the language in worldly and non-worldly applications alike. The norm of compositionality is served thereby, but the price is that possible world statements receive an interpretation that renders them, by the theorist's own light, systematically false and this appears to be a radical violation of charitable constraints.

Were the foregoing assessment to prove correct, there would be a strong
temptation to take the view that neither Forbes’ anti-realism nor the alternative that discerns systematic falsehood is acceptable since neither could be the product of adequate interpretation. However, it will be argued that there are in fact two theories of anti-realism which are cast in the mould of this third strategy and which stand in their respective ways as perfectly intelligible outcomes of adequate interpretation.

There are two distinguishable styles of anti-realistic theory that conform to the pattern of denying the condition of truth while accepting the conditions of recording and grammar. The first is an error theory of possible world discourse and the second is a theory of possible world discourse as metaphor. I will argue that the metaphor theory is preferable but I will also indicate why the error theory has to be held in reserve as a fallback position. I will provide an exposition of these anti-realistic theories in turn along with responses to the allegations of interpretative inadequacy that have been levelled against them before going on to put a (tentative) case for opting for the metaphor theory over the error theory.

(5.52) ERROR THEORY ANTI-REALISM STATED.

The idea of a generally statable error-theory anti-realism which can be applied to the instance of possible worlds is inspired by Mackie’s discussion of the case of moral language. According to the error-theorist, we have succeeded in imbuing moral language with objectual realist pre-suppositions, for statements involving prima facie reference to moral values are attempts to record an objective moral reality and their grammar is such that the existence of objectual values is required for the truth of the statements. These are features of the meaning of the discourse and as such they are determined by our use of moral language. What is outwith our determination is the way the world is with respect to the existence or non-existence of objective and objectual values and, as philosophical reflection establishes, the world is such that it contains no such entities despite the fact that their existence is what the truth of many moral judgements have come, at our hands, to require.

Even if moral values do not constitute a particularly persuasive case of our having imbued our talk with objectual pre-supposition, the form of the account
emerges clearly enough. We have acceptance of the conditions of grammar and recording along with rejection of the condition of truth backed up by the claim that our objectual conceptualization of moral reality is fundamentally erroneous. All that remains is to transfer this format to possible world discourse and we have an error-theory anti-realism about worlds. On this theory, ontological commitment to the existence of possible worlds is an erroneous but grammatically entrenched feature of our conceptual scheme. Can such a conception meet the objection from the violation of the principle of charity?

(5.53) **THE ERROR THEORY DOES NOT VIOLATE CHARITABLE CONSTRAINTS ON INTERPRETATION.**

It is essential to clarify the degree and the distribution of falsehood that adequate interpretation may yield. It is now widely recognized that good interpretation does not proceed under the auspices of *unbridled* charity. In interpretation we maximize the rationality or, perhaps, the *humanity* of the subjects and neither conception of the interpreter's goal precludes widespread falsehood in any given locale. The key to good interpretation is to minimize inexplicable or incomprehensible error in subjects' beliefs and sayings and so it is open to the error-based anti-realist to attempt to argue the use of possible world talk into the category of comprehensible error.

There is a specialized local body of discourse which serves as a paradigm case of the application of a defence of an error-yielding interpretation based on the discerning of comprehensible error. The interpretation of "old" scientific theories exemplifies the kind of scenario in which we can make perfectly good sense of erroneous entity postulation on the part of the theorists and their assent to associated statements that we regard to be systematically false. We permit ourselves to interpret them as systematically failing to speak truly in these matters for we know that entity postulation is a risky business and we understand how entity-postulation can at any given time be a justifiable move by the lights of all the canons of rationality that we operate yet turn out to be erroneous. Herein, we have a striking example of the interpreter's right to find the subjects - perhaps one's predecessors - guilty of systematic and perfectly intelligible local error. The case of the error theorist about possible worlds will be simply that there is an analogous case to be made with respect to these
postulated entities. As such the case may well be held to turn upon the strength of the analogy, which many will hold to be untenable, between the postulation of entities in science and the postulation of possible worlds. I am not intent upon establishing the right of the error-theorist about worlds to draw upon the scientific case as an analogy since I take the view that the style of the response of the error-theorist about worlds is intelligible irrespective of the quality of the analogy with scientific entities. However, it is worth noting that Lewis is unlikely to have any qualms about the analogy for he avows explicitly a conception of his realism as entity-postulation that brings benefits to "total theory". Lewis, one suspects, will view the error-theorist as a bona fide adversary who finds common purpose with the realist in the understanding of what possible world-talk is and who diverges from the realist (only) on the question of whether the entity postulation is correct.

The style of response of the error-theorist to the objection from the principle of charity is clear. There is no violation of charity since the falsehood that is discerned in world talk is, although systematic, localized and perfectly comprehensible as ambitious but unsuccessful entity postulation. The error theory of possible world discourse strikes me as an intelligible position but my wish is to reserve it as a fallback option. Its attraction is diminished given that we can do better, for we can construct a style of anti-realism that registers the same responses to the conditions of recording, grammar and truth and which does not find the users of possible world statements in systematic error.

(5.540) **THE METAPHOR THEORY STATED.**

The second anti-realist option that is based on the strategy of denying the condition of truth is the metaphor theory of possible world talk.

There is no straightforward means of capturing what it is that metaphors, in general, do. In the specific instance of possible world metaphor we might say that it is of heuristic value in that it allows us to depict or convey without literally stating our modal commitments. World-talk is a good metaphorical medium since it exploits the relative centrality of quantificational language and spatial concepts in our cognitive lives. In this context I will not go beyond these gestures in an attempt to argue that world-talk is metaphorical. The objective of this section is to show how such an account of the role of world-talk - which I
take to be both plausible and appealing - can be accommodated as a way of
anti-realism within the criteria that arise from the semantic conditions that we
have been considering. That is to say that what is of concern here is what we
ought to say about metaphor with respect to the conditions of grammar,
recording and truth in order to reflect accurately the meaning of metaphors and
in order to articulate the way in which possible world talk is absolved of prima
facie ontological commitment.

(5.541) **DAVIDSON'S CONCEPTION OF METAPHOR.**
The broad options that can be discerned within the theory of the meaning of
metaphors are (i) that they have no literal semantic content (ii) that they have a
non-standard or special literal semantic content and (iii) that they have standard
literal semantic content. Following Davidson, I shall opt for the last of these
and I will build my account of the meaning of worldly metaphors on this
Davidsonian foundation.
The essence of Davidson's account is that metaphor is not to be characterized
in terms of a special, additional or encoded cognitive content - metaphors have
none of these. Rather the deployment of metaphor is discriminated as a kind of
use to which a statement, with its standard literal meaning, is put. Thus, tokens
of the same declarative sentence type can be deployed without variation of
literal content in the telling of a lie, the dropping of a hint, and the making of a
metaphor. The central point is really what metaphors are not, and the
sentences deployed in the making of metaphor are not vehicles of any
truth-relevant content other than that which they would normally be considered
to have. Hence metaphors mean what they appear literally to mean in the sense
required for the satisfaction of the condition of grammar. What then are the
implications of this position for the truth-values of metaphors?

(5.542) **POSSIBLE WORLD METAPHORS FAIL THE CONDITION OF
TRUTH.**
According to Davidson a sentence used metaphorically is usually false.
Moreover, he argues, it is, by and large, when a sentence is held to be false,
perhaps even patently false, that it is accepted as suitable for metaphorical
deployment. This view is rendered more plausible by an alteration of emphasis.
Given Davidson's account of the meaning of metaphors, some statements used metaphorically will turn out to be true, so to speak, accidentally. My metaphorical use of the sentence:

(3) **Davidson has been pulling his socks up lately.**

may turn out to articulate a (literal) truth, albeit a truth quite outwith the concern of myself and my audience. There can be no question of insisting that falsehood is an indispensable facet of metaphor but it is also necessary to revise the claim that success in metaphor depends, in general, upon the sentence's being taken to be false. What is crucial is that the audience should *disregard* the truth-value of the sentence and the deployment of patent falsehood assists in the reinforcement of such disregard since it reminds us that the sentence is not to be taken to be true. But that is not quite the same as saying that it is to be taken to be false. Thus there is no implication of literal falsehood - even *by and large* - contained in the notion of successful metaphor. The point is that if we treat possible world talk as (Davidsonian) metaphor we can see how possible world sentences can have a proper and distinctive use whose value does not depend upon their being statements of the truth. Once possible world discourse is viewed as serving an aim other than the stating of truth, the truth-values of possible world sentences are not of primary importance. However, once the question of the truth of statements of the type "(∃w)Pw" is raised, and given that the literal meaning of the sentences is what it appears to be, the proper course of anti-realism, I say, is to hold them literally false.

There is, however, a difficulty pertaining to the condition of truth which merits comment before a confident denial of the condition can be issued.

The condition of truth (iii):

(iii) **Some of the statements are, by ordinary criteria, true.**

depends squarely on the notion of *ordinary criteria* and we cannot be confident in our assessment of whether some world statements are true *by ordinary criteria* unless we can clarify what it is that the appeal to ordinary criteria might be intended to achieve here. In particular, there is a major problem with the notion of *ordinary criteria* for truth in the case of metaphor in that we do not know if *literality* is part and parcel of the intended criteria. Davidson writes of metaphors being false "in the ordinary sense" and it is clear that the basis upon which this claim is made is that metaphors are, in general, *literally* false.
and I would ground a judgement of the falsehood of e.g (4):

(4) There is a possible world in which Nixon loses.

in the same literalistic criteria. But it is possible to appeal to an alternative conception of ordinary criteria which will generate the consequence that metaphorical world statements are true by ordinary criteria. Truth by ordinary criteria might be held to require communal assent in combination with the practice of calling correct or acceptable statements of a given kind "true". In that case there will be a strong case for holding that claims such as (4) are true by ordinary criteria. It seems then that there is a difficulty over whether truth by ordinary criteria requires literalism or not but if the Fregean conditions are to maintain their relevance to objectual realism it seems that "ordinary criteria" must be read as involving a commitment to literal truth since only this interpretation renders the conditions plausible. If anyone feels compelled to insist that there are additional brands of truth implicated in our linguistic practices, there is little point in insisting otherwise. We should then be careful to distinguish which brand of truth is in play in any given context and be prepared to take a position on the truth, in that sense, of this or that worldly sentence according to best judgements of possibility. Then, it is a metaphorical truth that there is a possible world in which Nixon loses the election, and, for that matter, that McStay is a tower of strength. The limitation of this approach is that there is no obvious way of integrating special brands of truth in a standard semantic theory for the language as a whole. Insofar as it proves workable, we ought to exploit the clear theoretical advantages in deploying literal truth as truth tout court. The fact that literal truth-conditions and literal meaning can be assigned to words and sentences apart from particular contexts and styles of use is the basis of their claim to an explanatory role in the theory of meaning.30

In short there is good reason to take literal truth to be relevant to the Fregean criteria of ontological commitment and consequently for the anti-realist who accepts that the condition of grammar is satisfied to bring literalism to bear in concluding that possible world discourse fails the condition of truth. So, then, to the condition of recording.

//(OVER)
The condition of recording (i):

(i) The statements are apt to record or misrecord features of reality.

appears to pose a difficulty for the metaphor theorist, but this difficulty can be dispelled.

The metaphor theory shares with the error theory and with realism the commitment that possible world statements have the facility to record features of reality. The anti-realistic theories also incorporate the commitment that the statements systematically misrecord modal reality since modal reality is non-objectual. But there remains an obstacle to the metaphor theorist's acceptance on this basis of the condition of recording for the crucial consideration is whether possible world statements are apt to record features of reality.

It may seem that it is in the matter of the satisfaction of the condition of recording that the metaphor theorist and the error theorist should locate their disagreement with the metaphor theorist denying that the condition is satisfied by world talk. The notion of aptitude is normative and even though sentences when deployed metaphorically do, in virtue of their literal content, (mis)record features of reality, their deployment as metaphor does not render them apt in that mode of use, to that task. Crucially, the deployment of metaphor is not aimed at the recording of features of reality. The goal of metaphor is, no doubt to convey something of reality, but it seems of the essence of metaphor that in achieving this indirectly it contrasts with modes of use that aim at recording or misrecording (directly) features of reality.

Nonetheless, we should not succumb to this temptation to deny that world metaphors are apt to record reality, for the temptation arises from our paying attention to the (metaphorical) style of use with which these statements are characteristically associated while it is clear that the condition of recording, like the condition of truth, must be interpreted as a condition on content. For other purposes, when other interests are to the fore and when world statements are to be considered in the context of their characteristic style of use (qua speech acts) the metaphor theorist will, quite properly, deny the aptitude of possible world statements in their characteristic style of use to (mis)record reality.
However, the relevance to objectual realism of the condition of recording requires that the metaphor theorist must acknowledge that the condition pertains to the content of possible world statements and, given the Davidsonian conception, that the condition is satisfied. This concludes the exposition of the metaphor theory. We are now in a position to register on behalf of the metaphor theorist a rejoinder to the objection from the principle of charity.

(5.55) THE METAPHOR THEORY DOES NOT VIOLATE CHARITABLE CONSTRAINTS ON INTERPRETATION.

The metaphor theorist, in contrast with the error theorist, does not need to seek any explanation or rationalization of error, for in the making of metaphor the use of statements that systematically fail of truth is no error. It is permissible to find possible world statements always false, precisely because equa metaphors their use is not aimed at the statement of literal truth and therefore no error is involved when the statement of literal truth is not attained in their use. Truth is not, in the context of metaphorical use, the "primary dimension of assessment of sentences". If members of the community appear always to "miss the target", that should, in the absence of other explanation, influence the interpreter to contemplate that they are not aiming at the target. To put matters the other way about, if we find that an interpretation yields endemic falsehood, that in itself may be evidence that the community is using language in a sophisticated way; lying, fictionalizing, or perhaps indulging in metaphor. All of these language games share the feature that their success consists in an achievement other than the statement of truths and this is the source of the interpreter's liberty to find their literal content false. The account of the use of possible world talk as metaphor hereby shows that no threat to any plausible constraint on interpretation need be occasioned when possible world statements are rendered systematically false.

(5.6) THE (TENTATIVE) PREFERENCE OF METAPHOR THEORY OVER ERROR THEORY ANTI-REALISM.

The inevitable question is whether anti-realism about possible worlds ought to take the form of the error-theory or the metaphor-theory and my view is that the
latter is preferable. However, there are certain facts about the nature of language use that impinge forcefully in this context and which should serve to promote caution and a sensitivity to the presence of a substantial indeterminacy that attends this issue. The fact of the matter is that the community is divided on the question of whether possible world talk is metaphorical or not, for in practice some of us use it metaphorically and others—such as Lewis do not. Now we have not reached rock bottom here, for there are considerations to which we can appeal in order to develop a case in favour of one of these practices over the other, but matters are extremely complicated here. These complications stem from the complexity of the relationship between metaphor and literalistic styles of expression even in the literalistic heartland of science.

Quine holds that at the growing edge of science metaphor is often the only way in which we can "limn the new order" as our old ways of speaking let us down. Here is one of his examples:

"The molecular theory of gases emerged as an ingenious metaphor; likening a gas to a swarm of absurdly small bodies. So pat was the metaphor that it was declared literally true, thus becoming straightaway a dead metaphor; the fancied miniatures of bodies were declared real, and the term 'body' was extended to cover them."

We have here the short history of the role of metaphor in scientific innovation. The coining of the metaphor, then the change of meaning of a key term with the declaration of literal truth and the death of the metaphor. This shift to literalization is a change of use. Moreover it is a shift in use that is equivalent to a change in the style of use to which a statement is put—a shift of the aptitude (in the broader sense!) of a statement to record features of reality—and it is a shift in which the protagonists of theories play an active part. It will be appeal to Lewis to view as conforming to the Quinean history the ascendancy of possible world talk to the status of statements which are aimed at, and achieve, recordings of the modal features of reality. The error theorist will also welcome this account of how world talk evolves but will insist that we recognize that the process of literalization must sometimes yield falsehood (as it does in the case of possible worlds). Since entity postulation is not always successful
literalization can take root in classes of statements that turn out to be false. The metaphor theorist comes to praise worldly metaphor, not to bury it, and ultimately the error theorist and the metaphor theorist might be seen as disagreeing only about the health of the metaphor.

The anti-realist who accepts the metaphor theory is in a position to claim two significant advantages over the error theorist. In the first place, the metaphor-theorist has a more satisfying explanation of the use of possible world talk and the patterns of assent to possible world claims on the part of those who reject realism about worlds for it is not convincing to assign the fatal attraction of worldly idioms and the assent that they frequently draw to *adisregard* for the truth on the part of such speakers. The second is that the metaphor theorist can claim an advantage of *charitable* interpretation in a sense broader than that which requires only the maximization of truth-speaking. The metaphor theorist can, and should, view worldly metaphor as good metaphor and therefore as a kind of linguistic success on the part of the community. The error theorist, on the other hand is doomed to view the community as indulging in bad literalism and, therefore as registering a kind of linguistic failure. It is in this broader dimension of linguistic success versus linguistic failure and not in the narrow dimension of truth-maximization that the charitable advantage of the metaphor theory over the error theory consists.

These considerations tip the balance in favour of the metaphor theory of possible world discourse but in a sense this is as much a polemical position as an analysis. For once we are satisfied that a community is divided between literalists and metaphorists in its use of a particular range of idioms, perhaps all that there is left to say is that this is how we *ought* to use the language. But this will be a context-sensitive prescription for when indulging in debate with the realist, the anti-realist has little option but to speak as the error theory would advise and to direct assent to literal content rather than that which is conveyed. (As when saying, without intending to endorse determinism, that there are no possible worlds other than the actual world.) Furthermore, if enough people were to go over to Lewis’s literalistic way of speaking the proper course of anti-realism would be the acceptance of the commitments of the error-theorist’s outlook.
A REMARK ON FICTIONALISM ABOUT POSSIBLE WORLD TALK.

I do not claim that the ways of anti-realism that I have characterized exhaust the options and in particular it may be desirable to add to the list the option of a fictionalist theory of world talk. Where avoidance of ontological commitment is in the air, talk of fiction proves popular but it is not clear how fiction per se should be characterized and distinguished from other ways of avoiding ontological commitment. For this we will need to appeal to a theory of fictional discourse and I have no such theory to commend. However, it is possible to indicate two approaches to the meaning of fictional discourse which will issue in anti-realism about worlds given the conception of world talk as fiction. These approaches register divergent patterns of response to our three Fregean conditions.

The first approach to the interpretation of fictional discourse has it that sentences such as (5):

(5) All Clingons have horns.

are in fact conventional abbreviations of fiction-relativized sentences e.g. (6):

(6) According to StarTrek fiction all Clingons have horns.

in which case the original sentence is (literally) true and moreover it is true because it means something other than what it appears literally to mean. In particular its truth does not require that there are such things as Clingons. On this approach we effectively deny the condition of grammar while affirming the condition of truth and, since one condition has already been denied, the anti-realist qua anti-realist is free either to affirm or to deny the condition of recording.

The alternative approach would be to discern within the sentence no hidden operators and to view it as a universal conditional whose antecedent predicate is empty. It would then follow on standard (Frege, Russell) assignment of truth-conditions that the sentence was true and so we would have acceptance of the condition of grammar and the condition of truth. This combination of commitments paints forces the anti-realist to deny the condition of recording, but this may not be an untenable position.

It is obvious that fiction like metaphor qua style or mode of use does not have its point in the recording of features of reality and in that style-of-use-relative sense the sentences of fictional discourse are not apt to record features of
reality.
What is not obvious, especially when special proper names or kind terms feature in the sentences of fictional discourse, is whether these sentences record or misrecord (however inadvertently) features of reality.
Kripke argues that the conventions governing the use of the predicate "Unicorn \((x)\)" are such that nothing that we discover in the world (nor, indeed anything that we can identify in any other possible world) counts as falling within its extension.\(^{37}\) Kripke's view is tantamount to the claim that the style-of-use-independent content of Clingon talk (Holmes talk, unicorn talk) is not capable of recording features of reality, for how else is the claim that these terms cannot but be empty to be understood? Consequently, if possible world talk is genuine fictional discourse and "possible world" is a fictional kind term then a fiction theorist, taking the Kripkean line, should deny that world talk is apt to record features of reality even in the sense that metaphorically deployed sentences are apt to record features of reality despite their characteristic style of use.

(5.8) SUMMARY
Relative to the three Fregean conditions of objectual realism the appropriate strategy of anti-realism about possible worlds, I conclude, is the denial of the condition of truth. To deny the condition of recording on the basis of a general attitude to the role of modal discourse is to adopt an attitude that closes off the option of a non-objectual modal realism and there is no other proposal on the table that would allow the exercise of this option vis a vis possible world talk alone. To deny the condition of grammar is to engage without warrant in a revision of the "apparent meaning" of possible world statements and to conduct this revision in favour of synonymy with modal operator "equivalents" is to adopt a strategy whose basic applicability is subject to serious doubt never mind its merit if applicable. Neither of the theories which are characterized by the rejection of the condition of truth fall foul of charitable constraints on interpretation and while both are tenable anti-realist options, the metaphor theory merits preference over the error theory.
INTRODUCTION TO SECTION TWO: MCGINN'S CONCEPTION OF MODAL REALISM

In this second section of the thesis [Ch.6 - Ch.9] I will be concerned with a second conception of modal realism i.e. the non-objectual modal realism characterized by Colin McGinn. In the second half of his paper, "Modal Reality"¹, McGinn attempts to arrive at a conception of modal realism which is non-objectual and which is recognizable as a realist position in the light of Dummett's influential work². In integrating modal matters with concerns that are salient in the general realist/anti-realist debate, McGinn has moved the discussion onto a new plane. In this section, my aim is to follow the trail that McGinn has blazed, criticizing his strategy and his handling of the issues wherever I feel it appropriate. My hope is that in bringing to light the limitations of McGinn's conception of modal realism I can utilize this critique of his position to launch, in the third section, a third and final version of modal realism that we can survey. My central criticisms of McGinn's representation of non-objectual modal realism are as follows.

(i) The variety and resources of anti-realisms about modality are seriously underestimated. In particular the option of anti-realism based on the strategy of proposing a sceptical solution as a response to a sceptical paradox is ignored. [CH. 6]

(ii) It is proposed that the only defensible form of modal realism is one whose realism consists in endorsing the thesis of supervenience (without reduction) of the modal on the actual. However, the discussion of supervenience fails to acknowledge several difficulties associated with the application of the supervenience and related theses in the modal case and, moreover, there is every reason to believe that acceptance of modal/actual supervenience involves no commitment to modal realism. [CH.7]

(iii) Consideration of the issues that flow from the discussion of the thesis of supervenience should point towards a central question of modal epistemology i.e. whether modal knowledge is attainable by conceptual means alone.
However, McGinn’s discussion of supervenience leads him away from this central question and as a result he mislocates the problematic nature of modal epistemology in the claim that we cannot represent modal facts as causally explaining our knowledge of them. [CH.8]

(iv) The modal realism that McGinn offers is wholly unacceptable since it provides neither a clear conception of the truth-conditions of modal statements nor any account of how we detect modalities. The realism he offers is redolent of sceptical paradox and seems ripe for an anti-realist treatment in the form of a sceptical solution. (CH.9)

I will deal develop these criticisms following an exposition (in the first part of Ch.6) of McGinn’s construction of a non-objectual modal realism and his conception of its philosophical predicament.
CHAPTER 6:  
McGINN'S CONCEPTION OF A NON-OBJECTUAL MODAL REALISM  

(6.01) INTRODUCTION

Section (6.02) is given over to an exposition of McGinn's conception of the nature of modal realism. It is argued that McGinn attributes to modal anti-realists in general a commitment to a totally implausible reductionism [(6.10)-(6.13)] and that he underestimates the variety and resources of anti-realisms about modality thereby ignoring the distinct challenges of non-descriptivism and non-cognitivism [(6.20)-(6.22)]. Non-descriptivism is identified as instantiating a widespread anti-realist strategy of proposing a sceptical solution to a perceived sceptical paradox and I give notice of my intention to deal with this strategy at a later stage [(6.30)-(6.31)]. Finally, an attempt is made to discount non-cognitivism as a live option in modal theorizing [(6.40)-(6.43)].

(6.02) McGINN'S CENTRAL THESES ON MODAL REALISM

(a) The realist is not committed to recognition transcendence.  

Dummett depicts realism concerning a class of statements as a semantic syndrome whose central thesis is that the statements in question may be true while transcending the recognition capacities possessed by their users. (All of this in the context of a truth-conditional conception of understanding and signalled by the acceptance of unrestricted bivalence.) However, this classification proves too narrow and must give way to a more flexible formulation that does not insist upon the centrality of the notion of recognition-transcendence. The general character of realism is that it requires problematic epistemic faculties. The problem with a problematic faculty is not always that it opens the door to scepticism. Scepticism is an eminent threat when the realist construes knowledge of truth conditions of the statements of the given class as arising from (i) relatively direct detection of the truth conditions of statements from an evidence (potentially reductive) class and (ii) a problematic inference from these premises to the truth of statements from the given class. There are different ways in which recognition capacities plus inferential
resources might fall short of the totality of purported truths that constitute the given class. Yet it is more important to acknowledge that there is on occasion a different kind of problem with realist epistemology.

(b) *The modal realist is endorsing a problematic cognitive faculty.* 3

In some instances, it is not that our knowing is a matter of the operation of an intelligible and uncontroversial faculty which cannot reach far enough into the given sector of reality. Rather, it is that the account of our knowing depends upon a cognitive faculty whose very intelligibility is in doubt. Recognition-transcendence cases include realism about the past (evidence class, present tense statements); other minds (evidence class, statements concerning behaviour) or even mathematics (statements to the effect that we have a proof that P). Problematic faculty cases include ethics, mathematics (again), and - it turns out - modality. Certain realists will postulate a special faculty (generically, *intuition*) in order to account for our knowledge of these regions of the world. So, in the event that the realist is found postulating a controversial capacity or faculty, it may well be that this 'realist' is denying recognition transcendence and repudiating the threat of scepticism on the basis of the efficacy of that capacity or faculty. That the modal case is of this kind is highlighted by the two-fold consideration (i) that modality is not a specific target of sceptical attack (ii) that there is no natural conception of the potential reductive class (statements concerning the actual) as evidence class.

(c) *The co-relative modal anti-realism is a thesis of reductive actualism.* 4

The anti-realist relative to this form of realism refuses to endorse the purported recognitional capacity, but, repudiating scepticism, negotiates the truths of the given class into the range of our more mundane and non-controversial recognitional capacities. This 'negotiation' centres upon the proposal that the truths of the given class are reducible to those of a reductive class. The pattern of realist/anti-realist dispute in regions where sceptical worries enjoy a relatively peripheral position is, therefore, quite distinctive. Given the claims of the given class the realist promotes a rich conception of the truth condition and of our
capacities for detection. The anti-realist promotes a more modest inventory of recognitional capacities and a conception of the truth condition tailored to suit these. This pattern is instantiated in the modal case. The realist's characteristic view is that modal truth is not reducible to actual truth. The characteristic modal anti-realist view, is that of actualism - a reductive thesis which proposes either a personal or impersonal base of reduction.

(d) Plausible modal realism endorses the supervenience of the modal on the actual. The realist must propose a conception of the relationship between truths of the given class (modal) and those of the potential reductive class (actual) and the only plausible option appears to be that of supervenience. The supervenience of the modal on the actual allows the realist to steer between reductionism on one side and independence on the other. Supervenience is consistent with realism given the characterisation of modal realism as embodying a commitment to a controversial or supernumery recognitional capacity, for it is a feature of supervenience doctrines that the faculty deemed appropriate to the cognition of supervening truths may not be that deemed appropriate to the cognition of truths of the supervenient base. Supervenience is congenial to modal realism in virtue of this fact.

(e) A priority is the problematic feature of the epistemology of modal realism. Finally, the epistemology of modality that the realist proposes renders modal knowledge a product of a priori cognition and the problematic nature of modal realist epistemology traces to this a priority. The a priori is problematic because we cannot represent facts of which a priori cognition is claimed as causally explaining our knowledge of them and we have no other means of explaining our knowledge of states of the world.

This concludes my outline of McGinn's case. I will now proceed to the evaluation of the arguments that are brought to support the salient contentions within that case. I do not intend to challenge the theses (a) and (b) and the theses (d) - on supervenience - and (e) on a priority will be treated at length.
in chapters 7 and 8 respectively. In the remainder of this chapter I will concentrate on thesis (c) and the effect of its acceptance, i.e the characterization of modal anti-realism as reductive actualism and the distorting effect that this has on the general conception of the realist/anti-realist dialectic in the case of modality.

(6.10) PERSONAL REDUCTIONS
According to McGinn the traditional anti-realist positions concerning modality are usefully distinguished into cases of, respectively, impersonal and personal actualism. The former represents attempts to reduce the truth conditions of modal statements to those of statements about 'objective' non-psychological states of affairs. Personal actualism, on the other hand.....

"........suggests reducing modal statements to facts about the one who uses those statements; such a reduction is aptly called 'psychologistic'. Different versions of this general doctrine pick upon different sorts of properties of persons as constituting that to which a modal truth fundamentally reduces; thus the notions of stipulation or convention or intention or decision or imagination or mental disposition (Hume) are brought reductively to bear. "

Furthermore, while the distinction between personal and impersonal reductive bases for anti-realism is remarked to have analogies in ethics (and in mathematics), the only development of this theme is offered in the remark that there is a.....

"..very close analogy between Humean accounts of necessity and of value; both are conceived as objects of feeling, not of knowledge, arising from the de facto constitution of our minds. "

This is what we are told of personal actualism.

It will assist the investigation of the thesis of personal actualism if we pause, first (6.11) to draw a needed distinction between kinds of reductionist proposal and, second (6.12) to develop a conception of personal reduction in its application to the purportedly analogous spheres of the ethical and the mathematical.

(6.11) A PRELIMINARY NOTE ON KINDS OF REDUCTION
It is useful to distinguish two types of proposal that might be understood to be
implicated in personal actualism or reductionist theses quite generally.

(i) Analytic reductionism is familiar from the discussion of the real meaning strategy. The central idea is that each statement of the given class has a reductive class translation and this may or may not be a prelude to an elimination of the given class vocabulary from some range of contexts or for some range of purposes.

(ii) Constitutive or metaphysical reductionism has it that in some each truth of the given class obtain in virtue of a truth of the reductive class. No translation requirement is imposed and therefore there is no analytic relation between the predicates of the reduced statements to those of the reductive base. It may or may not be the case that this relation is held to obtain with some non-analytic necessity.

Although McGinn never makes it absolutely clear what grade of reduction he takes to be implicated in actualist reductions, he appears to have the stronger analytic thesis directly in his sights. Since he holds that the realist is at liberty to hold the general thesis that modal truths obtain in virtue of truths concerning the actual, it seems that he must have analytic reduction in mind as the hallmark of anti-realism. This intention is further manifest when he commends actualist reductions to the list of defeated theses of reductionism - "definitional reductionism" announced by Davidson.

(6.12) PERSONAL REDUCTION IN ETHICS AND MATHEMATICS
What content can we associate with theses of definitional reduction in those cases which are purportedly analogous to the modal in respect of their attraction to person-based reductionists?

The thesis of person-based reduction of ethical truth presumably requires that there obtain conditionals of the type (1):

(1) "X is wrong" is true (as potentially uttered by A) ---› A disapproves of X.

where these, we should add, are analytic equivalences.

Any such purported reduction of the ethical to the psychological deserves to be termed 'naive subjectivism' and it is open to devastating objections. Extremely sophisticated objections to such a proposal may be inspired by consideration of the relation it bears to following a rule in private or for that matter to conditions of
truth-evaluability which exclude the possibility of truth depending solely upon the act of judgement.\textsuperscript{15} However, the simple objection, which no doubt impinges significantly on the sophisticated considerations, is that no more is required for ethical truth than sincerity of utterance given this naive subjectivism. If the agent indeed disapproves of X then it is indeed true that X is wrong. An eminent consequence of this conception of the truth of ethical statements is that it radically undermines the possibility of ethical disagreement. For when you insist that homosexuality is not permissible and I insist that it is we (probably) are not saying inconsistent things. More than likely, both utterances will be true under the reductionist interpretation of their content.\textsuperscript{16}

Parallel points would apply to naive subjectivism about mathematics but I do not intend to pursue the matter of what a personalized reduction of mathematical discourse might be held to amount to. While there are available a variety of positions that attempt to capture the idea that mathematical objects, or even mathematical truth, is constructed it would be an unprecedented version of psychologism that proposed reducing the truth-conditions of mathematical statements to "facts about the one who uses those statements". The individualism in this formulation renders the thesis unrecognizable. Frankly, I cannot see how such subjectivism about mathematics might afford any appeal. Once we take the general considerations on board the issue of the sort of property of a person that ought to constitute that to which modal truth fundamentally reduces is one that pales into insignificance. For the point is that it is a hopelessly implausible position that has it that there is a truth-relevant contribution of modal vocabulary to statements which is such that the condition of truth is satisfied given the presence of a particular kind of mental state in the one who uses such a statement. Personal reductions of ethical, mathematical and modal sayings are quite unpromising since they threaten to undermine the status of these sayings as articulating judgements and, more bluntly, since their acceptance has the consequence that those who claim that actions are the better for being more generous or that $2 + 4 = 6$ or that cats must be animals are, in each instance, speaking of themselves. All of this can be said without recourse to any criticism of the purported analyticity of the reductive equivalences but when we come to consider this angle, reduction emerges for quite different reasons as a completely untenable position.
The reductionist, in claiming that our modal use is always equivalent to an actualist surrogate, is at a loss to explain the apparent recalcitrance of modal idioms to actualist translation. It is a measure of this recalcitrance that even supposedly reductionist proposals often smuggle in modal idioms (c.f unimaginable, inconceivable) and the only remotely satisfying non-reductionist attempts to elucidate modality (possible worlds) involve these as well. Modality certainly feels as though it is what it is and not another thing and the suggestion that the modal is not at all distinctive seems hopelessly impotent in the face of that phenomenology.

(6.13) PERSONAL REDUCTIONISM - A RED HERRING

The classification of modal anti-realism as (any form of) reductionism has two extremely negative effects. The first, as we have seen, is that it makes modal anti-realism a ridiculously easy target, for the view that modal truth is reducible in the way that McGinn suggests that the anti-realist should take it to be, is not a live option. The second, and ultimately more damaging, is that because McGinn presents personal reductionism as a representation of Hume's view we are left with the impression that in seeing off reductionism, we have dealt with Hume's anti-realism about modality. The impression that McGinn indeed sees matters in this way is further enforced when we observe that he does not in fact go on to deal with any of the challenging strands of anti-realist thought which are genuinely Humean. I say "genuinely Humean" in order to introduce the point that personal actualism has no Humean authority to sustain its relevance to the issue of modal objectivity. It is an error to interpret Hume as offering a reduction of each modal statement to a pair of descriptive and truth-evaluable conjuncts; one concerning (external) actuality and the other a psychological condition (perhaps disposition) of an agent who makes the modal claim. There are at least two main strands of anti-realist thought in Hume's account of necessity, neither of which should be confused with personal reduction and both of which are more challenging than personal reduction. These are non-cognitivism and non-descriptivism respectively. Let us review Hume's theory of our modal concepts bearing in mind throughout the mooted "close analogy between his accounts of necessity and value."17
In a crucial passage Hume writes:

"Thus necessity is something that exists in the mind, not in objects; just as the necessity by which twice two is equal to four lies only in the act of understanding by which we compare these ideas, power and necessity are qualities of perceptions not of objects and are internally felt by the soul, not perceived externally in bodies."  

From this and other passages it is clear that Hume is in the psychological sense a non-cognitivist about modality. By this I mean what McGinn appears to mean when he applies the term 'non-cognitivist' to Hume i.e. that the distinctively modal (and evaluative) mental episodes are in the province of 'feeling' not of knowledge. This usage of the term 'non-cognitivism' respects its obviously psychological etymology, but the term is also widely used to articulate the semantic thesis that a class of statements (claims, commitments) are not truth-evaluable. In Hume the connection between psychological and semantical non-cognitivism is secured because it is the ontogeny of our concepts that determines whether or not they make a truth-relevant contribution to the sentences that they invest with meaning. In particular, it is because our 'idea of necessity' is based on an impression of reflexion - not an impression of sensation - that the use of modal vocabulary does not bring in its wake an extra truth-relevant contribution. So the failure of truth-relevance of modal vocabulary follows, for Hume from the psychological aetiology of the concept of necessity.

Hume, then, is no reductionist about modality since for him the modal is, as it is for McGinn's realist, "something over and above the actual", but for Hume this additional conceptual component brings in its wake no additional truth-relevant content.

The second crucial strand of anti-realist thought in Hume's theory of modality is non-descriptivism. What is added to, say, a purely actualist generalization in its augmentation with modal vocabulary is not, for Hume, a descriptive component. If we bear in mind at this stage - and in the context of the close analogy between the Humean accounts of necessity and value - that Hume's theory of moral
language is essentially an expressive theory, we arrive at a conception of what this non-descriptive role of modal vocabulary is. Let us anticipate Blackburn's deployment of Hume's views on the nature of modal commitments and settle upon the claim that the function of modal vocabulary is to register the projection of a non-cognitive mental state. At this stage we need not make a commitment to an interpretation of what it is that is projected in modalizing (e.g. the activity of a mental disposition, a feeling, an expectation, an imaginative block etc.), but the notion that something of us is projected rather than something of the world described is what is crucial to Hume's theory of modalizing.

Non-descriptivism, like non-cognitivism is alien to the thesis of personal reduction for the personal reductionist has the user of modal vocabulary describing the presence of a psychological something in whose presence the truth of the modal statement (partly) consists. McGinn appears to be straining to attribute a descriptive bent to modal anti-realism but it is a mystery as to why he should insist upon this given the historical pre-eminence of non-descriptivism in (what would normally be thought of as) the modal anti-realist tradition (e.g. Hume and Wittgenstein).

I have tried to show that personal actualism is a red herring as far as modal anti-realism is concerned and I have identified non-cognitivism and non-descriptivism as two (familiar) non-reductionist strands of anti-realism. I will go on to argue that of these non-reductionist strands of anti-realism it is non-descriptivism that proves more challenging to modal realism but my first task is to indicate (by way of consideration of opposition to moral realism) why non-cognitivism and non-descriptivism ought to be distinguished.

(6.22) NON-DESCRIPTIVISM IS DISTINCT FROM NON-COGNITIVISM.

The proponents of non-descriptivism about ethical sentences react differently to the question of the truth-evaluability of those sentences. In this matter Ayer adopts the Humean semantic orthodoxy and Blackburn opposes it - i.e. Ayer is a semantical non-cognitivist but Blackburn is not. This state of affairs in the philosophy of value drives home the point that while non-cognitivism and non-descriptivism are alike in being non-reductive, they are not to be confused.
with one another. It is a mistake to fail to distinguish between these non-reductive anti-realist positions. Certainly, Hume's expressive/projective conception of modality is accompanied by non-cognitivism but it will not do to attribute quite generally to non-descriptive anti-realists about modality a commitment to non-cognitivism. Moreover, the existence of a non-descriptive modal anti-realism that disavows non-cognitivism saves us the trouble of having to invent it.

Blackburn's quasi-realist conception of moral discourse - involving the adumbrated combination of semantic cognitivism and non-descriptive projectivism - is mirrored in his quasi-realist conception of modal discourse. Therefore we do well to acknowledge at this early stage a form of (quasi-realist) opposition to modal realism which combines a conception of the role of our modal statements as projections (hence non-descriptivism) with a defence of their right on that basis to truth-evaluation (hence non-non-cognitivism). Blackburn's position will be tackled at an appropriate juncture but a great deal of ground must be covered before that stage is reached.

In the next section I will attempt to reconstruct McGinn's version of the realist/anti-realist dialectic with a view to showing how his omission of non-reductive anti-realisms arises.

(6.30) REACTIONS TO THE THREAT OF SCEPTICISM: REALISM.

REDUCTIONISM AND SCEPTICAL SOLUTION.

The threat of scepticism can be seen as arising from the standard (Dummettian) realist's position i.e. that there may be statements whose truth/falsehood obtains even though their truth-value is not decidable on the basis of the recognitional capacities that we (uncontroversially) have even when these capacities are idealized. As McGinn rightly points out, the realist is sometimes found attempting to avert scepticism by raising the stakes and invoking a controversial faculty or capacity that overcomes recognition transcendence and measures up to the, richly conceived, truth-condition. The anti-realist may react to the threat of an unbridgeable gap between truth and our powers of cognition by reducing the problematic truth so that the reductively conceived truth-condition falls within the scope of uncontroversial faculties.

In sum, if we are to credit ourselves with knowledge of the given kind, this
seems to require either (i) a "queer" fact that is the object of that knowledge and a mysterious faculty appropriate to its cognition or (ii) a "mundane" conception of the fact revised in such a way as to render it accessible by cognitively familiar means. This dialectic places the fact at the heart of matters and revolves around the question of what this fact, properly construed, demands of our cognitive powers. But there is another class of options that lies outwith the restricting dichotomy of realism or reductionism.

The scenario in which our grasp of the fact threatens to become an inexplicable surd (realism) or the fact becomes accessible at the cost of its distinctive identity (reductionism) is the essence of a sceptical paradox. The paradox is escaped by the anti-realist who, as McGinn puts it, "cannot comprehend how the introduced faculty is supposed to operate at all" but sees no need to attempt to squeeze the fact to fit another fact-recognizing faculty. A sceptical solution takes off from the denial that the role of the discourse is to state any kind of fact, queer or mundane.

Because of the notorious difficulty in substantiating the notion of a fact, it is not a straightforward matter to characterize the relationship between sceptical solutions and the (broadly) anti-realist theses of non-cognitivism and non-descriptivism respectively. I take the view that non-cognitivism should be regarded as contingent to the strategy of sceptical solution and that non-descriptivism should be regarded as essential to that strategy.

(6.31) Sceptical Solutions and Non-Cognitivism

To pursue a sceptical solution is, I suggest, to adopt a strategy that bears no straightforward relation to a commitment with respect to the (failure of) truth-evaluability of the declarative sentences in question. It has been suggested that the natural semantic consequence of accepting the orientation of a sceptical solution is to supplant the notion of truth as the primary dimension of assessment for the sentences with the notion of assertibility. This, however, is of little help until we are told what the difference between truth and assertibility is. Moreover, it will take considerations of a substantial kind to ground and motivate the perceived need for just such a distinction. The repudiation of truth-evaluability may once have seemed an unavoidable commitment given repudiation of the claim to "fact-stating" status, but the issue
has been complicated considerably by the increasingly popular perception of a need, even on the part of those who have seen fit to regard themselves (at least on occasion) as "realists" to elucidate the concept of truth as a norm of rationality or a standard of (broadly) success in judgement and certainly as something other than a property borne by statements in virtue of their correspondence to reality.\textsuperscript{36} If the matter is posed in a fashion whereby the difference between truth and assertibility is that truth-conditions require corresponding facts while assertibility-conditions do not, then repudiation of descriptivism emerges more forcefully as the issue that is implicated in the shift to assertibility. All hands can then agree on the centrality to the strategy of sceptical solution of the repudiation of descriptivism irrespective of their views as to whether the appropriation of the concept of truth for correspondence with the facts is warranted.

In his discussion of Kripke's sceptical solution, McGinn clearly proceeds on the assumption that it is appropriate to view a commitment to non-cognitivism as a generalizable feature of the strategy of sceptical solution.\textsuperscript{37} I disagree. In any event, what should be emphasized is that the generality of non-cognitivism does not follow from the generality of non-descriptivism. To assume otherwise would be to beg the question against those (e.g. Blackburn) who hold that their theories, although embracing a non-descriptive view of the role of relevant discourse, establish the right to evaluate the sentences in terms of truth. Henceforth I intend by use of the term "sceptical solution" an anti-realist strategy that embraces non-descriptivism i.e the thesis that declarative sentences of a given class do not have a descriptive role.

The position that has been developed is this: I agree with McGinn in holding that we can bypass safely the reductionist in our consideration of plausible opposition to modal realism. But this leaves untouched the recognizably anti-realist strategies of non-cognitivism and sceptical solution as a strategy of response to a purported "sceptical paradox" of modality. The presentation of a sceptical paradox of modality and confrontation with the associated sceptical solution will emerge at a later stage of the discussion (Ch.9, Ch.12) I will deal with non-cognitivism forthwith.

//(OVER)
Here, I intend neither to enter into a detailed critique of modal (semantic) non-cognitivism nor into the lengthy and difficult investigation of the right of declarative sentences to truth-evaluation that this would require. Instead, I will proceed by offering some remarks on the modal non-cognitivist challenges of Hume and Wittgenstein with a view to defusing these challenges [(6.41)]. Then I will propose as necessary conditions of truth-evaluability of a class of sentences, (a) satisfaction of a set of marks of truth [(6.42)] and (b) semantic adequacy of truth-theoretic interpretation [(6.43)] and I will claim that modal operator sentences meet these conditions.

(6.41) AN ATTEMPT TO DEFUSE THE MODAL NON-COGNITIVISMS OF (a) HUME and (b) WITTGENSTEIN.

(a) Hume, as previously remarked, offers a criterion of truth-evaluability based upon the distinction between active and passive mental faculties and the plausibility of this criterion has been diminished along with the plausibility of the philosophy of mind that sustains it.\(^{38}\) However, there is a further radically revisionary dimension of Humean non-cognitivism that undermines its plausibility.

It is not often remarked how far the revision of our truth-evaluating practices would have to proceed were the criterion that Hume proposes applied throughout our everyday talk. Yet it is worth noting that given our purported projection of not only moral sentiment and causal "expectation", but also the continuity of objects in space and time, identity etc. it seems likely that virtually nothing that we recognize as having truth-evaluable content will survive the rigours of Humean psychological de-construction. Modal and moral non-cognitivism in the hands of a consistent Humean is the thin end of the wedge and the outcome of the application of Humean methodology must surely be the abandonment of the notion of truth for all practical purposes.\(^{39}\)

(b) Wittgenstein's apparent penchant for modal non-cognitivism is somewhat puzzling.\(^{40}\) The metaphor which encapsulates Wittgenstein's view of the role in use of necessities renders them as rules as opposed to moves in the language game.\(^{41}\) Once the point has been made that logical or mathematical necessities have a prescriptive (i.e. a non-descriptive!) component to their
functioning in the language game, it is difficult to see what more is to be gained by insisting on the impropriety of attributing truth to the statements in question. There is a strong inclination to say that once the claim of a non-descriptive role for necessities is taken on board the really important point has been captured. This leaves us free (and surely Wittgenstein would have demanded with this) to view our standard practice of attributing truth and falsity to such sayings as perfectly in order but it should also heighten our sensitivity to the possibility that the point of our applying the predication "true" is not absolutely invariant across all of the regions of our discourse in which it is applied. Thus, in the face of the challenge of Wittgensteinian modal non-cognitivism I respond in the spirit of Dummett's (Wittgensteinian?) assessment of moral non-cognitivism:

"At one time it was usual to say that we do not call ethical statements "true" or "false", and from this many consequences for ethics were held to flow. But the question is not whether these words are in practice applied to ethical statements, but, whether, if they were so applied, the point of doing so would be the same as the point of applying them to statements of other kinds, and, if not, in what ways it would be different." 42

My claims then are that Humean pro non-cognitivist (as opposed to pro non-descriptivist) considerations are irrelevant to the contemporary debate and that the Wittgensteinian considerations which have been taken as having pro-non-cognitivist implications are better focused in the context of the dispute concerning the (non-)descriptive role of necessities. Hereby, I hope to have defused the specifically non-cognitivist challenges that have been mounted by these historically eminent opponents of modal realism and I now want to turn to more general considerations that pertain to the handling of cognitivist/non-cognitivist disputes.

(6.42) THE REQUIREMENTS OF COGNITIVISM: (a) THE MARKS OF TRUTH

It is unpromising to attempt to insist that truth-evaluability (as opposed to, say, assertibility - evaluability) requires the aptitude of a class of statements to (fail to) correspond to reality. Firstly, because, as I have already indicated, I see this as begging the question against the possibility of non-descriptivist cognitivism. Secondly, because there seems to be no question of settling the issue of
cognitivism by appealing directly to concepts such as correspondence with reality or, relatedly, to the notion of a fact or the content of the world for such a direct procedure seems doomed to beg crucial questions in the cognitivist debate and as such, as Strawson puts it...

".. these contain the problem, not its solution." 43

Wiggins44 also despairs of gaining any insight into the nature of truth or into cognitivist/non-cognitivist disputes by invoking the notion of "correspondence". He argues that the pre-theoretical concept of truth is illuminated via its identifiability with an independently developed, functionally-characterized theoretical semantic concept ("assertibility") that is adequate for the purposes of interpreting the speech of a linguistic community. Wiggins (tentative) conclusion might be represented in the following way. When we attempt to gauge how the theoretically introduced concept falls short of the content of the pre-theoretical concept of truth we find that there is neither shortfall nor overspill - the relationship between the concepts of assertibility and (pre-theoretical) truth emerges as one of a posteriori identity. Consequently, our confidence that a problematic class of statements is interpretable should carry over into the claim of their truth-evaluability. The marks of truth/assertibility which are generated by the interpretative constraints are as follows:45

(i) That truth is the primary dimension of assessment for the sentences i.e. that which the sentences it applies to have normally to be construed as aiming to enjoy.

(ii) That if sentences are capable of truth then their content should be such as to support under favourable conditions of investigation a tendency for disagreement to diminish and for opinion to converge in agreement (though not necessarily to a unique Piercean limit).

(iii) Any sentence which has (lacks) truth has it independently of any individual speaker's means of recognizing it.

(iv) Every sentence which is true is true in virtue of something. (This is intended as summarizing the first three marks and as capturing "the little that was reasonable in the correspondence theory of truth."46)

(v) If a sentence "S₁" is true and a sentence "S₂" is true then their conjunction "S₁ & S₂" is true.

My proposals are: (1) that the presence in the case of modal statements of
these marks of truth should be regarded as sufficient for cognitivism about modal statements; (2) that we should accept that these marks of truth are indeed present in the case of modal statements; and (3) that we should acknowledge that the acceptance of these first two claims is quite consistent with the important anti-realist strategy of sceptical paradox/sceptical solution.

It is, however, arguable that there can be no question of the presence of the marks being sufficient for truth-evaluability given that we can impose a well-motivated and substantive requirement of semantic adequacy on the truth-evaluability of a class of statements.

(6.43) THE REQUIREMENTS OF COGNITIVISM: (b) SEMANTIC ADEQUACY

At first sight it seems that no light could be shed on cognitivist/non-cognitivist disputes from considerations that arise within the semantic core of interpretation theory, i.e. Tarskian theories of truth.\(^{47}\) This Tarskian core consists of a characterization of truth for the sentences of a given language and proceeds by generating a "truth-condition" to each sentence on the basis of its lexical components and modes of composition. The apparent (and now widely accepted) philosophical neutrality of Tarskian theories of truth\(^{48}\) seems to reflect a view that such theories have nothing to tell us concerning more philosophically substantial matters relating to the concept (or conception) of truth. However, it turns out that the modal case is special in this respect for we can develop an important angle on the viability of modal cognitivism from consideration of the semantical project of the construction of a Tarskian theory of truth for modal languages. The inefficacy of truth-theoretic considerations upon the dispute over cognitivism in the moral case stands as an interesting contrast.\(^{49}\)

Wiggins expounds the minimal status of the assumption that a semantically adequate procedure for generating Tarskian T-theorems must be available where the object language, L, contains moral vocabulary:

"Moral philosophy as we know it makes many sophisticated claims about meanings, some of them very hard to assess. Compared with everything that would be involved in making those assessments, what we are assuming here is minimal. It is only that the discursive or informal comments that the moral theorist hopes to make about
the status of this, that or the other judgment in L will presuppose that such a biconditional can be constructed for each sentence of L. These assertion conditions give the meaning of the judgments he wants to comment upon. If no such principled understanding of what they mean may be thought of as obtainable, then (whatever other treasures he posses) he cannot even count on the first thing."^50

The plain fact is that the theory of truth is oblivious to many aspects of the "meaning" of declarative sentences beyond their grammar^51 but it is the grammar alone of philosophically contentious sentences (e.g. sentences containing moral vocabulary) that determines their susceptibility to truth theoretic processing.

The axiom dealing with an expression such as, "x is courageous", is, in the standard case, homophonic or austere, viz:

\[(2) \quad (x) \text{[SATS (x, L, "\_\_\_\_ is courageous") \text{ } \iff x \text{ is courageous}]\]

The measure of the semantic success of the theory containing such an axiom is its ability to satisfy Convention T in generating, in conjunction with approved logical resources, a theorem of the type (3),

\[(3) \quad \text{TRUE (L, "Mandela is courageous.") \iff Mandela is courageous.}\]

for each object language sentence. In the case indicated, neither the axioms nor the theorems appear to bring with them any problem for the cognitivist's project and, equally, this "success" is hardly a hammer blow to non-cognitivism. Yet were there something amiss in this narrow semantic arena - if, in Wiggins' words, we "cannot even count on the first thing" - this could not but be to the detriment of the cognitivist's aspirations. In other words, truth-theoretic adequacy is a one-sided test in the dispute between cognitivist and opponent. If the truth-theoretic treatment of a philosophically contentious class of declarative sentences proves straightforward, this, of itself, is no feather in the cognitivist cap. But, if it proves that the sentences are not susceptible to the processing, then this is a powerful semantical point in favour of non-cognitivism. In this way truth-theoretic considerations may impinge on the question of the (non-)cognitive role of declarative modal sentences.

Truth-theoretic adequacy impinges forcefully on the prospects of modal
cognitivism in a way that affords no parallel in the moral case, for voices have been raised in doubt concerning the availability of a semantically adequate theory of truth for object languages containing modal operators. The salient objection against the adequacy of theories of truth for modal operator languages is based upon the allegation that instances of axiom schemata which have to be deployed in the derivation of T theorems viz:

\[ (4) \quad \text{TRUE}(L', \square \neg(P \land 
eg P)) \iff \square [\text{TRUE}(L', \neg(P \land 
eg P))]. \]

are false. The case is that the left side is true, but the right side false. The right side is false since in some other possible worlds the expressions, "\"" and "\&", mean something different and in some of those worlds the L sentence, "\neg(P \land \neg P)" with its non-actual meaning is false. So, the sentence inside the modal operator on the right side of the biconditional:

\[ (5) \quad \text{TRUE}(L', \neg(P \land 
eg P)) \]

is contingent and not necessary, and the modalized sentence on the right side of the biconditional:

\[ (6) \quad \square [\text{TRUE}(L', \neg(P \land 
eg P))]. \]

is false, as is the entire biconditional (4) itself.

Not surprisingly, there are available responses to this objection. However, the claims of the respondents depend upon principles whose philosophical pre-suppositions are not clear (since no argument is offered for the acceptance of these potentially far-reaching principles) and so the philosophical defensibility of the truth theories that have been proposed remains in doubt. (The principles concern, *inter alia*, the identity conditions of languages and what is counterfactually true of them.) I take the development of a semantically adequate and philosophically defensible theory of truth for a class of languages containing modal operators to be crucial to the prospects of defending a view of our modal statements as being non-objectual and truth-evaluable. That such a theory of truth can be developed is a difficult proposition to establish and I have devoted a lengthy appendix to this issue. Here, I will simply enter the (tentative) conclusion of that appendix which is that we can develop a semantically adequate and philosophically defensible theory of truth for languages containing modal operators. I contend on the basis of this conclusion that the major threat to modal cognitivism, based upon the allegation semantic inadequacy, has been averted.
CHAPTER 7
SUPERVENIENCE (I): THE CONCEPTION OF MODAL REALISM AS
SUPERVENIENCE WITHOUT REDUCTION

(7.0) INTRODUCTION
Reductionism and non-cognitivism have been discounted as viable options in modal theorizing and the anti-realist strategy of sceptical paradox/solution has been identified as a further response to the problematic which McGinn viewed as meriting only realist or reductionist response. In this chapter I will challenge McGinn's positive conception of modal realism as acceptance of the supervenience (without reduction) of the modal upon the actual.

McGinn, as we saw in Ch.6, characterizes the realist as construing modal commitments as having truth-conditions in such a way that modal truths are not reducible to actual truths. He proceeds by remarking that irreducibility is compatible with the respective theses of the independence of the modal from the actual and the supervenience of the modal on the actual - these theses being mutually incompatible - and argues that modal realism (construed as the claim that modal truths are epistemically problematic relative to actual truths) can and must incorporate the supervenience thesis.1 It can because supervenience is quite consistent with there being distinct recognitional capacities appropriate to supervening and base truths, and this leaves open the prospect of the former being associated with a relatively problematic (controversial) recognitional capacity; it must because the alternative to supervenience (i.e. independence) is wholly unacceptable.

Cause for concern with this approach arises from the subsequent - relative to McGinn's discussion - emergence of a variety of important distinctions between kinds of supervenience thesis and problems which attend their application. When we come to evaluate the effect of these factors upon the formulation of a thesis of modal/actual supervenience, doubts concerning the non-trivial applicability of supervenience (and related) theses duly arise, but more importantly the modal realist significance of the supervenience thesis is seriously undermined.
According to the simple intuitive conception of supervenience, if A (associated) truths supervene on B (base) truths, then there can be no A difference between entities unless there is a B difference. However, philosophers with varying interests have felt the need to distinguish among a variety of sharply formulated theses which attempt to capture this simple intuitive conception and, furthermore, have identified a range of problems pertaining to the application of these theses. For the purposes of the discussion we may settle on two versions of supervenience - weak and strong - that have been distinguished in the literature. The relevance of the distinction between these versions is two-fold: (a) McGinn draws no such distinction and thereby erroneously attributes to Putnam the acceptance of an extreme realism about modality - realism with independence; and (b) it allows us to rebut an argument, due to Lewis, against non-objectual construals of modality - I deal with the latter point in Appendix B.

In order to introduce the relation of independence and the distinction between weak and strong supervenience, I will offer an example of their application to a specific case.

Let it be the case that 'B*' marks a place for a description of the total physical state of an organism and 'A*' for a description of the totality of intentional states of the organism. The thesis of independence of the intentional from the physical has it that organisms which are physically indiscernible may still differ with respect to their intentional states, thus:

\[(\text{IND}) \forall \exists x (B^*x \land B^*y \land A^*x \land \neg A^*y)\]

The thesis of weak supervenience is simply the denial of (IND), but it can be written more conveniently thus:

\[(\text{WEAK}) \square (\exists x)(B^*x \land A^*x \rightarrow (y)(B^*x \rightarrow \neg A^*y))]\]

So the claim of WEAK is intended as being that in each possible world, if two organisms are physically indiscernible, then they do not differ in their intentional states. It is important to be clear about what the denial of independence commits us to, or to put it another way, to be clear about what weak supervenience is not.

In the first place, WEAK like its stronger relative is designed to accommodate variable realization of associated properties. In other words, it does not exclude
the possibility that you and I may be doppelgangers in our intentional lives while being of distinct physical types. Physical doppelgangers within any possible world must be indiscernible in their intentional states but it is not being claimed that the converse obtains.

In the second place, the scope of the modal operator in WEAK is such that it is a world-specific thesis. WEAK says of each possible world that within it the presence of a B*/A" combination is sufficient for the truth of the generalization (1):

(1) \((x)(B^x \rightarrow A^x)\).

In Blackburn's phrase weak supervenience constitutes "a ban on mixed worlds". If something in a world is B* and A" then nothing in that world is B* and not A". But this minimal condition is consistent with a number of counter-factual (i.e. inter-world) combinations. For example in this world the generalization (1) holds non-trivially (i.e. something is B*) but in some other possible world, again non-trivially, the generalization (2):

(2) \((x)(B^x \rightarrow \sim A^x)\)

holds - the other worldly B* things might even be non-intentional entities!

The acceptance of WEAK then, may be an appropriate option for a theorist who wishes to accept psycho-physical regularities while rejecting psycho-physical laws. Thus, a Cartesian might well argue against pain/C- fibre identity on the grounds that while an exceptionless regularity:

(3) \((x)(Cx \rightarrow Px)\)

obtains (among humans) in the actual world, there are other worlds in which the exceptionless regularity:

(4) \((x)(Cx \rightarrow \sim Px)\)

obtains. This is sufficient for the modal argument against so-called "property identity". Why one would want to stop here and not go for independence is not at all clear, but the point has been simply to indicate what the application of WEAK and IND would amount to in these cases.

WEAK is to be contrasted with the stronger supervenience relation STRONG:

(STRONG) \(\Box \ [(\exists x)(B^x \& A^x) \rightarrow \Box \ (y)B^y \rightarrow A^y)]\)

This stronger thesis still accommodates variable realization, but it rules out certain other options that are consistent with the ban on mixed worlds. Particularly, given STRONG there are no inter-world physical Doppelgangers.
that differ intentionally - the B* things of other worlds must be A" things.7

The logical relations between the theses IND, WEAK and STRONG that must be borne in mind are as follows:

(i) STRONG --> WEAK (ii) STRONG --> ~ IND (iii) WEAK <-> ~ IND

Consequently there is a logically consistent position which consists in the acceptance of WEAK alongside the denial of STRONG and the denial of IND i.e. the acceptance of weak-but-not-strong supervenience.

(7.20) McGINN'S UNWARRANTED ATTRIBUTION TO PUTNAM OF THE INDEPENDENCE OF THE MODAL FROM THE ACTUAL

McGinn takes the claim of the independence of the modal from the actual to be quite implausible but nonetheless he attributes this claim to Putnam.8 I want to show that the attribution of the independence thesis to Putnam is hasty and unwarranted in light of the availability of the distinction between STRONG and WEAK.

It is evident from McGinn's handling of Putnam's discussion9 that he (McGinn) is conflating theses which ought to be distinguished. Putnam writes:

"Does the totality of facts about what events actually take place determine the truth-value of all statements of the form 'It is possible that P'? To me, at least, the answer, it seems is, "no", and if the answer is "no", then both the Quinean account of logical necessity and Humean account of causality have to be wrong." 10

McGinn alleges that in proposing this view, Putnam is endorsing the independence thesis in connection with modal truths and actual truths. For my part, I do not see that anything in the quoted passage, or in Putnam's discussion of the example which occasioned his comment, shows him to be sympathetic to independence. The quoted passage is susceptible to interpretation in a way that renders Putnam's consistent with weak supervenience and, so, consistent with the repudiation of independence. There are three reasons for accepting this interpretation.

Firstly, WEAK, it will be recalled, is a world-specific thesis whose effect is to ban mixed worlds so that, at each world, what holds is one of the generalizations (1) and (2):

(1) (x)(B*x --> A"x) (2) (x)(B*x --> ~A"x)
In the modal/actual application, actual truths (concerning x) are intended as being exhausted in the base description $B^*$ and modal truths in the associated description $A^*$. In fitting Putnam’s (quoted) views into the context of the discussion of supervenience, the crucial question is whether WEAK can be identified with a thesis of the “determination” of A-truths by B-truths. The answer is that it cannot, for, in general, the acceptance of WEAK (but no stronger thesis of dependence) allows us to assert both (5) and (6):

(5) $\diamond (\exists x)(B^*x \& A^*x)$  
(6) $\diamond (\exists x)(B^*x \& \sim A^*x)$

So once we fix the weak supervenient base x might yet either have associated state $A^*$ or lack associated state $A^*$ and this, surely, is no determination of the A-truths by the B-truths.

Secondly, a consideration of the context of Putnam’s repudiation of "determination" further supports the view that he is not best viewed as endorsing independence. The focus of his attack is a ‘Humean’ account of modalities i.e. one which...

"...assumes that what is true in possible worlds is totally determined by what is true in the actual world plus our conventions." \(^{11}\)

and more specifically, the view that necessarily true generalizations - construed as including the laws of logic - can be accounted for on the basis of "moderate conventionalism":

"If anyone is tempted to hold it, the form of moderated conventionalism that consists in saying the laws of logic are just true in the actual world, but given that they are true in the actual world, it’s a matter of our convention that they are true in all possible worlds, seems to me quite untenable." \(^{12}\)

It does not matter that the concept of convention is central to the formulation of the point in this instance. What Putnam is objecting to quite generally is the purported determination of all general modal truths on the basis of the actual truth of a non-modal generalization plus some additional 'condition'. The plain fact is that weak supervenience does not represent, far less determine, the necessary truth of B/A generalizations at all for it is characteristic of WEAK that it permits worlds at which there are true generalizations of type (2) despite the actual truth of (1):

(2) $(\forall x)(B^*x \rightarrow \sim A^*x)$  
(1) $(\forall x)(B^*x \rightarrow A^*x)$.  

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In his attack on the account of what it is that confers truth upon generalizations of the type:

\[(\text{NEC}) \quad \Box(x)(B^x \rightarrow A^x)\]

Putnam is tackling an issue other than that of whether independence of the modal from the actual is tenable. So, given that he is concerned to repudiate the "determination" of the truth-conditions of NEC generalizations, the repudiation of WEAK is not a plausible interpretation of Putnam's aims.

There is a third consideration, relating to an example that Putnam offers, which further undermines McGinn's "independence" interpretation. Here is McGinn's exposition of the example which may have "misled" Putnam into the (purported) acceptance of independence:

(#) "...he asks whether it is possible that there be two worlds indiscernible with respect to the occurrence of actual events in them, but differing as to the fission of a small particle in a certain counterfactual experiment."

To clarify: the supposition is that in neither world is the particle in question bombarded with protons (say) at the given time; the question is whether we can hold that the counterfactual (7):

(7) If \( x \) had been bombarded with protons at time \( t_1 \), a fission of \( x \) would have occurred.

is true of particle \( P_1 \), in world \( W_1 \), but not true of particle \( P_2 \) in world \( W_2 \). Putnam's response is, indeed, that we can. But how does this response relate to the issue of the independence of the modal from the actual? This is McGinn's "paraphrase" of the question that Putnam poses:

"So, the question is whether two particles could be the same in all actual properties yet differ in their counter-factual properties."

This is an equivocation between an intra-world and an inter-world interpretation of the relation that is alleged to obtain between the particles. In the inter-world interpretation, the question is:

(Qa) Could it be the case that \( P_1 \) in world \( W_1 \) has a type-identical intra-world description with that of \( P_2 \) in world \( W_2 \), yet \( P_1 \) has, while \( P_2 \) lacks, a certain counterfactual property that \( P_1 \) has? \((W_1 \neq W_2)\)

This is the content that is articulated in the quotation, (#), above and it is indeed
the question that Putnam poses and to which he responds affirmatively. Now consider the intra-world version:

(Qb) **Could it be the case that within some world \( W \), \( P_1 \) and \( P_2 \) have type-identical actual descriptions, yet (at \( W \)) \( P_2 \) lacks some counterfactual property that \( P_1 \) has?**

(Qb) is quite distinct from Putnam's question (Qa) and it is (Qb) that is relevant to the thesis of independence - a positive response to (Qb) is an endorsement of independence. The world that is required by an affirmative response to (Qb) is a *mixed world* in precisely the sense that weak supervenience excludes: for at \( W \) we would have indiscernibility of actual properties for \( P_1 \) and \( P_2 \) but a modal difference i.e. an associated property difference *without* a base property difference. But Putnam is not answering (Qb) affirmatively for he is not answering the second question at all! In sum, McGinn has conflated the logically distinct cases of inter-world and intra-world comparison and then attributed unjustifiably to Putnam the denial of weak supervenience when Putnam is in fact responding to the inter-world question (Qa).

My case, then, is that Putnam *may be* repudiating strong supervenience of the modal on the actual but he is not repudiating weak supervenience and so he is not endorsing independence. This possibility is rendered invisible to McGinn by his failure to distinguish between strong and weak supervenience.

Before moving on, a final remark concerning the interpretation of Putnam is in order. There is some difficulty in attempting to fix more precisely what it is - in terms of the notions of supervenience and reducibility - that Putnam *is* claiming. The three factors that have been brought to bear in arguing that Putnam is not denying weak supervenience of the modal on the actual - talk of "determination", consideration of the (NEC) type generalizations and his concern with the inter-world question (Qa) - might be held to indicate that he is concerned to deny *either* the strong supervenience on, or the reducibility of the modal to, the actual. It will be argued below [(7.4)] that, in the modal case, the acceptance of weak-but-not-strong-supervenience is not a feasible option but there is no reason to believe that Putnam is influenced by that consideration. Therefore, although the factors that have been adduced here do, I believe, show that Putnam is not embracing independence, there is no further evidence
that allows us to settle whether Putnam intends (i) to repudiate only "determination" *qua* reductionism or (ii) to repudiate "determination" *qua* strong supervenience and therefore - given repudiation of independence - to embrace the (unstable) option of weak-but-not-strong supervenience. However, to emphasize, what is paramount here is not what Putnam's positive claim is, but that the attribution to him of the thesis of the independence from the actual of the modal is unwarranted.

(7.21) THE MORAL OF McGINN'S INTERPRETATION OF PUTNAM
McGinn suggests that Putnam has been influenced by the special case of quantum mechanical indeterminacy firstly in asserting independence for nomological necessity and then in generalizing independence to other kinds of necessity e.g. logical necessity. I do not know whether Putnam would go on to affirm independence - i.e. to affirm the intra-world proposition *were he to address it*. Perhaps the special case of physical indeterminacy for certain kinds of events enforces assent here. My case is that a proper understanding of Putnam's example does not permit us to attribute the assertion of independence even in the nomological case. McGinn attempts to pre-empt Putnam's indeterminacy-dependent example by invoking examples which are not obviously susceptible to the vagaries of fundamental physical indeterminacy. In the first case, that of the dispositions of substance samples, the distinction between the relevant inter-world and intra-world questions is again conflated. In the second, the ambiguity is finally resolved in favour of the intra-world reading when the reader is asked to consider...

"...two sectors of the universe in which the same sequences of (type) events occur ...." (My emphasis, J.D.)

and is then invited to concur that their lawfulness is not independent of actuality, viz:

"...surely, if sequences of events differ in respect of lawlikeness, that is due to some actual feature of the events concerned (or perhaps surrounding conditions)."  

So McGinn is now clearly addressing what independence *does* require and (special considerations of fundamental indeterminacy aside) he is right to insist that the repudiation of such independence is implicit in our conception that
investigation of actual micro-structures yields knowledge of what is counterfactually true of substances. He is also right, I believe, in insisting upon the repudiation of independence in the central case of "strict or metaphysical necessities". He writes:

"Consider first synthetic necessities such as the necessity of origin, kind, composition and identity. Presumably the [independence] claim will take the form of envisaging two objects just alike in these respects - they instantiate the same non-modal properties and relations - yet for one object these properties and relations are essential while for the other they are not. So, for example, two human beings could both instantiate the relations that constitute having a certain origin - they developed in the same way from gametes and so forth - yet one has his actual origin essentially while the other has his contingently; and similarly for the other synthetic necessities. To anyone who takes such essentialist claims seriously this must seem quite implausible: it is impossible that two objects be alike in their actual properties but differ in the modalities with which they instantiate those properties."  

My own view is that we should push McGinn's point further and hold that the denial of independence in the case of these strict synthetic necessities at least, is not only implausible but has claim to be (partially) constitutive of the modal concepts in question.

(7.30) BASE INDISCRERNIBILITY AND THE THREAT OF TRIVIALITY
The second consideration relating to the application of supervenience theses is the threat of trivialization of supervenience theses arising from indiscriminate conceptions of base indiscernibility. If we are concerned to frame supervenience theses where the bases are of a highly general nature - such as the totality of physical or natural properties of a system - then trouble threatens in conjunction with the identity of indiscernibles. If the content of supervenience claims makes appeal to the totality of an entity's physical/natural properties this compels us to consider maximal physical/natural descriptions. When we construe 'maximal description' widely so that it is indeed all of an entity's
physical/natural states that are specified in such a description then, notwithstanding difficulties about the intelligibility of such totalities, there is at least a threat that any maximal description will apply to, at most, one entity. Perhaps the threat can be averted (see below) but the situation is potentially dangerous. The thesis of independence (IND):

\[(\exists x)(\exists y)(B^*x \& B^*y \& A^*x \& \neg A^*y)\]

will turn out to be false (for any A, B) if B-indiscernibility is sufficient for (intra-world) identity i.e. if the thesis (=) holds

\[\square(x)(B^*x \rightarrow (y)(B^*y \rightarrow (y = x)))\]

By the same token, if (=) holds then this has the effect of rendering the thesis WEAK:

\[\square(\exists x)(B^*x \& A^*x) \rightarrow (y)(B^*y \rightarrow A^*y)]\]

trivially true. The question then is: how good is the claim (=) for a given B-family?

The question promises trouble. For one thing it depends upon the operant conception of the extent of B-reality: in particular whether B is being held to constitute a monistic basis of all that there is. Many authors have wanted to hold that physical descriptions are quite general in the sense that all that there is is physically describable - all of reality is physically realised - even though eschewing stronger theses of physicalism. There is no straight answer to the question of whether such monistic physicalists will count properties in such a way that all physical properties amounts to all properties.

If so, B-indiscernibility will collapse into indiscernibility tout court and the issues that arise will then be those that are familiar from the general discussion of the identity of indiscernibles. For example: can properties admit of purely qualitative individuation or need they be distinguished with the help of indexical resources? If not, and the monist is intent upon counting properties in such a way that there are more properties than there are physical properties, then this will involve appeal to some intentional or perhaps even modal distinction in order to make that case.

I do not intend to pursue the fine detail of these problems, but it is abundantly clear that insofar as these are genuine problems they are thoroughly exacerbated when the supervenient base under consideration is the totality of actual properties. The idea of a maximal actual description must bring in its
wake the strongest possible chance of entailing the uniqueness of the satisfier of the base description. Anyone who was worried that a genuinely maximal physical/natural specification entailed the trivial falsehood of IND (and the trivial truth of WEAK) could not be less worried by the prospect of invoking a maximal actual specification. Furthermore, at least one proposal that has been advanced in order to offset the threat of triviality has, disturbingly, no application to the modal case.

(7.31) NO RESPITE VIA A LIMITATION THESIS

Blackburn proposes a 'Limitation Thesis' in an attempt to obviate the collapse of supervenience theses into triviality. According to the Limitation thesis, there must be a specifiable limitation on the kind of B-properties that are involved in a base description. Thus he argues that the content of an agent's mental states at time t cannot be held to depend upon those physical properties of the agent by which relations to future, as yet non-existent, things are implicated; the moral properties of an agent cannot depend on the agent's absolute position of origin. In this way there is a chance that the circumscribed base description will be not be satisfied uniquely. The limitation thesis is not unproblematic, as even a cursory consideration of the examples shows, but what might its application in the case of modal supervenience amount to? It must surely be the claim that some specifiable actual properties of an object are totally irrelevant to what is modally true of it. Upon that basis we could exclude those properties from the intended scope of the B-description (as we might exclude absolute position of origin from our moral deliberations). It is by those means that we attempt painlessly to remove the threat of specifying (accidentally) all of an object's properties. But this manoeuvre will not succeed in the modal case, for given any property P of x, x's having P is relevant (logically sufficient) to its being possibly P and relevant (logically necessary) to its being necessarily P. The much weaker claim that some of an object's properties are irrelevant to some of its modal properties is thoroughly unexacting and it cannot serve the purpose for which the Limitation Thesis was designed.

Now, by way of a rejoinder, it is arguable that the difficulty that has been raised here is beside the point. The threat of trivialization arises only when a maximal actual description of an object is invoked whereas the supervenience claims
that McGinn has in mind are far more specific, relating a limited range of base properties to a limited range of associated properties. The claims are more akin to the localized claims of supervenience of, say, pain sensations on C-fibre states than to the grand claims of supervenience between families of properties viz: the mental on the physical; the moral on the natural. 28

Now, it is certainly true that McGinn does concentrate on the more limited claims; his strategy is to distinguish synthetic from analytic necessities and to formulate localized independence theses in each case.29 But even if we are to take a position on the individual dependencies irrespective of holistic dependence of the modal on the actual, a threat of "trivialization" still arises - albeit from a different source - along with other items of interest.

(7.4) SOME MODAL LOGICAL CONSEQUENCES OF APPLYING WEAK, STRONG AND IND IN THE MODAL CASE

McGinn, as we saw at (7.21), registers his opposition to independence in writing:

"....it is impossible that two objects be alike in their actual properties but differ in the modalities with which they instantiate those properties". 30 (My emphasis, J.D.)

Under a natural interpretation of this remark, we find that there are logical guarantees of the falsehood of the thesis of the independence of the possible from the actual, and of the truth of both weak and strong supervenience of the possible on the actual.

Let us take "O" to be a schematic marker for a specification of origin - to deploy McGinn's example - and "Σ " as a marker for a modal operator. The modal independence schema is (8):

(8)  <> (∃x)(∃y)(Ox & Oy & Σ(Ox) & ~Σ(Oy))

Instances of the independence thesis will be logically false and (since WEAK is equivalent to the negation of IND) instances of the weak supervenience thesis logically true when "Σ " is replaced by a possibility operator "◇ " as it is in the instance (9):

(9)  ◇(∃x)(∃y)(Ox & Oy & ◇(Ox) & ~◇(Oy))

One hesitates to pronounce these instances trivially false. Arguably the logical falsehood of these instances reveals something important about the nature of
modality, given the (alleged) general falsehood of modal independence claims. It should be noted that the strong supervenience of the possible on the actual, as well as the weak supervenience of the possible on the actual emerges as logically true. The modal strong supervenience schema - the parallel to the modal independence schema (8) - is (10):

\[ \Box (\exists x)(Ox \& \Sigma(Ox)) \rightarrow \Box (y)(Oy \rightarrow \Sigma(Oy)) \]

and its possibility operator instance (11):

\[ \Box (\exists x)(Ox \& \Diamond Ox) \rightarrow \Box (y)(Oy \rightarrow \Diamond Oy) \]

is logically true in virtue of the logical truth of its (necessitated) consequent. So the strong and therefore the weak supervenience of the possible on the actual are guaranteed logically.

The second point is that when we consider those independence theses which are the instances of (8) that result from the insertion of a necessity operator "\( \Box \) " i.e (12):

\[ \Diamond (\exists x)(\exists y)(Ox \& Oy \& \Box Ox \& \neg \Box Oy) \]

we find that the denial of independence is sufficient for strong supervenience, given the truth of independently credible essentialist claims.

To see this, consider the minimum commitment to supervenience (WEAK) that is entailed by the rejection of independence. This minimum commitment consists in the ban on mixed worlds, but it is distinguished from strong supervenience in being consistent with the claim that there are worlds in which all of the B* things are non A". In the modal case at hand, this 'difference' which is characteristic of weak-but-not-strong supervenience is captured by the thesis (13):

\[ \Diamond(x)(Ox \rightarrow \neg \Box (Ox)) \]

The characteristic claim then is that there could be (to persevere with McGinn's example) humans whose origin is such that they have developed (in a certain way) from gametes but only contingently so! Consequently, if claims of essentiality of origin (or kind, or composition) of the form (14):^31

\[ \Box (x)(Ox \rightarrow \Box (Ox)) \]

are accepted as true - and they should be - then the option of weak-but-not-strong supervenience is ruled out.
A DOUBT CONCERNING THE PLAUSIBILITY OF WEAK SUPERVENIENCE IN AN ANALYTIC CASE

The final point that will be made in connection with the application of supervenience theses to the modal/actual case concerns what McGinn dubs the "analytic necessities". At (7.21) his evaluation of the independence claims with respect to synthetic necessities was endorsed whole-heartedly, but the evaluation of the denial of independence in such instances proves less straightforward. Two examples of weakly supervening analytic necessities are offered. I will argue that while the first of these, (i), when qualified appropriately, is supportable, the second, (ii) presents a difficulty.

(i) "Two sentences could not agree in the actual meanings they have yet differ with respect to their necessity....."\(^{32}\)

We have seen enough already to appreciate the distinction between reading actual sameness in some respect as an intra-world as opposed to an inter-world relation. Let us first consider the intra-world comparison.

A source of confusion arises from the problematic interaction of modal vocabulary with semantic vocabulary.\(^{33}\) Accordingly it is helpful to introduce two further simplifying assumptions: (a) that claims of truth and (sameness of) meaning apply to sentences relativised to a language; (ii) that the claims made in respect of truth and (sameness of) meaning of sentences are relativised to the same language throughout and (iii) that if a sentence means in L that P at some world, then that sentence means in L that P in all possible worlds.\(^{34}\) These assumptions are necessary if we are to deflect speculation about such matters as the counterfactual variation in meaning of sentences that are actually synonymous and the counterfactual existence of distinct languages that actually co-exist. This paves the way for a precise statement of this application of the independence thesis:

\(15\) \(\diamond [\text{SYNONYMOUS ("S}_1";"S}_2","L) \& \text{TRUE ("}\square S}_1","L) \& \\
\quad \neg\text{TRUE ("}\square S}_2","L) ]\)

Independence then can be seen to amount to the claim that two sentences of L have the same actual meaning (in L) - and hence the same meaning in L at every world - yet at some world "S\(_1\)" is true in L and it is not the case that, at that same world, "S\(_2\)" is true in L. Once matters are posed in this way it does indeed seem that independence has no credibility. Certainly one might indulge in a
critique of the concept of synonymy, but if any conception of synonymy emerges from that process, it seems that it must be constrained by its consequences for sameness of truth value of synonymous sentences in the same world. Independence seems a violation of a condition which is partly constitutive of the concept of synonymy and so we can agree that the independence thesis as formulated above is false.35

(ii) ".... nor could two sentences of the same logical form whose logical constants have the same meaning differ with respect to the modality of their truth-value. "36

There is a good prima facie case in favour of the independence thesis here, for there are cases of sameness of logical form and apparent difference of modality of truth-value.

What is it for two sentences to "differ with respect to the modality of their truth-value"? Presumably that for some sentences "S1" and "S2" of L, and considering the necessity operator "□"37, we have:

\[(16) \; □ (\text{TRUE} ("S_1", L)) \& \sim □ (\text{TRUE} ("S_2", L))\]

Now by the accepted truth-theoretic axioms governing "□" and "~"38, (16) is equivalent to (17):

\[(17) \; \text{TRUE} ("[S_1", L) \& \sim\text{TRUE} ("□ S_2", L)\]

If "□" is understood as a metaphysical necessity operator then it is clear enough that the independence condition can be satisfied, viz:

\[(18) \; \text{TRUE} ("□ (x)(Hx \rightarrow □ Hx), L) \& \sim\text{TRUE} ("□ (x)(Px \rightarrow □ Px), L)\]

(Take the L predicates "Hx" and "Px" as having the senses of the respective English predicates "x is human" and "x is a postman".) Hence we have a case where "S1" and "S2" have the same logical form but differ with respect to the modality of their truth-values: the independence thesis so interpreted is true.

It might be mooted that this line of argument can be ruled out on the grounds that the author's intention was to deal with "analytic necessities" and not, therefore, metaphysical necessity. But what might these analytic necessities be? If "conceptual" necessity is at issue then (18) might still hold depending on how that notion is understood. If logical necessity is at issue then we have a problem.

If logical necessity is intended as a genuine object language modality requiring truth in all logically possible states of affairs then metaphysical necessity and
logical necessity are absolutely co-extensive. There are absolutely no possible worlds in which metaphysical necessities fail to obtain.\textsuperscript{39} To hold that the logically possible worlds are the metaphysically possible worlds is to hold that logical and metaphysical necessities are truth-relevantly univocal i.e. metaphysically modal operators can be re-interpreted as logically modal operators (or vice versa) \textit{salva veritate}. The essential difference between metaphysical and logical necessity will be, broadly, epistemological since it pertains to the kind of reason that we have in the respective instances for holding the exceptionless (strict/unrestricted) necessity to obtain. The consequence of the view that the metaphysically necessary is logically necessary (and vice versa) is that there are sentences of the same logical form whose logical constants have the same meaning but which differ with respect to the modality of their truth-value and, therefore, that the independence thesis obtains for logical necessity so understood.

If logical necessity is intended as a formal metalinguistic modality, such as Quinean logical truth, then we have a different consequence for independence. Quinean logical truths are all and only those sentences which are true under all normal re-interpretations of their non-logical constituent expressions.\textsuperscript{40} Consequently many metaphysical necessities are not logical truths in Quine's sense. However, it is obvious from the definition of Quinean logical truth that it is not possible that there could be sentences with the same logical form that differ with respect to their logical truth. Independence is false when the modality is logical necessity \textit{qua} logical truth but, it may be felt, trivially so. On the other hand the falsehood of independence here, as in the case of synthetic possibilities, may be construed as logically determined but substantive.

The upshot is that the evaluation of independence in the case of "logical necessity" yields conflicting verdicts once the notion of logical necessity is disambiguated and that this at least \textit{hinders} the repudiation of independence in this instance of analytic necessity.

(7.6) \textbf{ACCEPTANCE OF THE SUPERVENIENCE OF THE MODAL ON THE ACTUAL IS NOT SUFFICIENT FOR ANY INTERESTING MODAL REALISM.}

It is important to arrive at a conception of which are the important consequences
of this investigation into the application of supervenience theses in the modal/actual case. Let us assume that there is no insurmountable difficulty associated with the worries expressed at (7.30)/(7.31) - concerning trivialization as a consequence of unique satisfaction of base descriptions - and (7.5) - concerning the feasibility of an independence claim about logical necessity. This assumption allows us to concentrate upon the following substantive conclusions.

Firstly, the theses of the weak and the strong supervenience of the possible on the actual are logically true (7.4). Secondly, there is every reason to hold that the necessary is not independent from the actual and indeed that acceptance of this principle may be partially constitutive of competence with modal concepts (7.21). Thirdly, a class of popular and plausible first-order essentialist claims prove to be inconsistent with the thesis that the necessary stands in a relation of weak-but-not-strong-supervenience to the actual (7.4). The upshot is that strong supervenience of the modal (necessity and possibility) on the actual is secured by the combined constraints of norms of modal conceptual competence and independently plausible and relatively uncontroversial first-order essentialist claims.41

This result might be embraced by a theorist of McGinn's persuasion and construed as a vindication of modal realism qua supervenience without reduction, but my contention is that it has a different significance. The significance of the result is that the acceptance of supervenience without reduction cannot be regarded as sufficient for modal realism in any interesting sense. It is not sufficient for any interesting modal realism since it is necessary for any theory of modal concepts which accepts both that modality is what it is and not another thing (no reduction) and that entities which are actually alike with respect to the property \(\phi\) cannot differ with respect to the essentiality of their possession of \(\phi\) (no independence). One might wish to insist that any remotely plausible theory of modalty must be realist in this sense. This, it seems to me, would be disingenuous, but in any event it is clear that the interest of "modal realism" cannot lie in its identification with supervenience any more than it did in its identification with the repudiation of reduction.42 The lesson which is suggested by the consideration of reduction and now supervenience is that to locate a realist/anti-realist dispute about modality on the axis of
independence-supervenience(s)-reduction is simply to locate it on the wrong axis.

It would be useful if this case against the "realism-significance" of supervenience could be bolstered by an example of an avowed modal anti-realist (say a proponent of sceptical paradox and solution) who was also an avowed supervenience theorist. I know of no such example but there is an interesting comparison to be drawn.

In the case of moral realism the claim that the moral supervenes on the natural is taken by Blackburn as a fact whose explicability is a challenge to both realist and anti-realist alike. He writes:

"Supervenience claims are very popular in philosophy, because they promise some of the advantages of reduction... (b)ut the promise is slightly hollow: supervenience is usually quite uninteresting by itself. What is interesting is the reason why it holds." 43

So on this perspective the supervenience of the moral on the natural is no criterion of realism; it is a fait accompli, the explanation of which is a test of the relative merits of non-reductionist realist and anti-realist conceptions of the moral. To accept as a fait accompli and without further qualification the characterization of the relation between the modal and the actual as supervenience without reduction would be, as we shall see [Ch.8], to exhibit undue haste, but the general point is that insofar as the acceptance of this characterization requires only the simultaneous denial of reduction and independence it earns too easily a victory for "realism". To re-iterate the acknowledgement of the supervenience of the modal on the actual is not sufficient for any interesting modal realism.

This concludes the criticism of McGinn's deployment of the notion of supervenience in the attempt to develop a form of modal realism. However the application of the notion of supervenience to the modal case has a further dimension of interest which is of central importance to modal theorizing in general and to the third grade of modal realism that I will eventually discuss. This further dimension of interest of supervenience arises from the fact that the consideration of certain interpretations of the supervenience relation leads us to confront the issue of conceptualism about modality i.e. the issues of whether, or
which, purely conceptual sensitivities are involved in our judgements of modality. Chapter 8 is given over to these issues before the critique of McGinn's formulation of modal realism is resumed in Ch.9.
(8.0) INTRODUCTION

A further matter of crucial importance can be portrayed as an aspect of the project of formulating and applying theses of supervenience. Since theses of supervenience (and independence) are inherently modal, it is no surprise that it is important to establish the sort of modality (e.g. logical, metaphysical, conceptual, physical) by which a thesis of supervenience is being held to be governed. The general need to distinguish between metaphysical and conceptual varieties of supervenience arises because there are cases in which it may plausibly be claimed that a given family of associated properties is metaphysically but not conceptually supervenient upon a given base. In the present case McGinn's proposal is that the relation of the modal to the actual is that of supervenience without reduction and the question of which modality is being held to govern this supervenience claim is crucial. For when supervenience theses are interpreted as being governed by conceptual necessity, the matter of their truth generates what is perhaps the most fundamental question of modal epistemology i.e. whether modal truths are known by conceptual means alone. The first task in the process of investigation is to arrive at a firm conception of what a claim of supervenience without reduction amounts to.

(8.10) METAPHYSICAL SUPERVENIENCE WITHOUT REDUCTION IS UNTENABLE IN THE MODAL/ACTUAL CASE.

Blackburn and Kim formulate theses of supervenience without reduction which are equivalent to, in our terms, weak-but-not-strong supervenience. The intended content of this thesis is that there is a ban on mixed worlds but, further, that there is a world of the kind which strong supervenience cannot tolerate. This is to say that there are worlds in which there are B*-things all of which are A* and worlds in which there are B*-things all of which are non-A*. The most perspicuous formal representation of this state of affairs is as a conjunction of four conjuncts (SWR):
It has already been demonstrated [(7.4)] that the truth of the first-order essentialist claims of necessity of kind, composition and origin requires at least strong metaphysical supervenience of the modal on the actual. Evidently, then, metaphysical SWR is inconsistent with these first-order essentialist claims.\(^5\)

This fact narrows the options for the theorist (e.g. McGinn) who wishes to maintain a position of supervenience-without-reduction of the modal re the actual alongside the noted first-order claims of metaphysical necessity. On pain of inconsistency, such a theorist must endorse a non-metaphysical interpretation of the modality that governs the supervenience-without-reduction claim. This is, indeed, the combination of options that McGinn intends to advance since his first-order essentialism is advanced alongside frequent indications of a conceptual interpretation of the modality that governs his favoured thesis of supervenience without reduction. We are, therefore, directed towards the consideration of what a conceptual interpretation of SWR amounts to and whether its application to the modal/actual case is tenable.

(8.11) INTRODUCING CONCEPTUALISM: CONCEPTUAL (SWR) THESES CONTRASTED WITH CONCEPTUAL (NEC) THESES

Blackburn makes it abundantly clear that claims of SWR are inconsistent with claims of B*/A' necessity.\(^6\) The latter are formalized as the NEC theses:

\[
\text{(NEC)} \quad \Box(x)(B^*x \rightarrow A'x)
\]

The main interest of his discussion of conceptual SWR and of B*/A' (conceptual) necessity lies in the criterion which he associates with the truth of the latter. He endorses the conceptual supervenience of the moral on the natural and explains his opposition to theses of B*/A' necessity in that instance:

".....It does not seem a matter of conceptual or logical necessity that any given total natural state of a thing gives it any particular moral quality. For to tell which moral quality results from a given natural state means using standards whose correctness cannot be shown by conceptual means alone. It means moralizing and bad people moralize badly but need not be confused. "\(^7\)

This clearly suggests a general condition (C) on the truth of B*/A" conceptual
necessity claims, viz:

(C) A $B^*/A^*$ conceptual necessity claim is true only if one can tell which $A$-state results from a given $B$-state by using standards whose correctness can be shown by conceptual means alone.

Applying this, the condition of truth of the modal $B^*/A^*$ conceptual necessity claim is that one should be able to tell, by using standards whose correctness can be shown by conceptual means alone, which modal state (necessary F/contingent F) results from the given (actual) state F. My position will be that this condition is satisfied. Henceforth I shall use the term "conceptualism" to refer to the thesis that the standards of correctness (of truth) for metaphysically modal judgements can be shown by conceptual means alone. My defence of conceptualism will be developed in three stages. The first stage of this defence is offered in the remainder of this chapter, the second is offered in Chapter 9 and the final stage in Chapter 10.

(8.12) CONCEPTUALISM ACKNOWLEDGES A POSTERIORI NECESSITIES.

What would it be to deny conceptualism? It would be to claim that the truth of modal judgements cannot be shown by conceptual means alone, i.e. that some non-conceptual means are required in order to show that modal judgements are true. This, it should be noted, is not to be identified with the suicidal claim that only non-conceptual means are required. The latter claim would appear to depend not merely upon a faculty of modal "intuition" but upon a faculty of modal intuition that operated in the way that sensory perception was once supposed to i.e. in such a way as to present to us given facts without troubling our conceptual sensitivities.

The characteristic claim of the reasonable opponent of conceptualism, then, will be that something over and above our acknowledged conceptual awareness is efficacious in modal judgement. Just as non-conceptual sensitivities are required in moral judgement so non-conceptual sensitivities are required in modal judgement. In light of this characterization of reasonable oposition to conceptualism it is absolutely crucial to establish the intended scope of the conceptualist claim, for otherwise it can come to seem that the opponent of conceptualism must be correct given relatively innocuous essentialist
presumptions.

There is a sense in which it is clearly true that non-conceptual sensitivities are required in order to establish the truth of certain modal judgements, notably the *a posteriori* necessities. That is to say, it is clearly true that our judgement that Hesperus is necessarily identical to Phosphorus, or that any stuff that is not the element with atomic number 79 cannot be Gold, cannot be justified *solely* by conceptual means. Acknowledgement of this phenomenon is no admission of a source of counterexamples to conceptualism but it does force clarification of the intended scope of the conceptualist thesis.

The epistemological process which the conceptualist intends to address - and the proper analogue of Blackburn's moral example - is that wherein we judge whether an actual state of a thing is necessary or contingent *once we are aware of that actual state*. It has been noted that Kripke presents a typical *a posteriori* necessity ("□P") as the *modus ponens* conclusion of (i) an *a posteriori* and non-modal minor premise ("P") and (ii) an *a priori* and modal major premise ("P→ □ P"). We can articulate the present point in the context of the *modus ponens* representation of *a posteriori* modal knowledge in stating that it is neither the minor premise, nor the conclusion to which conceptualism speaks but to the modally efficacious and *a priori* major premise.

The proper question is whether non-conceptual sensitivities are required for the purposes of our deliberations in the transition from awareness of an actual state of a thing to awareness of the (non-)contingency of the thing's having that state. If the answer to that question is to be "yes", then the opponent of conceptualism can claim either that some familiar but non-conceptual sensitivity suffices to account for our modal beliefs, or that we require a special non-conceptual modal sensitivity or faculty. Thus the opponent of conceptualism appears to be faced with a choice between empiricism or platonism in the epistemology of modality and neither of these approaches is acceptable. I will explain how the conceptualist offers a viable alternative to these approaches in Ch.9 where I state my criticisms of McGinn's conception of modal epistemology. Meanwhile I will proceed with the development of a conceptualism that eschews the empiricist and platonist models of our sensitivity to modality.
I want to say that we should insist that all \textit{a priori} knowledge falls under the constraints imposed by conceptualism. Thus, conceptualism (as presently intended) about pure mathematics is quite in order. However I want to distance this conceptualism about the \textit{a priori} from various theses which may be purported to follow from it. There are many sources of criticism of the thought that \textit{a priori} knowledge in general, and modal knowledge in particular, can be established on the basis of conceptual sensitivities alone. In dealing with these, I hope to support my preferred brand of conceptualism by distancing it from a variety of (more broadly) conceptualist theses which I consider to be discredited. The three major difficulties that may be anticipated are unwanted associations with the univocity of \textit{a priori} knowledge \[(8.21)\]; the analyticity of modal claims \[(8.220)-(8.221)\]; and inappropriate standards of correctness in conceptually determined judgements \[(8.230)-(8.232)\].

\textbf{(8.21) THE UNIVOCITY OF A PRIORI KNOWLEDGE}

I do not intend to endorse the quite implausible claim that there is a homogeneous or univocal epistemology of the \textit{a priori}. The \textit{a priori} is not a recognitional capacity or faculty - \textit{a priority} is a predication that applies to recognitional capacities or to judgements arrived at by the exercise of such recognitional capacities. Different recognitional capacities are exercised in each of the following judgements: \textit{no person could have been an inanimate object}; \textit{the cube root of 1728 is 12}; \textit{all bachelors are male}. These judgements (or the capacities that give rise to them) are unified by their \textit{a priority} but it is quite clear that the kind of grounds that an individual has for asserting any one of these propositions is quite different from those pertaining to the assertion of any other. We should no more say that these judgements are the product of a single recognitional capacity in virtue of all being \textit{a priori} than we should say that the judgements: \textit{there are Wolves in France}; \textit{post-boxes in Britain are red} and \textit{Moses lived over two thousand years ago} are the product of a single recognitional capacity in virtue of the fact that they are all \textit{a posteriori}.

\textbf{(8.220) ANALYTICITY AS INDEFEASABILITY.}

Quine's "near as we can get" characterization of analyticity has it that a
sentence is analytic iff it commands assent *come what may*. Since it has been argued that Quine’s critique of the analytic/synthetic distinction is intended as a critique of the necessary/contingent distinction, and especially in the context of avowed conceptualism about modal claims, it seems natural to charge that the (conceptualist) necessitarian is open to whatever charges are appropriate to the proponent of analyticity.

The first point of note within this charge is the insinuated co-extensiveness of the necessary/contingent distinction with the defeasible/indefeasible distinction. We can remain agnostic on the issue of whether any statement (sentence?) is unrevisable and challenge this insinuation by pointing out that some of the strongest candidates for indefeasibility are uncontroversially (metaphysically) contingent by normal criteria e.g. *there are (timelessly) sentient beings*, *some surfaces are red*.

The second point is that we need not and should not moot (purported) necessity as a guarantor or even an accompaniment of indefeasibility. In order that this point be made clearly, it is important to tackle a potential source of confusion in the discussion of the analyticity of a purported necessity. Consider a claim of analyticity as it applies to a sentence of the form (1):

\[ \square (x)(Fx \rightarrow Gx) \]

where the modality is metaphysical. There are two questions that may be thought relevant to the matter of analyticity *qua* indefeasibility:

(i) Does the sentence inside the scope of the necessity operator have analytic status i.e. is the sentence "(x)(Fx \rightarrow Gx)" unrevisable?

(ii) Does the whole modalized sentence have analytic status i.e. is the sentence "\( \square (x)(Fx \rightarrow Gx) \)" unrevisable?

Clearly there is a genuine distinction here. Any grounds for the withdrawal of assent in the former case will be *a fortiori* grounds for the withdrawal of assent in the latter. However, withdrawal of assent in the latter case may be on grounds that require the repudiation of the necessity of the generalization but not its actual truth i.e. we may come to believe that a generalization previously held to be true and necessary is true and contingent.

The conceptualism that I wish to defend finds no difficulty in accepting *both* that many statements concerning the actual world, whose necessitations we currently endorse, could come to merit our dissent *and* that some statements
presently held to be necessary will come to be held only contingently true. Were we to resist either of these possibilities this would be tantamount to dismissing out of hand the view that our modal outlook was capable of improvement and susceptible to criticism and this, I say, we should not do. (See Ch.10).

(8.221) ANALYTICITY AS TRUTH IN VIRTUE OF MEANING ALONE
There is absolutely no reason why the conceptualism that is being proposed here should be identified with the view that claims of metaphysical necessity are true in virtue of meaning alone. Perhaps, as Wiggins suggests, we have greatest hope of generating these truths from artefact kind terms and other items that are subject to definition or a specification of nominal essence. Perhaps, as Putnam suggests, we should acknowledge a class of relatively trivial truths in virtue of meaning alone without reading into this the indefeasibility of cherished and entrenched statements of scientific theory. Perhaps, as Wright suggests, we must recognize as "a hard fact" that our linguistic training secures our assent to certain previously unencountered sentences without recourse to empirical investigation and view this as the basis of a category of truths in virtue of meaning alone. All of these lines are persuasive in their own way but I emphasize that conceptualism in the present sense does not depend upon establishing that there are truths in virtue of meaning alone. The conceptualism that I defend is not definition-oriented and consequently it can be explained why an interesting class of necessity statements are not "analytic" in another familiar sense of the term.

A relatively strict (Fregean) characterization has it that the analytic statements are those that can be derived from logical truths in conjunction with explicit definitions. But the terms that we would need to introduce into any such procedure in order to generate familiar essentialist claims, notably natural kind terms, are undefinable.

The position is then that although governed by the epistemological constraint of conceptualism - to tell which modal states result from a given natural state means using standards whose correctness can be shown by conceptual means alone - claims of metaphysical necessity are not analytic i.e. neither indefeasible nor true (if true) in virtue of meaning alone. Once we have eschewed the association of judgements whose standards of correctness can
be shown by conceptual means alone with analyticity, there seems to be no further obstacle to identifying the class of judgements characterized by the general conceptualist thesis with the class of a priori judgements. We can say that judgements of metaphysical necessity are, like mathematical judgements, synthetica priori claims.

(8.230) THE STANDARDS OF CORRECTNESS IN CONCEPTUAL JUDGEMENTS AND THE RULE-FOLLOWING CONSIDERATIONS

The question of the standard of correctness of modal judgements (construed a\ la conceptualism) will be raised in the context of Wittgenstein's problematic concerning what it is (correctly) to follow a rule.\(^\text{17}\) The rule-following problematic is invoked for two reasons. Firstly, because the theorist of metaphysical necessity cannot simply ignore the rule-following problematic given the implications it threatens for our thinking about the a priori quite generally and secondly, because by proceeding in this fashion we can shed light on the important matter of the degree of objectivity that is implied in the notion of standards of correctness that can be demonstrated by conceptual means alone. I will indicate [(8.231)] how judgements of metaphysical modality can be likened to instances of (maximally) pure rule-following and then I will discount several conceptions of the standard of correctness appropriate to such judgements [(8.232)]

(8.231) JUDGEMENTS OF METAPHYSICAL NECESSITY AS INSTANCES OF PURE RULE-FOLLOWING

Wright\(^\text{18}\) describes the correct application of a rule as a two-fold sensitivity involving: (i) sensitivity to relevant features of a presented situation and (ii) sensitivity to what - in respect of those features - will fit or fail to fit a rule. Even though actual rule-following, the production of "steps", involves the interaction of reactions of both kinds, it is (ii) that is the locus of interest in the rule-following considerations. These "R-informed" responses are those that are only possible for agents who have an inkling of the rule whilst the others are those that may be possible for other agents. In practice, the R-informed responses will not always be separable from the others given that the cognitive processes that
result in the production of a step may involve the "holistic interaction" of both kinds of response. However there are cases in which it seems that, at least to a very great extent, extricability is possible. Making a move in chess, it is argued, is one such case. Take the example of castling:

"Correctly castling in the course of a game of chess, for instance, will depend both on apprehension of the configuration of the chessmen at the time of the move [non R-informed - J.D.] and on a knowledge of whether the configuration (and the previous course of the game) permits castling at this point [R-informed - J.D]."

In such cases of extricability the output "step", Wright indicates, can be represented as the product of a modus ponens step given a major premise (R-informed) and a minor premise (non R-informed).

The canonical procedure for arriving at a posteriori judgements of metaphysical necessity is subject to illuminating (and slight) re-description in this light. We might say that, typically, a judgement of metaphysical necessity depends upon the exercise of two kinds of sensitivities that we have. There are those sensitivities which are operative in our judging that an individual indeed falls under a particular concept F and those which are involved in judging the modality with which that individual instantiates that concept. In practice there will be no question of separating the responses which relate to the application of the concept F from those which relate to the application of the modality. For example, it is arguable that someone who agrees with us in all judgements concerning whether a natural kind predicate "Px" is applicable to presented individuals but who lacks (somehow) the ability to respond as a modalizer has not in fact grasped our concept - for to grasp that concept is inter alia to understand that it is a natural kind concept and to grasp all the implications that this has for its application in counterfactual contexts etc. However, this does not stop us from wanting to distinguish in our own case, kinds of sensitivities which are at least salient at distinguishable "stages" of the procedure of modal judgement - hence the notion of the two-fold a priori/a posteriori canonical procedure.

Viewed in this way, an a priori major premise of the modal justification (2):

(2) \((x)(Px \rightarrow \Box MPx)\)

can be identified as encapsulating the R-informed judgement that instantiations
of the concept for which "P" stands are subject to the application of the rule of
metaphysical necessitation. This extricability from non-R-informed judgement is
a mark of a priority or, what is the same thing, the province of conceptualism.  
Insofar as we can liken the application of a metaphysical modality to a move
that depends only upon one kind of sensitivity - i.e. a purely conceptual,
rule-informed, modal response - we liken it to an instance of (maximally) pure
rule-following. This is to press further the conceptualist affinity of the
mathematical and the modal, for the classical case of knowing how to continue
an arithmetic series derives its special interest from its status as maximally pure
rule-following requiring essentially only knowledge of the preceding elements
of the series and knowledge of what the concepts require of us.

My point in instigating this comparison of modal and mathematical judgements
with respect to their status as instances of (maximally) pure rule-following is to
raise the question of the objectivity of the standard of correctness of modal
judgements. Since modal judgements have standards of correctness that can
be established by conceptual means alone and judgements that have
standards of correctness that can be established by conceptual means alone
are instances of pure rule-following we can regard modal judgements as
instances of pure rule-following. Then, finally, the standard of correctness that is
appropriate in modal judgements is set by the standard of correctness of
judgements of rule-following.

My hope is that it may prove possible to indicate a line of response to the
rule-following problematic that earns the modal conceptualist the right to
proceed unfettered by the suspicion that an unacceptable conception of what a
concept requires of us is being smuggled in among the conceptualist baggage.

However, the quest to understand the implications of Wittgenstein's
rule-following considerations is not so much a project that occupies
"post-analytic" philosophers as the paradigm within which they work. I do not
claim to do justice to these issues here, for they are simply too large to be
treated in the context of this thesis at the length they merit. However, by way of
a compromise between a full discussion and an embarrassing silence I will rely
(further) on the work of Crispin Wright in order to delineate the salient forms of
response to the rule-following problematic and then indicate the standing of
these lines of response to the conceptualism I wish to defend.
THREE UNACCEPTABLE CONCEPTIONS OF THE STANDARD
OF CORRECTNESS OF PURE RULE-FOLLOWING
JUDGEMENTS: QUIETISM, SCEPTICAL SOLUTION AND
PLATONISM.

I will deal, in all, with five responses to the rule-following problematic. Here I will
deal with the first three options and in Ch.10 I compare the two remaining
options and indicate which of these the most defensible version of modal
realism should incorporate. Of the five options it would seem that only three
(platonism and the two options of Ch.10) are consistent with any remotely
recognizably realist attitude to modality since only these entail that there is such
a standard of truth for judgements which are the products of pure rule-following.
Here I indicate briefly, my grounds for rejecting three kinds of response, i.e the
two recognizably non-realist responses of quietism and sceptical solution, as
well as the platonist response.

(a) Quietism

The first conception of rule-following that I wish to mention may be termed
"official Wittgensteinianism" or "quietism". The hallmark of this attitude is a
despair of constitutive questions i.e. the attitude that we must reject as improper
the question of what it is that makes it the case that a given step is a correct
application of a rule. The phenomenon that we purport to explain in pursuing
the constitutive question is the phenomenon of agreement in judgements and a
philosophical error is embodied in thinking that there can be any such
explanation. It is difficult to appreciate where acceptance of this view would
leave us, but it is difficult not to read into it an antipathy to the enterprise of
familiar philosophizing such as the present attempt to formulate and evaluate a
thesis of modal realism. I do not understand the consequences of quietist
acceptance well enough to see how to argue against it or indeed to see
whether there can be argument against it. The best that I can do is to register my
view that there is a point in pursuing constitutive questions and proceed
accordingly.

All of the remaining options - here and in Ch.10 - are those which consider
constitutive questions legitimate and offer some form of substantive responses
to the question of what it is that makes it the case that a given step is a correct
(b) Sceptical solution

First among the non-quietist options and second overall is the sceptical solution (a.k.a. "non-cognitivism"/"irrealism") i.e. the response of Kripke's Wittgenstein. The central features of this sceptical solution are: (i) that judgements concerning the application of a rule in a new case are evaluable in terms of assertibility not truth; (ii) that both the explanation of the point of invoking a distinction between correctly and erroneously applying a rule, and the assertibility conditions of claims concerning the correct application of a rule make essential reference to the community. A claim of the type \( x \) is following rule \( R \) (e.g. \( x \) means \( y \) in using \( z \)) is assertible whenever (roughly) \( x \)'s \( R \)-informed responses are in agreement with the responses of other members of the community and \( x \) can be trusted in his (or her) \( R \)-centred activities. The intention of this response is clearly to establish that nothing constitutes truth for claims that a rule is being followed and that in this respect these claims are to be contrasted with objective judgements.

I have explained elsewhere [Ch.6] my view that the thesis of semantic non-cognitivism ought to be separated from what is essential to a sceptical solution, namely non-descriptivism, and I have explained my view that the distinction between truth and assertibility that is sought in this context has not been substantiated. On this basis I would oppose the non-cognitivist component of the response of Kripke's Wittgenstein. This leaves open the question of the descriptive role of "claims" concerning what counts as following a rule and it is an important and difficult question. I will argue elsewhere [Ch.11] that the non-descriptive status of a class of claims cannot be established on the basis that the acceptance of the claims is associated with the acceptance of a commitment to act or think in a particular way nor on the basis that they have a normative role. Insofar as the case for the non-descriptive nature of rule-following claims depends on these considerations the arguments of Chapter 11 support a rejection of that case. Insofar as the case for non-descriptivism draws support outwith these considerations I have no argument to offer against it.

(c) Platonism

The first positive response to the question of what constitutes the truth of
judgements concerning the following of a rule, and the third response overall, is the Platonistic conception. This is the position which Wittgenstein clearly repudiates in his attack on the picture of *going on in the same way* in the application of a rule as a matter of cognizing a fact which obtains quite independently of any deliberations concerning the requirements of the rule. This is the objectivist picture that Wittgenstein articulates in the conception of "rules as rails" and I will proceed on the assumption that Wittgenstein's refutation of this objectivist syndrome is decisive. Consequently I have no interest in trying to earn a platonistic standard of correctness for modal judgements on the basis of platonistic standards of correctness in rule-following. I admit happily that a modal realism after this fashion would be wholly unacceptable.

In rejecting these unacceptable standards I am registering my conception of what acceptable (modal) conceptualism does not entail and this constitutes the last of the three clarifications of conceptualism that were announced as comprising the remaining work of this chapter. However, as yet there has been no claim concerning the standards of correctness of judgements which an acceptable conceptualism does incorporate. The two options that remain in the way of positive responses to the constitutive question, and which stand as candidates to sustain a realist and conceptualist conception of modality, will be considered in Ch.10 where I will attempt to show how the third style of modal realism that will be considered is not only consistent with, but draws support from, a considered response to Wittgenstein's rule-following considerations.

In Chapter 9, I return to the critique of McGinn's representation of modal realism and the development of conceptualism is continued in that context.
McGinn finds the thesis of supervenience without reduction congenial to his formulation of realism since supervenience leaves room for an epistemological asymmetry of base and associated properties. It does not follow from the fact that the A-truths supervene on the B-truths, and the fact that faculty X is appropriate to the cognition of B-states that faculty X is appropriate to the cognition of A-states. This asymmetry permits the claim that while the modal supervenes on the actual, the faculty whereby we cognize modalities may be problematic relative to those whereby we cognize actual states of affairs. McGinn construes the presence of such relatively problematic cognitive faculties as a signal of realism (in general), and he claims that cognition of modality is problematic relative to cognition of actual states of affairs. He argues convincingly that knowledge of modalities is non-empirical both relative to a crude (perceptibility) criterion of the empirical and relative to a more sophisticated criterion (i.e. empirical non-conservativeness in Field's sense). More specifically, modal knowledge is a priori and this is what its epistemologically problematic nature, and the crux of modal realism, consists in. A priori truths are characterized as those that may be known without any causal interaction with the subject matter of some justifying statement and the problem is, supposedly, that the only theory of knowledge that we have is one which explains our knowing in terms of causal interaction with appropriate subject matter. Modal knowledge is problematic because we cannot represent modal facts as causally explaining our knowledge of them and so we are confronted with a seemingly grim dilemma in the face of the desire to maintain that we have modal knowledge i.e. either we accept the possibility of non-causal influence on the mind or we give up the idea that knowledge results from what is known.

In order that we can be absolutely clear about McGinn's conception of the position in which the realist is left I will quote his final remarks at some length.

"...(M)odality is not perceptible: we cannot perceive modality (have
an 'impression' of necessity) because modal knowledge is a priori, and a priori knowledge is not, by definition, based on the kind of causal process involved in exercises of the faculty of perception but note that the definition of the a priori does not tell us how a priori knowledge is acquired: the characterisation is entirely negative. Of course names of appropriate a priori faculties are not far to seek: 'reason', 'intuition', and the like. But these do not afford any real hint as to the mechanism or mode of operation of the faculties denoted. The point can be put generally and intuitively as follows: our conception of knowledge - that is, of the relation between knowledge and reality - construes the state of knowing as somehow the effect of that which is known. Thus perceptual knowledge is our basic model of how knowledge comes about (the causal theory of knowledge is built upon this model): and we conceive of other kinds of knowledge - in memory or by induction - as approximating more or less closely to this model. But with a priori knowledge the model seems to break down altogether. Either we try to conceive of a non-causal mode of influence upon the knowing mind, which seems incoherent; or we decide to give up the idea that knowledge somehow results from what is known, which leaves us perplexed about what such knowledge consists in and in want of an alternative conception. ...The epistemological problem with modality is, then, that we cannot represent modal facts as causally explaining our knowledge of them. And the trouble with this is that we have no other going theory of knowledge. We thus reach the uncomfortable position of agreeing that there is a priori knowledge but not understanding how such knowledge comes about. And this, it seems to me, is the form that the problematic epistemology of modal realism takes. My own view is that we are here confronted by a genuine and intractible conflict between what our metaphysics demands and what our epistemology can allow. If modal realism is to be finally accepted, it must find some way of alleviating the conflict to which it gives rise."
The supervenience thesis in his hands amounts, as he recognizes, to no more than a denial of independence and when it comes to explaining how or why supervenience obtains, the theorizing peters out. He remarks:

"What is difficult, here as elsewhere, is to give an illuminating explication of the supervenience relation: to specify exactly how the statements in the domain of the relation determine the truth of statements in its range. Unfortunately, I have no very interesting suggestions to make along these lines: but, as Nagel says in another connection, one can know that something is true without yet knowing how it can be." 9

Now were we, somehow, sufficiently secure in the conviction that we indeed cognize modalities and had to hand a theory of how we know, the puzzle of supervenience might be (temporarily) tolerable, but the singular striking fact about modality is that neither a firm prior metaphysical conception of modal reality nor any familiar faculty or means of belief formation is available to provide a way of cantilevering the other. This paucity of explanatory or elucidatory content in the style of modal realism that McGinn develops is somewhat obscured by the discussion of a large number of related issues. But, in essence, the modal realist is being forced into a predicament in which it becomes obligatory to present an argument a la Moore10 (ethics) or Godel11 (mathematics) for a faculty of intuition. In Moore's argument for ethical intuitionism it is taken as a premise that we have moral knowledge, the further claim that this knowledge could not be the product of empirical recognition is then introduced in conjunction with the first premise to yield (by inference to the best explanation?) the conclusion that there is an efficacious but non-empirical faculty of moral cognition.12 Both Moore's ethical intuitionism and the 'modal intuitionism' towards which McGinn's realist is propelled are in clear respects challenges to a naturalistic conception of knowledge as, indeed, is Godel's (epistemological) intuitionism about mathematics. At least in mathematics there is a well-entrenched inclination to construe the relevant sector of reality as consisting in an array of abstract objects.13 The case of morality provides no such firm metaphysic but does yield, surely, a firm commitment that no special objects are implicated in the assumption that moral statements may be true. In the case of modality the nature of reality is sharply controversial. If we take the
objectual realist's standpoint then the temptation will be - and Lewis succumbs to this\textsuperscript{14} - to attempt to use this firm conception of the truth condition to dislodge a fully general causal condition on knowledge. The position in which McGinn's dialectic strands the non-objectual realist is one wherein the non-objectual realist is bound to attempt to dislodge the general causal condition on knowing on the basis of what is a far more slender metaphysic i.e. a modal reality which supervenes on the actual. I am not, of course, suggesting that the proper reaction to this comparison of objectual and non-objectual realism is to retract opposition to objectual realism about modality. However, we must, I think, acknowledge that an objectual realist such as Lewis comes off better than McGinn's non-objectual realist in at least having his metaphysics to comfort him.\textsuperscript{15}

In sum McGinn's realist will be left with no conception of how modal statements can be true or how these truths can be known and were we indeed compelled toward the position that this doubly binding sceptical paradox bequeaths us, a search for a sceptical solution would, I contend, seem a more fruitful endeavour than a blank insistence that modal truths are known. However, there is an alternative to McGinn's terminus and so the hopes for a tenable modal realism are yet alive. These hopes will be pursued and evaluated in the third and final section of the thesis but before pursuing that option it is necessary to undermine the epistemological dialectic which McGinn advances and which leads to the untenable position of sceptical paradox. This latter task will occupy the remainder of this chapter.

(9.20) **THE AIM OF REPRESENTING FACTS AS CAUSALLY EXPLAINING OUR KNOWLEDGE OF THEM IS ILL-CONCEIVED.**

McGinn's definitive statement of the epistemological problem with modality is as follows:

"....*(w)*e cannot represent modal facts as causally explaining our knowledge of them. And the trouble is that we seem to have no other going theory of knowledge. We thus reach the uncomfortable position of agreeing that there is a priori knowledge but not understanding how such knowledge comes about."\textsuperscript{16}

There would be a sharp problem for modal epistemology were it the case that
the enterprise of representing various realms of facts as causally explaining our knowledge of them had broad and successful application while modal knowledge, or indeed *a priori* knowledge in general, remained as a recalcitrant surd outwith the scope of that style of explanation. However, this scenario simply does not obtain.

There is a permanent temptation to construe all kinds of knowledge as instantiating the model of perceptual knowledge and, as McGinn himself indicates, the causal theory of knowledge is built on this model. Now given that the causal theory of knowledge is built on the perceptual model, it is not unreasonable to assume that we should reach the most favourable evaluation of its explanatory potential by considering its application in that sphere. By the lights of the causal theory, the problem with modal knowledge is that we cannot represent modal facts as causally explaining our knowledge of them. We should be able to improve our appreciation of the kind of illumination we thereby lack in the modal case by considering how we are able to represent perceptual facts as causally explaining our knowledge of them.

(9.21) **THE CAUSAL THEORY CANNOT EVEN ACCOMMODATE ALL OF PERCEPTUAL KNOWLEDGE.**

It is clearly the case that our perceptual mechanisms are appropriate objects of scientific study and that our perceptual states are accordingly susceptible to causal explanation. However, it is necessary to distinguish the *primary property* case from its *secondary property* counterpart with regard to the representation of facts in causal explanations of our knowledge of them, for in this matter primary properties occupy a unique position. The point is that the vocabulary of systematic and maximally accurate causal explanation is primary property vocabulary. As such, in the context of causal explanation of our primary property perceptual awareness, the description of the states of which we are aware is a representation of those states in homogeneous vocabulary. This is not the case when we turn to secondary property (say, colour) perception. Causal explanations of an agent's perception of the colour of a surface do not involve the description of the *cause* in secondary property vocabulary - they involve descriptions of surfaces in terms of the primary properties in virtue of which, we might say, the facts about its colour obtain. Consequently, we cannot say of
even "secondary property facts" that they can be represented as causally explaining our knowledge of them, and the point obtains with even greater strength in relation to all sorts of other facts our awareness of which would not normally be considered to be a priori, such as the states of mind of others, the cruelty of an action. No doubt some may balk at the very idea that such states should be counted as facts, but no dispute over the scope of the factual should be permitted to detract from the application of the present point to the paradigmatically (for standard empiricism) factual secondary properties.

A further important point has to be made in connection with the idea that we can provide causal explanations of perceptual knowledge. What was referred to in the previous paragraph were causal explanations of perceptual experience and while intimately related to perceptual belief (and knowledge), perceptual experience must be distinguished from perceptual belief. Clearly we want to distinguish categorically intentional (propositional) content from phenomenal (experiential) content on general grounds. But even in the case of perceptual knowledge were we can expect the closest of connections between phenomenal content (experiences of redness) and the intentional content of judgements (believing that x is red) we need to be clear that perceptual experience stands in no constitutive or direct relation to perceptual belief (or knowledge). We might say that at best the phenomenal content of an agent's perceptual states fixes the content of belief concerning the apparent colour of a surface. But this belief will then be integrated in the holistic network of the totality of the agent's attitudes and then the agent may judge - in aiming at the truth - that x is orange given background beliefs to that lead him or her to introduce some compensatory or corrective component in the judgement of the colour of x.

The considerations raised in the last two paragraphs have been developed in the context of the purported bastion of the causal theory of knowledge i.e. perception. They have related to non-inferential knowledge and scenarios in which the known fact is relatively comfortably construed as constituted by, or true in virtue of a locatable and neatly packaged complex physical state. In sum, we have considered conditions which are most favourable to the causal theory of knowledge and we still find that we have had to qualify in fundamental ways the claim that, in these instances, we can represent the facts as causally...
explaining our knowledge of them. This should lead us to be extremely guarded in our acceptance of the claim that our best (only?) going theory of knowledge is based on the idea that, in general, we can represent facts of a given kind as causally explaining our knowledge of them.

(9.22) **ALL STATES OF MIND ARE CAUSED BUT THE HOPE OF CAUSAL EXPLANATIONS OF KNOWLEDGE IS FORLORN.**

What, then, can be said about the role of causal relations between the agent and the world in the acquisition of knowledge?

Any moderately naturalistic response to this question will take off from the commitment that there cannot be (in McGinn's phrase) "non-causal influence on the knowing mind" if this is taken to mean that there are (physically realized) states of the mind that are not the product of causal processes. However, there is every reason to believe that it is a forlorn hope that we can have causal accounts of the ontogeny of intentional states - (x believes that P being an instance of a general case) - that are anything other than rough, schematic, to a large extent ad hoc and confined to individual agents. For even if it proved possible to characterize in "complete" detail the physical processes of "organism-environment interaction" there are considerations from every angle that obviate the prospects of whipping up an explanatory theory of knowledge on this basis.

(a) The putative causes (i.e. the facts) are liable to be physically heterogeneous. There is no reason to expect that, even if there are such things, the physical complexes that constitute the satisfaction conditions of "x is $\varphi$", will constitute a physical kind for any but a very few substituends of $\varphi$. (Consider the substituends "French","courageous","a chair","late").

(b) The causal routes from facts to head are equally likely to be physically disparate. Many different cocktails of perception, inference and communication can be expected to apply across cases in which agents have the true belief that London is in England.

(c) The putative effects (i.e. states of agents in which the relevant propositional attitude (network) is realized) are likely to prove physically heterogeneous. Again there is no reason to expect, far less insist, that two individuals of whom the same (type) total intentional description is true will be of the same physical
The arguments against the thesis that we can represent facts as causally explaining our knowledge of them are familiar enough and I will not pursue their elaboration here.19

(9.3) A PRIORITY AND THE DISTINCT PROBLEMS OF THE OBJECTUAL AND NON-OBJECTUAL MODAL REALIST

There are more and less far-reaching conclusions that one might be tempted to draw from the acceptance of the critique of the causal explanation strategy in epistemology. It may seem a natural step to proceed boldly to the conclusion that there is no special problem for the epistemology of modality: we cannot represent modal or any other facts as causally explaining our knowledge of them. While the latter claim may well be true I agree with McGinn that special difficulties arise for our purported knowledge of modality and moreover that these trace to a priority, but I disagree with him as to the nature of the problem that the a priori presents.

According to McGinn, the hallmark of a priori truths, and the fact that makes them a genuine source of epistemological perplexity, is that they can be known without causal interaction with the subject matter of some justifying statement.20 This view of the problematic nature of the a priori would be more appropriate if we were dealing with a conception of the facts - the subject matter of justifying statements - that renders them incapable of standing in any causal relation to the "knowing" agent. Such a conception of the facts in the modal case is characteristic of the genuine objectual modal realist,21 but, surprisingly, McGinn gives the impression that the same kind of problem with respect to causation is common to objectual and non-objectual realist alike. In the context of his critique of Lewis's objectual realism and having introduced how the causal isolation of other worlds gives rise to the objection that nothing can be known about them, he continues:

"The general point here is that we cannot get into epistemic contact with entities so remote from the sphere of actuality in which we are condemned to toil."22

Quite! But he then voices a doubt about the dialectical power of this point against objectual modal realism "alone," since... // (OVER)
"... modality gives rise to such epistemological problems even when non-objectually construed; so the underlying difficulty is not escaped by abolishing the worlds."\(^{23}\)

This is surely wrong, for as long as we make no ontological commitment to *possibilia* the states of affairs in virtue of which (actual) things have their properties essentially, accidentally, or whatever are not isolated from us in the way that possibilia are supposed to be and this is an important difference. It is important because the kind of problem that is generated for modal epistemology is now seen to be quite unlike that facing the number-theoretic platonist and more like that facing the moral realist. The loci of values and modalities are uncontroversially here and causally efficacious - it is the apparent strangeness of the states and not the accessibility of the entities that are in the states that is the source of puzzlement. However, once we take the view that this fact - i.e. that these states of things cannot be represented as causally explaining our knowledge of them - does not amount to any *strangeness*, we will be left awaiting an account of what other considerations might be thought to stand in the way of our treating them as genuine features of the world. This and related matters will occupy centre-stage shortly but I will end this discussion by returning to McGinn's dilemma of *a priori* in order to offer a conceptualist response and to indicate an alternative conception of what it is that the problematic nature of the *a priori* does consist in.

(9.40) **THE DILEMMA OF A PRIORITY - A CONCEPTUALIST RESPONSE**

The supposed dilemma of *a priori* is this:

"...*(w)*ith a *priori* knowledge the model seems to break down altogether. Either we try to conceive of a non-causal mode of influence upon the knowing mind, which seems incoherent; or we decide to give up the idea that knowledge somehow results from what is known, which leaves us perplexed about what such knowledge consists in and in want of an alternative conception."\(^{24}\)

The conceptualist\(^{25}\) will respond to this challenge directly.

*A priori* knowledge is conceptual knowledge. Conceptual knowledge does not emerge as the product of a non-causal influence on the knowing mind - the conceptualist can freely admit that the complex processes that constitute an
individual's acquisition of concepts and reflection concerning the compliants of those concepts are processes that are under appropriate descriptions covered by causal explanation. The acquisition of a concept is not a non-causal process - it is not an exercise of platonic intuition. This much can be accepted without claiming either (i) that there is always a general and non-trivial causal characterization of all of the instances of a concept $F$; or further (ii) that there is always a causal characterization of all of the instances of $F$ which can in turn sustain a general causal characterization of the process which constitutes the acquisition of the concept $F$ on the part of all relevant agents; or yet further (iii) that we can expect a general causal characterization of the process whereby the acquisition of the concept $F$ gives rise to the formation of modal beliefs of the type that it is not possible that anything that is $F$ could not have been non-$F$.

It will be clear from the foregoing that the conceptualist will not be impaled on the other horn of the dilemma either. It is quite acceptable to insist in the case of synthetic metaphysical necessities at least that knowledge does "somehow result from what is known" i.e from that which one's modal knowledge is knowledge of. Some might even want to go so far as to insist that in order to have acquired at least certain concepts (natural kind concepts) one must have appropriate causal connections to individuals that fall under that concept.

Given this view, and the further assumption that acquisition of these concepts is a necessary condition of having certain items of modal knowledge, we have to hand a representation - albeit a highly schematic representation - of how modal knowledge concerning, say, horses does, or indeed must, result from what the knowledge is of i.e. horses.

(9.41) HOW TO AFFIRM A PRIORI KNOWLEDGE AND EVADE THE DILEMMA

How does the conceptualist manage to accept both of these claims in conjunction with the claim that there is a priori knowledge? The answer is that McGinn is wrong in thinking that the existence of a priori knowledge implies the truth of at least one of the horns of his dilemma.

The dilemma of a priori is supposed to arise from McGinn's characterization of a priori truths as those for which knowledge does not require causal interaction with the subject matter of some justifying statement. This characterization is illuminating and intuitively appealing and there are no
obvious grounds on which to base its rejection. In these circumstances it is appropriate to accept the propriety of the characterization and to work within that constraint i.e to accept the thesis (T) on a priority:

\[(T) \text{ From the assumption that there is a priori knowledge it follows that it is possible that some } X \text{ can know that } P \text{ while } X \text{ does not interact causally with the subject matter of any statement } J_1, J_2, \ldots, J_n \text{ that is a justifying statement of } P.\]

McGinn takes (T) to imply either that the subject matter of the $J_i$ must influence the mind of $X$ by a means other than by causal interaction or that the knowledge that $P$ does not (not causally, not non-causally) result from what is known. However, it can be shown that there are clearly other possibilities that entail that there can be a priori knowledge and which are consistent with the falsehood of both of the disjuncts that are the horns of McGinn's dilemma.

The first of these is that a knowledge claim may be inferentially primitive i.e. there may no justifying statements that stand in a relation of inferential support to the knowledge claim. Then, since there are no justifying statements there can be no causal interaction with the subject matter of a justifying statement and the putative knowledge will be a priori by McGinn's characterization.

We clearly cannot accept that just any knowledge that is not appropriately represented as the product of inferential justification should count as a priori. Accordingly, this possibility indicates that McGinn's formulation will have to be amended or at least understood as being governed by an interpretative convention. The convention would be that the justifying statements of a knowledge claim $P$ should be understood to include $P$ itself. In that way we can exclude from the realm of a priority those knowledge claims which are themselves intuitively a posteriori but are not happily viewed as the product of inferences - e.g. there is a cup in front of me.

The second possibility is that the content of justifying statements of an item of knowledge may be such that their subject matter may not be capable of causal agency.

One way in which this can arise is if the subject matter of the statements includes particulars that cannot influence us causally (numbers, possibilia) and in such instances one seems compelled to grasp the non-causal influence on the mind horn of McGinn's dilemma. Another way that this possibility can arise
is if the subject matter of the justifying statements is non-particular, for it seems that only particulars are the sorts of things that can be causally efficacious - that can be causes.

This kind of consideration is familiar from the general discussion of the causal theory of knowledge. A crude causal condition on knowing has it that the state of knowledge is caused by the state of affairs that it is knowledge of. But as the case of universal generalizations (in particular) attests there are some "states of affairs" that are not happily viewed as potential causes of anything due to their spatio-temporal disparity - all of the world's hydrogen cannot cause anything. A correlative characterization of a priori knowledge would have it that an a priori truth is one that can be known without causal interaction between agent and the subject matter of the truth. This would be a poor characterization since it at least runs the risk of rendering all knowledge of universal generalizations a priori. (Arguably it has the same effect on a variety of knowledge claims concerning the future and which we would normally have no hesitation in deeming a posteriori.) The risk arises from an ambiguity in the characterization. The condition of possible absence of causal interaction between agent and subject matter of the statement might be read as interaction between agent and some of the subject matter, or, between agent and all of the subject matter. Clearly, for many universal generalizations the latter will be impossible.

Knowledge of universal generalizations, then, will be a priori either if the premisses from which it is inferred are not themselves suitable causes or if the knowledge is inferentially primitive. So, if knowledge of modal universal generalizations fits either of these epistemological profiles its a priority can be acknowledged without running foul of McGinn's dilemma. Furthermore, if either profile is appropriate then we are in a position to say that what is significant about a priori knowledge is that it is canonically universal knowledge (c.f. Kant) which is not supported by justifying statements that concern particulars. From an empiricist perspective the problem of a priori knowledge is that it is general knowledge of universal generalizations that is not the result of an inference from (knowledge of) particular instances.
Before moving to the defence of this conception of a priori knowledge as essentially universal, I will make a final remark on the role of causal conditions in epistemological theorizing. The upshot of my arguments is that we have arrived at the following statement (A) of what is distinctive and potentially problematic about a priori knowledge:

(A) A priori knowledge is general knowledge - (of universal generalizations) - that is not the result of an inference from (knowledge of) particular instances.

This statement is genuinely epistemological. By this I mean that the statement deploys the normative epistemic concept of justification and this normativity seems to me to be essential to epistemology. It is quite proper to temper epistemological theorizing with naturalistic constraints. All thought, I am prepared to say, gets into the head as the result of causal interaction between the agent (with all that is already in the head) and the (social and physical) environment in which the agent is located. This constraint is not empty, for it poses prima facie difficulties for any view of our cognition of reality which has it that we can have knowledge of, more generally thoughts about, entities with which we can have no causal interaction (abstract objects, possible worlds). Furthermore it may be proper, on occasion, to invoke causal requirements as necessary conditions of an agent's knowing that P, but these are invariably normative requirements. We might require that an agent stand in an appropriate causal relation to something or some event in order that an ascription of knowledge is merited. But it is quite another thing to fancy that in epistemology we are, or ought to be, aiming for non-normative causal conditions that are sufficient for knowing that P. The point is not merely that no generalizable, non-trivial formulation of such conditions for a reasonable variety of propositions is not even remotely likely. It is that even if it were (perhaps per impossible), merely causal explanations of how an agent came to form the belief that P, causal explanations of how that thought was elicited in the agent, cannot hope to fill the scope of our epistemological interests.

I now return to the issue of the justification of universally general a priori knowledge.
The pattern of justification for claims of \textit{a posteriori} necessity that has been endorsed is one whereby a \textit{modus ponens} inference yields a modal conclusion based upon a modal major premise and a non-modal minor premise. Our epistemological concerns are focused upon those modal conditional statements that function as major premises.

My first claim is that when such a conditional is a universally generalized conditional as in the inferences (1) or (2):

\begin{align*}
(1) \quad & (x)[Fx \rightarrow \Box(Fx)], \, Fa \vdash \BoxFa \\
(2) \quad & (x)[Fx \rightarrow \Box(Fx)], \, (\exists x)(Fx) \vdash (\exists x)(\Box Fx)
\end{align*}

it is to be treated as primitive \textit{in the sense of being subject to no justification on the basis of particular instances}. I do not expect this claim to be controversial since there is no plausibility in the idea that the universally general conditional is a conclusion of an \textit{enumerative induction} nor in the idea that some sort of ordering is available to ground a \textit{mathematical induction} here. No other candidate mode of inference from particular instances suggests itself.

My second claim is more problematic. It is that when the conditional is \textit{about} a particular, as in the inference (3):

\begin{align*}
(3) \quad & Fa \rightarrow \Box Fa, \, Fa \vdash \Box Fa
\end{align*}

it should be treated as a consequence (an instance) of its universal generalization. Now the singular conditionals are obviously \textit{logical} consequences of the universal generalizations, but the case must be made for the claim that the universal generalizations have \textit{epistemic priority} over the singular conditionals. If this case is to be made plausible we must take account of an important objection against it.

\textbf{(9.61) KANT'S THESIS, DANCY'S OBJECTION AND A REPLY TO THE OBJECTION.}

Dancy argues that there can be \textit{a priori} knowledge of particulars that is not dependent upon knowledge of a corresponding universal generalization and, in so doing, he takes himself to be arguing \textit{against} a Kantian thesis i.e. that there can be no \textit{a priori} knowledge of particulars. Given an obvious qualification of this thesis to allow that there can be \textit{a priori} knowledge of particulars as a result of inference from universal generalizations, I say that we should embrace the Kantian thesis. Accordingly it is necessary to deal with a purported example
of *a priori* knowledge that is non-derivatively of particulars.

Dancy draws attention to Kripke's famous lectern. The justification of the essentialist claim that the lectern could not have been made of ice utilizes the conditional (4):

\[(4) \Box (\text{Lectern } t \text{ is made of wood} \rightarrow \Box \sim (\text{Lectern } t \text{ is made of ice}))\]

This, it is argued, is *a priori*, concerns a particular and *need not* have been arrived at as a consequence of an inference from a corresponding universal conditional. Hence Kant's thesis is false since there *is a priori* knowledge of particulars.

Interestingly, there is some evidence that Dancy is not altogether happy with his own treatment of the example. He admits that the patent connection between acceptance of the essentialist claim in this particular case and the acceptance of its universal generalization may well incline us to say that ...

"...the particular truth was, in a sense, a consequence of the universal truth ".

This inclination is, in my view, nothing less than an (appropriate) inclination to treat the singular knowledge concerning Kripke's lectern as an *inferential* consequence of the universal generalization and thereby to affirm the epistemological priority of the universal generalization. But Dancy does not accept this.

His way of dealing with the difficulty is to attempt to convince the reader of the epistemological priority of the particular knowledge by emphasizing that *that very lectern* has a role in the (causal) history of the item of modal knowledge had by a typical member of Kripke's audience. I will argue that these considerations should not persuade us to desert the inclination that the knowledge is primitively general.

Let us assume that as a matter of fact a particular lectern elicits (and features in causal explanations of) those thoughts that constitute an agent's reflective deliberation about the composition and origin of lecterns and the essentiality or contingency of their properties. This assumption does not entail that the content(s) of the individual's proximal lectern thought(s) are thereby fixed as being of that particular lectern. This is not to deny that such a causal factor can be decisive in the determination of the content of a thought when the issue is one of *which particular* a thought is about, but the present case is not of that
kind. Let us grant that if a member of Kripke’s audience is having thoughts about a particular lectern then the thoughts are about *that* particular lectern. My point is that we need not and, indeed, *should* not represent the members of the audience as indulging in any modal reasoning involving thoughts whose content is such that they are *of*, or about, a particular. For, surely, it is possible that a perceptual encounter with a particular object (an X) should cause in the perceiver X-thoughts that are not about that (or any) particular X and if this is accepted, it should be further accepted that the mere fact that that lectern has a causal role in the genesis of an agent’s thought cannot exclude the possibility that the agent’s lectern thoughts concern the artefact kind lectern, an arbitrary lectern or lecterns in general.

The foregoing explains why we *need not* ascribe to the typical member of the audience thoughts about that particular table in the characterization of their modal deliberations, but why should we take the view that we *should not* ascribe such thoughts to the agents in this context? Dancy’s argument does not succeed in establishing that we have, in cases of this kind, counter-examples to Kant’s thesis but we are still in need of an alternative account of what is going on in cases such as that of the lectern.

(9.70) **UNIVERSALLY GENERAL MODAL KNOWLEDGE AS INFERENTIALLY PRIMITIVE KNOWLEDGE**

We still have the option of maintaining that modal universal generalizations are inferentially primitive i.e. that they are not happily or satisfactorily viewed as the product of any canonical inferential procedure. On balance it seems that this remaining option is the one that merges best with conceptualism about necessity.

To opt for the view that knowledge of modal universal generalizations are *inferentially* primitive is not to say that they are insusceptible to justification. Moreover, it is certainly not the case that it would be acceptable simply to insist that we have such knowledge while abrogating all responsibility for the defence of that claim. Here the conceptualist has the advantage of being able to take recourse to a theory of concepts (or conceptual content) in order to provide a needed explanation of our right to claim modal knowledge at all. The conceptualist is not like the (epistemological) intuitionist whose position is
simply an insistence that we have a faculty of modal knowing - a position which collapses into an enforced silence at the first probings of its content.  

The major point is that a conceptualist style of justification is not best served by submitting to the constraint of having to represent modal knowledge as an inferential consequence of premises about concepts. To show that there is modal knowledge that is not the inferential consequence of premises about concepts it would have to be shown both that modal claims can be items of knowledge and that modal knowledge claims are subject to a non-trivial but non-inferential justification. The former question coincides with the final important question that this thesis attempts to deal with and the latter depends upon a more general picture of the role of metaphysical necessity in our cognitive procedures. These matters will be aired in Ch.11 and in Ch.12 respectively.

(9.71) A FINAL REMARK ON McGINN'S CONCEPTION OF THE EPISTEMOLOGICAL COMMITMENTS OF MODAL REALISM.

I am now in a position to enter a final remark relating to McGinn's conception of the epistemological commitments of the modal realist.

It was pointed out in the original summary of McGinn's case that he rejected what he saw to be too narrow a formulation of (generalized) realism. The problem was that while indeed in certain cases the realist was committed to a view of knowledge as "mediated by a problematic inference" from statements of the evidence class to statements of the given class, this epistemological profile of realism does not cover all cases. In particular, in the modal case...

".. it is not that we have a clear idea of the mechanism of operation of the faculty but worry that it cannot reach far enough; rather, it is obscure what it would be for the alleged faculty to yield cognitive states consisting in a knowledge of the realist's truth conditions - so with (e.g.) abstract objects and ethical values. (As I shall later suggest, this difference turns upon the role of causation in the operation of the faculty.)"  

My position vis a vis McGinn's understanding of the issue can be put as follows. He is right about purported modal knowledge not being rendered problematic because it is mediated by a problematic inference, but to this the conceptualism
that I have promoted allows us to add that this is in a sense no surprise since modal knowledge is not (canonically) mediated by inference at all. However (i) the consequence of this anti-inferential stance need not be not intuitionism and (ii) the problems concerning the role of causation in the processes of our forming modal beliefs concerning abstract objects and ethical values respectively are quite distinct and modal knowledge of actual things is in this respect like knowledge of values and not like knowledge of abstract objects. This limited region of comparability of the modal with the moral will be expanded in order to provide the third and final conception of modal realism.

This concludes my critique of the second (i.e. McGinn's) conception of modal realism and I now turn, in section three to the last conception of modal realism to be considered.
INTRODUCTION TO SECTION THREE: SECONDARY MODAL REALISM

The modal realisms of Lewis and McGinn have proved indefensible. It is the aim of the third and final section of this thesis to develop and evaluate a third conception of modal realism. As I indicated at the end of Ch.9, the idea which underlies the notion of a third modal realism is the analogy with moral realism. It is my hope that the ever more sophisticated discussion of moral realism can help us to gain badly needed insight in the modal arena. In order that the analogy between moral and modal realism might start at reasonable odds I invite the reader to consider several aspects of the modal case that have been encountered or established in the pursuit thus far and which bear important similarities to the moral case:

1. Realism about moral values is not best seen as an objectual/existential thesis concerning the (nature or) reality of a class of entities. (Modal comparison - hereafter MC - Ch.1-5)

2. The case of values is such that the 'potential reductive class' (purely naturalistic statements) does not stand in a relation of evidential base to a seemingly inferentially distant given class. (MC - Ch.6)

3. One variety of moral realism (intuitionism) defends the thesis that we have a cognitive faculty which explains our ability to detect values somehow located in the world. (MC - Ch.9)

4. [As a consequence of (2) and (3)] we have a moral realism which exhibits the pattern of denial of recognition transcendence alongside acceptance of a problematic cognitive faculty. (MC - Ch.6)

5. The Humean account renders moral evaluation as an exercise of feeling (as opposed to cognition) and hence semantical non-cognitivism about moral statements is proposed as a consequence of the aetiology of evaluative psychological states. (MC - Ch.6)

6. Moral realism is constrained by the denial of the independence of the moral from the natural. (MC - Ch.7)

McDowell has been influential in promoting a view of realism that begins with the repudiation of the kind of perspective on moral reality and epistemology that McGinn offers us in the modal case. McDowell claims that the primary quality
model of moral reality turns the epistemology of value into "mere mystification" and that on such a model...

"... it seems that we need to postulate a faculty - 'intuition' - about which all that can be said is that it makes us aware of objective rational [moral J.D.] connections: the model itself ensures that there is nothing helpful to say about how such a faculty might work, or why its deliverances might deserve to count as knowledge."

This diagnosis of the defects of the primary quality model of moral reality fits perfectly the brand of non-objectual realism that we have encountered. McGinn has given us no reason whatsoever to suppose that the deliverances of our modal 'sensitivity' deserve to count as knowledge. In the face of the historical preponderance of modal anti-realism towards sceptical solution and the epistemological impasse which he offers us this is unforgivable. The only hope for realism in modality is that it may evolve a form that transcends the brute assertion of our cognition of an objective modal reality. My proposal is that we should look to McDowell's secondary quality realism (hereafter secondary realism) as a means of liberating modal realism from the sceptical paradox in which it has become ensnared.

The need to move away from a primary property model of the reality of moral values is occasioned by a variety of factors (to be discussed) including the anthropocentric nature of evaluation, the role of evaluations in guiding action and the style of explanation that is appropriate to the operation of our sensitivity to values. McDowell's secondary realism about values is an attempt to maintain a conception of values as in the world as genuine properties of things and, correlatively, of evaluative statements as potentially true descriptions of reality and that while acknowledging that values bear a special relation to the sensitivities and interests of creatures such as ourselves.

My claim is that the anthropocentric traits of modalizing render a primary realism (such as McGinn's) as inappropriate in the modal case as it is in the case of the evaluative. Accordingly, it will be essential to the prospects of modal realism (and of general interest) to attempt to develop and evaluate a secondary modal realism. In Ch.10, I will argue that anthropocentricity and not perceptibility (in any literal sense) is the feature of paradigmatic secondary properties which is an appropriately generalizable feature of secondary realism and that a proper
conception of the standard of correctness for secondary property judgments facilitates the extrapolation of that standard to the cases of moral and modal judgement. In Ch. 11, I will argue that statements of metaphysical necessity - like statements of logical necessity and statements of moral evaluation - are statements which have an expressive role and whose acceptance is related constitutively to certain courses of conduct. Following an attempt to outline the nature of the commitment that is expressed in a claim of metaphysical necessity, I argue that the only recourse for modal realism is to accept the descriptive/non-descriptive duality of the role of these modal claims. In Ch. 12, I gauge the degree of departure from more traditional realist themes to which the secondary modal realist is committed while emphasizing the contrast between secondary modal realism and sophisticated anti-realism in the form of Blackburn's quasi-realistic projectivism. I argue that modal parallels of those arguments which Blackburn deploys in an attempt to establish the superiority of projectivism over realism in the moral case either fail outright or succeed against the target they characterize but remain irrelevant to secondary modal realism as developed here. The final task of that chapter, and of this thesis, is to point the way towards the difficulties which are likely to be encountered in an attempt to defend the secondary modal realist strategy which has been initiated in the foregoing chapters.
CHAPTER 10
SECONDARY REALISM (I): ANTHROPOCENTRICITY, GENUINE PROPERTIES AND THE CONSENSUAL STANDARD OF TRUTH

(10.0) INTRODUCTION
In this chapter I will confront three issues which are relevant to the clarification of what the content of a secondary realism (in general) is intended to be and I will develop the case for a construal of modality in these secondary realist ways. In the first place I will develop the conception that anthropocentricity, as opposed in particular to perceptibility, is an aspect of secondary properties the secondary realist intends to extrapolate to the modal case. [(10.10)-(10.13)] In the second place I will begin to develop a conception of what it is for secondary properties to be genuinely in the world with a view to generalizing this criterion of genuineness to modalities. [(10.20)] Thirdly, and in the context of this second objective, I will oppose a consensualist standard of truth for modal judgements and argue that in this respect modal judgements further resemble secondary property judgements since the latter are not, despite arguments to the contrary, properly regarded as being subject to a consensual standard of truth. [(10.30)-(10.43)] Within this discussion of the issue of consensualism, the development of conceptualism will be completed with the completion of the brief consideration of Wittgenstein's rule-following problematic that was suspended at the close of Ch.8. [(10.40)-(10.43)]

(10.10) MODALITIES ARE NOT PERCEPTUAL BUT ANTHROPOCENTRIC
For McDowell, a key feature in which the promise of a comparison of values with secondary properties lies is that...

"....(t)he ascription of a secondary property to an object is only adequately understood as true, if it is true, in terms of the object's disposition to present a certain sort of perceptual appearance."¹

McDowell views an appeal to a perceptual model of our awareness of values as a crucial and beneficial aspect of the comparison of values with secondary properties. I will argue that insofar as the comparison with secondary properties is fruitful in the moral or modal arenas this has nothing to do with secondary property experience being a kind of perceptual awareness. My disagreement
allows me to pursue the idea of a secondary modal realism while freeing me from the commitment to defend a perceptual model of awareness of modality.

(10.11) MODAL PHENOMENOLOGY DOES NOT COMPEL A PERCEPTUAL MODEL OF MODAL AWARENESS

McDowell's realism is influenced by consideration of the phenomenology of evaluative thought. Evaluative thought, he agrees with Mackie,²...

"...presents itself as a matter of sensitivity to aspects of the world"³ and this phenomenological dimension of our moral awareness...

"... makes it virtually irresistible to appeal to a perceptual model."⁴

McDowell accepts, following Mackie, that a perceptual model of our awareness of values that is based on the primary property case lapses into absurdity, but argues in turn that a secondary property perceptual model is fruitful and available to one who wishes to consider values as real features of the world.⁵ I will argue that even though there is a sense in which some modal awareness does present itself as a matter of sensitivity to aspects of the world it is the case that an appeal to a perceptual model of that modal awareness is eminently resistible.

There are two aspects of the phenomenology of necessity that merit our attention. The first of these is the powerful objectivist pull of our contemplation of certain necessities. The acceptance of a logical necessity, to take an example, often presents itself to us as a matter in which we have precisely no choice. It strikes us as being compelled upon us from without. This is what makes it so difficult to entertain the conception of the acceptance of logical necessities as the product of decision or convention.⁶ But the objectivist pull of metaphysical necessity is not like this (see Ch.11). The phenomenology of modality in general, then, is akin to that of morality. In certain instances it seems that there just is nothing else that one may properly think or do, but in others our convictions sit easily with our awareness of alternatives of whose acceptance we can make something. However there is another respect in which the moral and the modal seem phenomenologically quite different.

Whether an individual agent's evaluative response to a state of affairs is correct or not - as when struck by the cruelty of an action - there is undoubtedly a sense in which such a response can be elicited with, as it were, a minimum of
reflective participation on the part of the agent. In this sense, it seems to me, there is the dimension of the involuntary in some "value-experiences" that is quite similar to the experience of secondary properties. But this dimension seems to be almost completely absent from our awareness of modality. One's "state of awareness" concerning a human being with whom one is confronted that she could not (say) have been other than human does not present itself to one in anything like the way that the awareness of the colour of her hair or for that matter the evil of her professed indifference to others can i.e. as something which simply impinges on one and feeds into, or pre-figures fully-fledged judgement with all of its propositional or intentional content. McDowell himself remarks that the role of reason in evaluative thinking seems to require that we regard the apprehension of value as an intellectual rather than a merely sensory matter. This is correct, but it does not detract from the observation that while there is no room at all for something like an unreasoned, involuntary response in the phenomenology of modality, there is at least some room for such a response in the moral case.

Taking both points into account my claim is that the phenomenology of the modal is less influential in leading us to form a view of the modal as a real aspect of the world than its moral counterpart. But I do not rest my main point on this claim. Even if phenomenological considerations were to furnish us with extensive and unambiguous support for the reality, externality or objectivity of necessity there would still be no point in pursuing a perceptual model of modal awareness to parallel the perceptual model of value awareness. There would be no point because the perceptual model of the awareness of values is, I will argue, without substance.

THE PROSPECTS OF A MODEL OF MODAL AWARENESS ARE NOT IMPROVED BY A COMPARISON WITH THE PERCEPTUAL MODEL OF THE AWARENESS OF MORAL VALUE

Although he draws our attention to the point that we cannot cast sensitivity to value as a merely sensory matter, McDowell underestimates the significance of this admission to the project of promoting a perceptual model. A distinction drawn between sensory and not-merely-sensory awareness, one might think, is hardly of limited, derivative or incidental interest in the context of an invitation to
pursue a perceptual model of that awareness. Yet McDowell acknowledges that colour-awareness and value-awareness are on opposing sides of the sensory/not-merely-sensory distinction while promoting a perceptual model of awareness for value. He excuses himself with the remark that in the epistemology of value.

"...the perceptual model is no more than a model."\(^9\)

But now the reader is left wondering exactly how perception is relevant to awareness of value if not in respect of sensory awareness.

It cannot be because there are relatively well understood causal processes that explain our sensitivity to value parallel to the causal processes and explanations of our sensitivity to colour. For in the case of values there are no such processes or familiar and successful styles of explanation. Moreover even if there were available accounts of how experience of value is causally related to the world in this or that case, there is little or no reason to believe that they would exhibit the generality required of causal explanation\(^10\) or, as McDowell himself points out, that the attempt at "merely causal" explanation might by itself be satisfying.\(^11\) So, the content of the perceptual model is not to be sought in this direction.

Nor can the entrenchment of perceptual idioms in our talk of our awareness of evaluative states be germane, for the proliferation of these idioms is totally indiscriminate. Perceptual idioms are rife in both non-philosophical and philosophical talk pertaining to knowledge of every kind that anyone could wish to claim.\(^12\) We speak of seeing that a conclusion follows from premises, or seeing that an agent intended to do such and such, and, indeed, seeing that an action was wicked or seeing that a certain state of affairs is possible. Of course, there is a tendency not only to speak in such ways but, as McGinn has indicated\(^13\), to elevate perception to the status of epistemological paradigm i.e. to appeal - for the most part unreflectively - to a perceptual model in every case. But this in itself is unhelpful unless we can give content to that appeal in order to judge whether it is appropriate in any given instance rather than merely the expression of our hankering and, perhaps, the reflection of the ontogenic or even phylogenic primacy of sensory experience.

It squares with McDowell's general intentions that he should insist upon a perceptual model as a means of distinguishing his secondary realism from
projectivism. Awareness of value is like perception in being a mode of
detection of real properties as opposed to a projection of an evaluative
something onto a value free world. The secondary realist hereby re-iterates his
realism but this, surely, is not sufficient reason to attempt to sustain the appeal
to a perceptual model.
Blackburn claims that McDowell and others have failed to give any content to
the perceptual model of value experience to which they appeal beyond
asserting its distinctness from projection. I think that the substance of this
complaint is correct and that our understanding of the apprehension of
necessity cannot benefit from a comparison with this model. However this
admission does not of itself undermine the prospects of a secondary realism
about modality. For there is still space for a style of secondary realism that finds
analogues in the modal case of those features of secondary properties other
than those which they enjoy qua perceptual properties. In order to make this
case, I must explain how we can re-orientate secondary realism away from its
perceptual origins.

(10.13) THE ANTHROPOCENTRIC ORIENTATION OF SECONDARY
REALISM
I suggest, following Wiggins, that we develop our interest in a feature of
secondary properties that is more general than their perceptibility namely their
anthropocentricity. The category of secondary property, or more specifically that
of colour, is anthropocentric for...
"....the category corresponds to an interest that can only take root
in creatures with something approaching our own sensory
apparatus." 16
Indeed, secondary property ascription is only to be understood in terms of the
presentation of a perceptual appearance to creatures with something
approaching our own sensory apparatus. However, this is an unwanted feature
in a generalized secondary realism.
The point is that while paradigm secondary properties are undoubtedly
anthropocentric and perceptual, the secondary realist should seek to
extrapolate the former feature without making any direct appeal to the latter. An
anthropocentric category is one that corresponds to an interest that cannot take
root in a creature whose nature is, in some sense, alien to us, but this alienation may be the product of factors other than differences in sensory apparatus. For example we might venture that in the case of values, the understanding of property ascription depends upon the ability to experience certain "sentiments of approbation". In the case of modality the anthropocentric dimension may be thought to reside neither in our sensory nor our sentimental natures but in what is loosely called our "conceptual apparatus". Insofar as the search for a generalizable basis for secondary realism concerns us, it is the anthropocentric nature of secondary property judgements that is the appropriate basis.

Perhaps this formulation does not depart significantly from McDowell's intentions, but if so his persistent emphasis of the "perceptual model" becomes difficult to comprehend. My remarks might be best taken as registering - as it has become customary to say - a difference of presentation rather than policy, but it is an important difference nonetheless. The advantage of the present re-orientation is that in abandoning the association with the perceptual model, it enables us to abandon a misleading symbol of the project of secondary realism and to clear the way for the application of secondary realism in the domain of the rational. Such a re-orientation is especially important to the prospects of application to the modal case where the a priori status of judgements is a salient feature. For it is a traditional hallmark of a priori knowledge that it arises from the operation of our reason and is, therefore, in some sense, independent of our capacities for having perceptual experiences of any particular character. Those who wish to emphasize the role of rationality in moral thinking should also welcome this non-perceptual emphasis even if they would, as they should, stop short of classifying moral knowledge as a priori.

(10.20) SECONDARY PROPERTIES AS GENUINE PROPERTIES

The feature of secondary properties other than their perceptibility that influences McDowell's realism is that there is no obstacle to treating these as genuine properties of the objects that confront us. The secondary realist must give substance to the realism that is intended by this usage, and moreover this must now be done in such a way as to preserve consistency with the mark of anthropocentricity that has been laid down. There are two regions that I wish to develop with this objective in mind.
The first of these centres upon the question of the appropriate standard of truth for secondary property (and relevantly similar) judgements. This discussion constitutes the remainder of the present chapter. The second region concerns the connection between genuineness of properties and the descriptive role of sayings ascribing these properties. This will be the concern of Ch.11.

(10.21) **GENUINE PROPERTIES AND SUBJECTIVITY.** Secondary realism is committed to the idea that what it is for a property to be genuinely of the objects that confront one is for it to be there independently of any particular experience of it. 19 This is a necessary limitation upon the constitutive connection between, for example, being red and being such as to look red, for unless we acknowledge that..

"...an object's being such as to look red is independent of its looking red on any particular occasion. "20

...we give up the right to think of ourselves as making a judgement in such a case. It is for precisely this reason that what McGinn called "personal reductions"21 (e.g. personal actualism) make nonsense of the idea of there being judgements of the relevant kinds. If the psychological states which constitute awareness of a colour, a value or a modality are "brought reductively to bear" upon colours, values or modalities then we degenerate into a crude subjectivism which guarantees the success of a sensitivity in its very activation and that is fatal to the idea that this awareness can be viewed as issuing any kind of judgement.22

This insistence on a property's being there independently of any particular experience of it is a starting point in the explanation of what there is for secondary realism in the idea of a property's being a genuine property of the objects that confront one. We have already acknowledged [(6.42)] that this distance between the act of judging and the correctness of a judgement is a starting point in the explanation of what is required for truth-evaluability. However, the foregoing remarks should make it clear that everyone ought to be in the market for that degree of independence - or at least everyone other than perhaps extreme emotivists who would not be disturbed at the exclusion of moral response from the realm of judgement.23 The crucial questions are what further degree of independence of the standard of correctness for judgements
from actual responses does the secondary realist propose and can the appropriate degree of independence vary from one kind of (anthropocentric) judgement to another? There is an extremely important criticism of the project of secondary realism that can be developed in relation to these questions. For once we acknowledge that a distinction between \textit{real} and \textit{apparent} colour (goodness, possibility etc) is indeed essential to judgement - a distinction between \textit{seeming right to me} and \textit{being right} - we must still remain sensitive to the possibility that the distinction ought to be drawn in accordance with different standards in different spheres of judgement. In particular, it may be argued that it would be a mistake on the part of the secondary realist to propose that the standard of correctness of secondary property judgements can be generalized to the moral or modal regions. An argument against a common standard of correctness for secondary property and moral judgements has been proposed and it can be generalized easily in order to generate an argument against a common standard of correctness for secondary property and modal judgements.

(10.30) \textbf{ERROR COMMUNAL CONSENSUS AND TRUTH - AN EXTRAPOLATION TO THE MODAL CASE OF McGINN'S ARGUMENT AGAINST A SECONDARY PROPERTY STANDARD OF CORRECTNESS FOR MORAL JUDGEMENTS}

McGinn offers an argument that attempts to undermine the comparison of moral values with secondary properties by showing that the standards of correctness in judgements appropriate in the secondary property case lead to disaster when applied in the case of moral values.\textsuperscript{24} This argument has an exact parallel that threatens to undermine the comparison of modalities with secondary properties. The arguments proceed as follows:

(a) \textit{Secondary property judgements are governed by a standard of correctness that is determined by a dispositional thesis concerning secondary properties.}

(b) \textit{If the dispositional thesis and the associated standard of correctness of judgements is applied in the (moral / modal) case, an unacceptable conception of (moralizing/modalizing) ensues.}

/(Over)
Therefore,

(c) The comparison of (moral values/modalities) with secondary properties is seriously undermined.

The conclusion follows from the premises in each instance. But clearly one might reject the conclusion by challenging an appropriate premise. I am going to argue that neither moral-(b) nor modal-(b) can be rejected but that neither moral-(c) nor modal-(c) follows since we ought to reject premise (a).

(10.31) THE PREMISE MORAL-(b) CANNOT BE REJECTED.

Moral - (b):

If the dispositional thesis and the associated standard of correctness of judgements is applied in the moral case, an unacceptable conception of moralizing ensues.

To reject this premise would be to hold that the conception of moralizing that ensues from the application of the dispositional thesis and the associated standard of correctness to the case of moral values is not unacceptable. Since I find the ensuing conception of moralizing totally unacceptable, I maintain that moral - (b) must be accepted.

Here is the definitive statement of the dispositional thesis as it applies to moral evaluation:

"A parallel [to the secondary property case -J.D.] dispositional thesis about value properties will hold that (e.g.) being good consists in a propensity on the part of good things to elicit in observers reactions of moral approval: 'good' applies to something if and only if it produces sentiments of approbation in people."25

With secondary properties, the real/apparent distinction and so the standard of error is drawn from within the realm of appearance - by reference to standard or typical experiences. In contrast with the case of primary properties, there is no standard of correctness altogether external to perceptual appearance against which the correctness of the judgements can be assessed.26 If the internal standard that pertains in the secondary case were applied to morality this would show that moral error.

"...could consist at most in a failure of conformity of one person's moral reactions with the moral reactions of others: the theory
cannot allow that a whole community might be in moral error, or that a solitary judger might make moral mistakes, since this would require some standard of correctness external to that provided by an essentially arbitrary norm of moral reaction. If the standard were to change, as it could for secondary qualities, then moral judgements would cease to be true which once counted as instances of moral knowledge - we could not say that the change of moral reaction constituted any kind of moral mistake. ”

The dispositional thesis, then, accords to community consensus a status as constituting truth in the matter of moral judgement, but this status is quite spurious.

It is essential to our practice of moralizing that we should be in a position to insist that it is possible that - taking the extreme case - all moral agents should "fall into error". As Blackburn puts it:

"(G)oose-stepping along with everyone else can yet lead to moral error "

And, we might add, this would be the case even if, as the result of a deceiving demon, we were to slip into our new attitudes (and jackboots) in such a way that the deterioration was not visible en route. Furthermore, we cannot earn our right to this critical overview of other communities on the basis that present (actual) consensus is constitutive of moral truth. For the price of this startling and irresponsible complacency is the abandonment of the hope that we may improve upon our present moral reactions and judgements. The fundamental problem with the dispositional thesis is that it generates an anti-critical, and hence unacceptable conception of moral evaluation.

Given this criticism of the dispositional thesis it is important to understand why it might hold any attraction in the first place. Perhaps the thought is that acceptance of the dispositional thesis is the price of anthropocentrism i.e that the only way of capturing the anthropic dimension of moralizing is to commit oneself to constitutive claims of type (1):

(1) \( x \text{ is good iff } x \text{ produces sentiments of approbation} \) in people.

This thought is mistaken, for there is no reason why we cannot have the anthropocentricity that we require in the context of a genuinely normative perspective on evaluation.
According to McDowell, a value property is to be identified as a kind of state which *merits* an evaluative response as opposed to one which (merely) *elicits* such a response (even if the response is elicited *throughout* the community). Similarly, Wiggins anticipates and rejects McGinn-style dispositional theses as an adequate grounding for an anthropocentric conception of value by counterposing (2) to the dispositional thesis instance (1):

(2) $x$ is good iff $x$ is the sort of thing that calls forth or *makes appropriate* a certain sentiment of approbation *given the range of propensities that we actually have to respond in this or that way*. 31

He generalizes from this particular case and explains the connection between the valuable and our affective natures:

"... for each value predicate $\varnothing$ (or for a very large range of such) there is an attitude or response of subjects belonging to a range of propensities that we actually have such that an object has the property $\varnothing$ stands for iff the object is fitted by its characteristics to bring down that extant attitude or response upon it and bring it down precisely because it has those characteristics." 32

The difference between the content of dispositional and non-dispositional theses of moral evaluation is signalled clearly by the use of the contrasting "merit" and "elicit", for we well understand the normative distinction between an object's eliciting an attitude and its meriting such an attitude. Eventually, we shall see how a parallel contrast informs a non-dispositional conception of modality [(11.12)].

(10.32) **THE PREMISE MODAL- (b) CANNOT BE REJECTED.**

Modal - (b):

*If the dispositional thesis and the associated standard of correctness of judgements is applied in the modal case, an unacceptable conception of modality ensues.*

I will argue that the proper standard of truth for modal judgements is like that of moral evaluations in being other than as determined by a dispositional thesis. To see this we should consider what the application of a dispositional thesis to modality might amount to. In the moral case the thesis is (1) :
(1) x is good iff x produces *sentiments of approbation* in people.

It is natural to expect that a dispositional thesis of modality will centre on that of which we can or cannot conceive. Consider, then, the thesis (3) concerning the *metaphysical* "must" as a candidate for a dispositional thesis about modality:

(3) **x can be o iff it is conceivable that x is o**

Consider also, the Quine-inspired thesis (4) which is overtly dispositional in tying the standard of correctness of our *de dicto* modal judgements to our dispositions to proceed in mending the Duhemian net:

(4) **A statement is necessary (a priori, analytic) iff it would command assent come what may.**

The critique of the dispositional conception of moral evaluation centred on the perceived need for a gap between communal consensus and truth for moral judgements in order to serve our critical interests. The dispositional thesis could not provide this. Equally, there is every reason for us to *seek* access to the notions of criticism and improvement of judgements concerning what is possible or necessary and, moreover, that the modal truth is no more than the moral truth constituted by any actual consensus of judgement. Inductive considerations undermine consensualism concerning the standard of truth of modal statements for there is a history of propositions that have been held necessary (without any intra-communal dissent) yet have turned out, we say, to be false. Our commitment to a critical perspective on our modal judgements is reflected in the latter description of the turn of events. We wish to retain the right, in some cases at least, to view ourselves as standing in substantive disagreement with these past communities on modal judgements and that is why we speak of their *errors* and of their beliefs turning out to be *false*. Had we no perception of a need for a critical perspective we might simply abrogate the right to substantive disagreement on (e.g) judgements of possibility and allow that a given judgement is true in their conceptual scheme and false in ours.

Moreover the critical perspective is not chauvinistic about our present actual conceptual dispositions for there is no privileged role for the limits of our communal and current powers of conception, or our contemporary opinions of which propositions a total theory cannot do without, vis a vis the modal truth. We can understand how a modal judgement that commands our exceptionless communal assent could fall short of truth for we are familiar with the kind of
process whereby we come to appreciate a new way in which a proposition (hitherto held false) can be true and our modal evaluation alters in the wake of this appreciation. We know also that the tide can flow in the other direction. An adjustment of modal evaluation may arise from the insight that a proposition hitherto held true was held true as the result of some confusion or narrow-mindedness on our (communal) part. History shows that a perfectly consensual totality of actual modal judgements - particularly concerning what is impossible - can be wrong and similarly we may now (or at any given time) be guilty of harbouring modal error. Therefore, in recognizing this possibility we are obliged to disavow a constitutive connection between any actual consensus of modal judgement and truth.

This is the initial statement of the case for accepting modal-(b). I will return to the issue below [(10.34)].

The position is, then, that in accepting the parallel premises moral-(b) and modal (b) and the validity of the inference that McGinn offers, we are bound to accept that the comparison of modalities with secondary properties is undermined unless we reject premise (a). I will argue that we should reject premise (a) and that we can improve the prospects of secondary modal realism by proposing an alternative standard of correctness in judgement that suits the secondary property and modal cases alike.

(10.330) THE DISPOSITIONAL THESIS OF SECONDARY PROPERTIES (PREMISE (a)) REJECTED

The core of the dispositional thesis concerning colours is that the instantiation of the property of, say, redness in an object consists in a disposition of the object to produce sensory experiences in perceivers of a certain phenomenological character. This basic insight is not in doubt, but proper respect for the distinction between real and apparent colour entails that we cannot constitutively fix the colour of an object as the colour it appears to have to just any subject or, for that matter, to just any group of subjects. We need some normative component such as a requirement of normality of observers or observational circumstance in order to enforce the requisite distinction. Indeed, the component must be internal to the realm of perception or else we abrogate the needed constitutive link between secondary properties and the way that
they appear to creatures relevantly like us. There is, however, room for dispute in the matter of precisely how we should fill out the normative component so that we achieve, so to speak, the right kind of dependence of the correctness of judgements upon actual or hypothetical reactions. It is this component that will determine our assessment of the scope for error that exists in secondary property judgement. My view is that McGinn has underestimated the scope of error that may obtain in secondary property judgement and, consequently, he has underestimated the scope for moral error that would obtain were moral judgements like secondary property judgements in this respect. McGinn’s dispositionally-determined standard of correctness in (e.g.) colour judgements apparently leaves no room for the possibility of error in the face of consensus on the part of the totality of normal human observers. I am tempted by the prospect of operating a standard of correctness that is anthropocentric, internal to the realm of perception and reaction-dependent but which also sustains the principle that truth for colour judgements is not constituted by any actual consensus however wide the community of judges. It is clear from many of McGinn’s remarks that he holds it to follow from the dispositional thesis that an error of colour judgement could consist at most in a failure of conformity of one persons perceptual experience with the experiences of others. This strikes me as being less than obvious and I shall offer this example as a means of conveying the nature of the difficulty that I find with this conception of error.

(10.331) AN EXAMPLE CONTRA THE DISPOSITIONAL THESIS FOR SECONDARY PROPERTIES AND THE BEST JUDGEMENT ALTERNATIVE TO THE CONSENSUAL STANDARD

Say it is the case that around our solar system some condition obtains - perhaps a cloud of massive proportions - but because of our perspective (literally) we never become aware of its presence. Suppose further that if this cloud had not been there or were it to disperse after the demise of all actual sentient beings, then the local environment would be such that had any normal human observers been there, they would have had perceptual experiences of distant planets and stars of a systematically different qualitative character. To use the stock example - the bodies appear in the counterfactual scenario as the spectral inverses of their actual apparent colours so (e.g.) while X appears as
red to *all* actual normal observers it would appear as blue were the cloud absent etc.

I am inclined to say that a perfectly proper application of the distinction between real and apparent colour might lead us to maintain that (really) X is blue even though as things stand in actuality *everyone* judges (erroneously) that X is red. Any example which is so distant from our everyday interests and practices of colour discrimination is likely to be contentious and may even strike the reader as raising a question which is insusceptible to determinate resolution. However, the nature of the difficulty that it raises for McGinn's dispositional standard can be pressed rather more generally.

We can still operate a needed internal (to perception) standard of correctness for colour judgements if, following a proposal of Wright, we classify true colour judgements as those which reflect our *best* judgements of colour. The concept of best judgement relies on that of cognitively ideal conditions of judger *and* circumstance. In effect, my example will succeed insofar as it convinces the reader that the actual circumstances of judgement that it involves are less than ideal. The difficult question is whether the appeal to cognitively ideal conditions can here or in general escape the charge of circularity but if it can, and if we can otherwise make good the concept of best judgements of colour, then the point of opposition to McGinn's consensual standard of correctness can be put in the following way. Truth in colour judgements reflects the deliverances of best opinion but there is no guarantee that any community actually judges in those circumstances that must obtain if their (even perfectly uniform) judgements are to count as best. Consequently there is room for error - qua disagreement with the deliverances of judgement relative to best standards - on the part of a (the) whole community of colour judges.

It remains to be argued that insofar as the best opinion standard of truth for colour judgements is tenable, then this standard, in making room for an improvement in judgement over any actual consensus, re-inforces the comparability of the secondary property case with that of modality. To that end I will now turn to complete the task begun in Ch.8 of evaluating the range of responses to Wittgenstein's rule-following problematic with a view to indicating why a non-consensual standard of truth is appropriate to judgements of metaphysical necessity *qua* products of pure rule-following.
THE ASYMMETRY OF SECONDARY PROPERTY AND MODAL JUDGEMENTS re. CONCEPTUALISM

An obvious prima facie disparity between the standards of correctness of modal and secondary property judgements resides in their asymmetry vis à vis conceptualism. The truth values of modal judgements are known to us, if at all, by conceptual means alone and in this respect modal judgements are to be contrasted with all *a posteriori* judgements and with secondary property judgements in particular. In the latter case we want a notion of assent to a colour-ascribing statement (e.g."x is blue") relative to *specifiable* (albeit, hypothetical) conditions of the members of an audience and of the object or surface to be judged in order that we might arrive at proper, non-trivial constraints on an "internal" standard of correctness. We require of the object to which the colour is being ascribed that it is situated in good light, that it be relatively stationary etc. We require of the subjects that their attention is focused on the object in question, that they are possessed of normal visual equipment, and that they are competent in the application the concept *blue*. The crucial point is that in order to substantiate the standard of correctness for any non *a priori* judgement we must invoke sensitivities or capacities in the judges over and above their conceptual sensitivities or capacities.

In the realm of the *a priori* this is not the case. It would seem that the only way in which we can pursue the matter of what would constitute the best cognitive conditions of judges in the case of modal judgements is to look further into the matter of conceptual competence and this, as I have already argued points directly to the issue of what it is correctly to follow a rule. Specifically, we can expect in the case of the *a priori* in general, and modal judgements in particular, the standards of correctness appropriate in judgements of pure rule-following as we can in the case of judgements concerning conceptual content or *meaning*. It is appropriate to return now to the question of what these standards are?

The conception of the relevant standards commended by quietism, and platonism have already been discounted and the encounter with sceptical solution awaits us. *Consensualism* remains to be considered and so a consensualist standard of truth for modal judgement may yet be compelled by the rule-following considerations even though it is not compelled by a (proper)
comparison with the standard that obtains in the case of secondary property judgements.

(10.41) **CONSENSUALISM AS THE FOURTH RESPONSE TO THE RULE-FOLLOWING PROBLEMATIC AND AN ARGUMENT FROM CONCEPTUALISM TO CONSENSUALISM.**

Wittgenstein showed decisively that there can be no question of constructing standards of judgement concerning the content of concepts after the fashion of a purportedly infallible introspective access to one's own mental representations. Indeed, much of the polemic of *The Investigations* is directed against the idea that grasp of meaning is like a secondary quality experience and particularly so when secondary quality " judgements" are being associated with Cartesian standards which endorse the impossibility of introspective error. The Wittgensteinian prognosis, it may be ventured, is consensualism. According to consensualism a judgement which is the output of an instance of pure rule-following is a genuine judgement whose truth is constituted by community consensus about application of the rule. This option might be informed beneficially by the account of assertibility conditions that is given in Kripke. The idea would be that the details of the account of the conditions of assertibility could be "lifted" and re-cast as conditions of truth to suit the purposes of framing a positive response to the constitutive question. It would then be quite true to say in the case of pure rule-following judgements that error could at most consist - as McGinn claimed that it did in the case of secondary properties - in a failure of conformity of one person's reactions with the reactions of others. It would be entirely a matter of being out of step. The relevant reactions being whatever verbal and non-verbal responses a person sees as constituting going on in the same way in the application of a concept.

The argument then is simply:

(A) The correctness of modal judgements can be established by conceptual means alone.

(B) The standard of truth for judgements whose correctness can be established by conceptual means alone is consensual.

Therefore,

(C) The standard of truth for modal judgements is consensual.
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Given the patent validity of the argument and the acceptance of modal conceptualism (i.e premise (A)) the only recourse is to deny premise (B) and to propose an alternative to the consensual standard of truth for judgements which are the products of pure rule-following.

(10.42) THE CONSENSUALIST RESPONSE TO THE RULE-FOLLOWING PROBLEMATIC REPUDIATED

The salient objection against consensualism as a standard of correctness in pure rule-following judgements has already been registered at (10.32) with respect to the modal, namely that consensualism can leave no room improvement in our outlook in matters \textit{a priori}. This is not, perhaps an an immediately familiar Wittgensteinian theme but it relates to important Wittgensteinian anti-consensualist themes. Salient among these are the notion of our modifying our concepts and of our (communal) efforts to act in accordance with a rule as an effort to satisfy a real requirement.\footnote{38} The consequence of a consensual standard of truth in \textit{a priori} judgements is a kind of conceptual relativism and incommensurability.\footnote{39} On the consensualist standard, it would appear that the only possible description of the shift from, say Euclidean to non-Euclidean geometry is one wherein one set of sharply bounded (by consensual determination) geometrical concepts is applied correctly but then abandoned in favour of different geometrical concepts. But in this scenario no room is left for the essential open-endedness of our geometrical concepts and the possibility that we can be mistaken about what a concept requires of us. That we ought to make room for such a possibility is a consequence of the need to maintain a distinction between correct and incorrect applications of a rule. For it has been argued, to propose that the requirements of a rule are constituted by what we communally take to be the requirements of the rule is to surrender the notion of a requirement in rule-following just as much as the infamous identification of the requirements of a rule with what \textit{I} take them to be.\footnote{40} Successful rule-following involves the satisfaction of norms and a non-normative standard (I) is not transmuted into a normative standard (WE) in the simple process of aggregation.

The foregoing is no more than an extremely sketchy case against a consensualist response to the rule-following problematic but it is a case whose
essential plausibility is, I submit, compelling. Moreover, so put the case commends clearly the direction in which the would-be realist conceptualist should pursue the hope of a better response to the question of what constitutes the standard of correctness in pure rule-following judgements. What is missing from consensualism is a genuinely normative component to the conception of what successful rule-following consists in and this is to hand in the form of a fifth proposed response to the rule-following considerations.

(10.43) THE TRUTH OF PURE RULE-FOLLOWING JUDGEMENTS REFLECTS BEST OPINION. - THE FIFTH AND BEST RESPONSE TO THE RULE FOLLOWING PROBLEMATIC.

Wright proposes tentatively that truth for pure rule-following judgements is, constitutively, what we judge to be true when we operate under cognitively ideal conditions. The alternative formulation is that the truth of pure rule-following judgements reflects best opinion. Furthermore, this proposal is supported and elucidated by reference to an analogy with colour judgements.41 The prospects of a secondary realism about modality would be improved considerably were Wright's project to prove successful. It is of course pleasing for the secondary modal realist to be able to refer to an independently developed source of the thesis that secondary property judgements have a standard of truth equivalent to that of modal judgements. But what is more important is the prospect of a sophisticated modal realism - sophisticated in the sense that it emerges intact from a head-on encounter with the rule-following considerations. It remains to be seen whether Wright's project is viable. The best opinion option is attractive because it responds to the deep need to recognize the possibility of the aberration of consensually endorsed judgement while binding the standard of correctness in rule-following to a viewpoint that is an intelligible extension of the capacities and sensitivities that we actually have. The option is attractive but it cannot be claimed at this point that it has been shown to be feasible.

A general difficulty which besets any such best opinion option is that of specifying in a non-question-begging way the circumstances of environment and judge that might be held to constitute a scenario that is favourable to deliverance of opinions that have proper claim to being, precisely, best.42 The
specific difficulty with pure rule-following judgements, is that there is no obvious basis from which we may extrapolate in our attempt to characterize the ideal circumstances of judgement. In the case of a posteriori judgements, as we saw with colour judgements, we can produce a substantial list of conditions of judge and environment that seem to demand consideration. But once we accept as given the truth of a judgement concerning what is actually the case, what kind of factors would have a claim for inclusion in the list of ideal modalizing circumstances? It seems clear that any further interaction with the environment is irrelevant here. It seems also that all that could be relevant are conditions of an individual judge or community of judges. But what can we find to say here? We might of course insist here as we do elsewhere that the judges be attentive, sincere or of whatever other psychological orientation we find appropriate. However this is to resort to psychological platitudes rather than to address the problem of specifying epistemological conditions that are particularly if not uniquely relevant to a priori judgements and for which the notion of these being best is non-circular and intelligible.

It is appropriate to consider the realm of mathematical judgement in the hope that this may provide us with some insight to the a priori in general. If we identify truth in mathematical judgement with best opinion and we regard best opinion as being that which is tune with provability, this satisfies the conceptualist requirement that the standards of correctness (i.e. truth) of the judgements in question can be demonstrated by conceptual means alone. Wright's discussion of this issue (in another context) suggests that we may be at a loss to impose any more substantive conditions on the notion of a proof than that a purported proof should be a genuine proof if it survives arbitrarily many checks by those deemed expert by prior acknowledgement. Even if we could be sure of our conditions of idealized provability in mathematics there would remain the problem of contriving an analogue of proof in the modal case i.e a canonical basis upon which we generate grounds of modal assertion.

What we want to insist upon in the modal case is that here, as elsewhere (c.f. colour), the judges are to be competent or even expert with relevant concepts, but this smacks of question-begging! If a priori judgements can be shown true by standards whose correctness can be demonstrated by conceptual means alone, circularity is at least threatened if we insist that ideal conditions of
investigation of the judges are constituted in their conceptual competence. This circle may be loosened in a favourable way if we can negotiate ourselves into a position to spell out constructively what it is that the requisite idealized conceptual competence consists in in specific regions of a priori deliberation such as the application of metaphysical modalities but I have no positive proposals in this respect.

Beyond this, I admit, I have little to offer. Perhaps the project of stating idealized conditions of cognition is beset with far more difficulties than we are seduced into believing by attention to the secondary property case. That is to say that secondary properties might well represent a relatively easy case while the modal and other a priori judgements are lined up on the (burgeoning) other side with the hard cases. If appeal is to be made to idealized conditions of judgement in the elucidation of standards of truth for classes of judgement then judgements concerning future events, judgement for spatially unrestricted empirical generalizations and moral judgements are among those that spring to mind as likely to pose problems when it comes to specifying constructively the nature of their respectively ideal conditions.

However since the point of this project is to construct a novel conception of modal realism it is to be expected that some liability must be taken on board in relation to the sub-projects. The secondary modal realist ought to accept the risk associated with the response to the rule-following considerations that Wright has adumbrated on the grounds that it is an undefeated response and that the risk looks good value. It is also difficult not to take some comfort in the thought that the development of an adequate response to the Wittgensteinian puzzle is hardly a burden that falls on secondary modal realist shoulders alone.

(10.5) APPRAISAL OF THE FOREGOING

The first claim of this chapter was that the potentially generalizable feature of secondary properties was their anthropocentricity. This anthropocentricity was then to be squared with the claim that secondary properties were nonetheless real - genuine properties of things. A minimal condition of their reality was their independence from the responses of individual judges and, it was argued, from the responses of any actual community of judges. Treating the standard of truth for secondary property judgements as being such that truth reflects best
judgement in cognitively ideal circumstances is, in a sense, an option that is forced upon the theorist who wants anthropocentricity and reality. It seems forced since it is difficult to imagine how else we might sustain simultaneously the potentially irreconcilable desires to view the properties as there independently of (any amount of) us yet such as to be appreciable only to beings with certain non-universal ranges of sensitivity and interest. Nonetheless, this is a model to which the secondary modal realist gladly adheres since it generates the possibility of a non-primary conception of modal reality. With the next turn of the discussion we shall see why this avoidance of a primary property conception of the modal is essential to any plausible theory. In Ch. 11 I will argue that statements involving metaphysical modalities have an important and identifiable non-descriptive role and I will go on to indicate my reasons for holding that secondary modal realism and only a secondary modal realism can accommodate this aspect of modalizing.
CHAPTER 11
SECONDARY REALISM (II): THE NON-DESCRIPTIVE ROLE OF STATEMENTS OF METAPHYSICAL NECESSITY

(11.0) INTRODUCTION
Let us say that when procedures, or patterns of conduct are held to be constitutively related to the acceptance of sayings with a characteristic kind of content, that the sayings express commitments. In this usage, the expression of a commitment is to be viewed as a role of a saying which is different from that of a pure or simple articulation of belief.¹ A salient example of commitment expressing discourse is moral discourse wherein the acceptance of a moral claim is held plausibly to involve a prima facie "pull" towards certain courses of practical conduct on the part of the agent who accepts that moral claim. There is a long standing tradition of modal theorizing which emphasizes the role of modal sayings as expressions of commitment to patterns of intellectual conduct and, therefore, of modal sayings as having a non-descriptive role.

The acceptance of a generalization as causally necessary has been held to express a commitment or propensity to draw certain inferences given the agent's awareness of the obtaining of familiar antecedent conditions.² The acceptance of a statement as logically necessary has been associated with a commitment that the truth-value of the necessitated statement will never be revised in light of new information that occasions a re-distribution of truth-values within our belief system as a whole.³ The acceptance of a statement as a logical necessity has also been held to have the status of the a prescription, decision or policy concerning the conditions of assertibility of contingent statements.⁴

It will be argued here that there is every reason to acknowledge that statements of metaphysical necessity have a commitment expressing role and an attempt will be made to outline the nature of that commitment [(11.10)-(11.12)]. The acknowledgement of a commitment expressing role for statements of metaphysical necessity has the following dialectical significance.

To hold that modal statements have a descriptive role and only a descriptive role is to repudiate the central insight of the modal anti-realist tradition. This is to adopt a stance which I take to be a (further) characteristic of a primary realist attitude to modality and this stance is inconsistent with the acknowledgement of
an essential commitment expressing role for modal statements. However both anti-realist and secondary realist positions are consistent with the acknowledgement of this role. The resolution which I take to be definitive of modal anti-realism is that modal statements do not describe anything (insofar as they are modal) i.e. that modal statements have only a non-descriptive role. To accept that modal statements are such that it is their nature both to describe modal features of the world and to express commitments - i.e. to accept that modal statements have a dual descriptive and non-descriptive role - is a further mark of the secondary realism that I am constructing by extrapolation from McDowell's treatment of the moral case. It is the purpose of this chapter to present a case for the prima facie viability and plausibility of a form of realism that permits the descriptive/non-descriptive combination [(11.20)-(11.23)].

\[(11.10)\] \textbf{CLAIMS OF METAPHYSICAL NECESSITY AS EXPRESSIONS OF COMMITMENT - THE EXAMPLE OF LOGICAL NECESSITY}

There is a notable and unfortunate absence of discussion of the question of whether we can discern a kind of commitment that is characteristic of our acceptance of metaphysical necessities. My view is that we can discern such a commitment and I will attempt to provide a basic conception of the nature of this commitment. My strategy will be to use an account of the commitment expressing function of statements of logical necessity as a basic model for the construction of an account of the commitment expressing function of statements of metaphysical necessity.

It is a familiar theme that the acceptance of a claim of logical necessity involves a commitment to deal in particular ways with the management of our beliefs concerning what is actually the case. Blackburn's conception of claims of logical necessity is anti-realist since he views them as no more than expressions of commitments. However, the secondary modal realist can benefit from this conception by drawing upon Blackburn's account of the nature of logically modal commitments without accepting that modal statements are confined to the role of expressing such commitments. Blackburn's basic conception of logical modalities is set out as follows:

"We allow possibilities, rule out impossibilities, and insist upon necessities. This is not describing anything...It is more like..."
adopting a norm, or a policy or a rule that a thesis be put 'in the archives'above the hurly-burly of empirical determination.'

A simple example will serve to indicate the general intention that lies behind this conception.

A count informs us that there are thirteen in each of two groups of students while a count of all taken as a single larger group yields a total of twenty-seven. Once mundane checking is carried out with no relief, we embark on a strategy of framing hypotheses in order to account for the discrepancy. However we limit the range of acceptable hypotheses in refusing to entertain the notion that the arithmetic proposition (1):

\[
13 + 13 = 26
\]

- which we treat as a logically necessary truth - has been falsified.

The precise nature of a logically modal commitment is not of paramount importance here. The central point is that a theory of logical modality is incomplete without consideration of the commitments that are related to our practice of making modal judgements and which are manifest in the conduct of our thinking and, ultimately, our action in the actual world. Even worse is a theory which following such consideration presents modal sensitivity only as an exercise of pure cognition and, relatedly, of modal statements as having only a purely descriptive role. It is implied by such a conception that agents could share with us the concept of modal distinctions while remaining unmov ed by their modal judgements in their dealings in the actual world (e.g. in their dealings with recalcitrant evidence) and this outcome is, frankly, unbelievable. Such a conception of the modal has no more plausibility than a conception of moral evaluation according to which other creatures could share with us an awareness of the cruel (say) while remaining utterly indifferent to the promotion or prevention of actions or practices to which they held this concept to apply.

The marker that is being laid down here is that it seems simply undeniable that assertions of logical necessity are commitment-expressing. They have an identifiable non-descriptive role of the kind that has been adumbrated and no theory, “realist” or otherwise, can afford to ignore this phenomenon. Given this axiom of modal theorizing it would be natural to expect to find a similar commitment expressing function in the case of the other alethic modalities. It will be argued below that this expectation is fulfilled in the case of metaphysical
Wright describes the function of logical necessities in intellectual life as the means whereby we regulate the distinction between appearance and reality. This provides a useful starting point for our thinking about metaphysically modal commitments.

Our reasoning concerning the actual world may take the form of an inference from the premise that no metaphysically possible world is a world in which it is the case that P, to the conclusion that the actual world is not a world in which it is the case that P. Thus, on occasion, it is our conviction that no metaphysically possible world is a P-world - that it is metaphysically impossible that P - that sustains the belief that the actual world is not a world in which it is the case that P. Given that the world is not always and everywhere the way that it appears to be we have a persistent interest in the evaluation of the appearances, and this evaluation frequently leads us to rail against the claim that the world is a world in which it is the case that P - despite the fact that the world seems to be a world in which it is the case that P. Thus, we claim that we do not inhabit a world in which there are Gold samples composed of atoms other than those of the element with atomic number 79 even though we inhabit a world in which there is Gold-seeming stuff (composed of Iron Sulphide) which has this composition. Similarly, a kind of liquid that is colourless, tasteless, odourless, falls from clouds, fills lakes etc. but which contains no Hydrogen, is not water. My contention is that we can explain these metaphysical claims as emerging from a commitment to constrain and amend one's use of natural kind terms according to the deliverances of best science.

In general, the commitment involved in the acceptance of metaphysical necessities is in the first instance a commitment to adopt certain constraints in one's reflective representation and description of the phenomena. To accept a metaphysical necessity is to adopt an intellectual norm whose function is to
issue prescriptions to the effect that certain actual or imagined states of affairs merit (alternatively, do not merit) given descriptions. It is important to emphasize that the normative content of "merit" is crucial here. This normativity is indispensible to the right of passage from the mere acceptance of a pattern of linguistic practice to the making of metaphysical claims - e.g from constraining one's application of the predicates "Horse" and "Gold" on the one hand, to claiming that would not be a horse; that would not be Gold on the other. This transition is not licenced by a parallel but non-normative constraint whose force is that one should accept the communally determined range of application of the predicate as constituting the extension of that predicate. That is to say that, for natural kind terms at least we ought to endorse instances of the first but not the second of the following (constitutively intended) schematic conditionals:

(2) x merits application of the predicate "K" iff x is K.
(3) x elicits communal application of the predicate "K" iff x is K.11

Here we have the manifestation of the distinction between a merited response and an elicited response that has already been seen to be crucial to the difference between consensualism and secondary realism in the spheres of values and secondary qualities.12 But, in the application of a natural kind term even more than in our moral evaluations we have a deep commitment to the idea that we may be found wanting in our current communal conception of what the concepts require of us and, correlativey, we are prepared to accept much more easily the possibility of widespread falsehood within the scientific than the moral compartment of our thought.13

What meriting the application of the natural kind predicate amounts to here is a hostage to our conception of the best (causal-explanatory/taxonomic) theory of the kind and to what such a theory would determine to be in the extension of the kind term. My claim is not, of course, that our current decisions to apply or withhold application of natural kind predicates are governed by (unknown) best science. Here and now we do the best we can with the help of current science in forming opinions as to which instances merit the application of kind predicates, but this activity is regulated by a conception of best science in that our present practices of application of natural kind predicates are defeasible against the best-science standard. Thus while we presently resolve not to describe non-H₂O stuff as water and accept as a matter of metaphysical
necessity that water is H$_2$O, we view both our resolution, and therefore our judgements concerning the metaphysically modal, as defeasible in the light of the possibility of an improved outlook that may be forthcoming with the betterment of science.

This, I am arguing, is (roughly) how the regulation of the distinction between appearance and reality is conducted and manifest in the matters of the identification of the extension of a natural kind term. In sum, my case is that claims of metaphysical necessity reflect our need to draw a line between what appears to be a member of a given natural kind and what really is so. Our opinion as to where that place is, along with our opinion concerning which specific claims that we are to take to be metaphysically necessary, is determined at any given time by current science. However with our concept of a superior scientific outlook and a best science comes the acceptance that we may now be drawing the needed line in the wrong place and so be issuing false judgements regarding what is metaphysically necessary or possible.

I will now turn to the task of explaining the secondary realist accommodation of the metaphysically modal commitment that has been sketched. This explanation will take place in the context of an exposition of the secondary realist conception of what it is to be a genuine property of a thing.

(11.20) GENUINE PROPERTIES ASSOCIATED WITH DESCRIPTIVE STATEMENTS

We can extract an interesting criterion of the genuine from McDowell's discussion of a version of "non-cognitivism" which he outlines as follows:

"Non-cognitivists hold that ascriptions of value should not be conceived as propositions of the sort whose correctness, or acceptability consists in their being true descriptions of the world; and correlatively, that values are not found in the world, as genuine properties of things are."$^{14}$

The general correlation that is implicit in the formulation of the non-cognitivist thesis is (C):

(C) The correctness of propositions $P_i$ consists in their being true descriptions of the world iff the properties they ascribe are found in the world as genuine properties of things.
My suggestion is that we should adopt this correlation as part of the secondary realist conception of genuine properties. We ought to distinguish two restrictions on the correctness of property-ascribing statements which are relevant to the status of properties. The restrictions are that a correct statement of this kind should be: (i) true; and (ii) descriptive. By glossing over this distinction in his formulation of "non-cognitivism" McDowell gives the impression that one who opposes the descriptive status of evaluative commitments - if they're not descriptions they can't be true descriptions - is thereby obliged to embrace non-cognitivism. It was precisely in deference to the theorist who wishes to insist on truth-evaluability for the disputed claims while contesting that they describe anything that I suggested that we should restrict the use of the term "non-cognitivism" to its narrow semantic application i.e. to apply to a thesis of the denial of truth evaluability. I propose to maintain this usage since it allows us to distinguish positions that ought to be distinguished. Secondary realism requires that correctness in genuine property-ascribing statements requires that they be true, but secondary realism is distinguished from its anti-realist opposite by requiring that their truth is a matter of their success as descriptions.

This conception of the criteria of correctness for property-ascribing judgements as true descriptions, when added to the conception of the standard of truth for property-ascribing judgements as independent of the actual reactions of any individual judge or community of judges, yields a total conception of what it is in terms of secondary realism for a property to be a real property.

(11.21) SECONDARY REALISM AND THE DESCRIPTIVE/NON-DESCRIPTIVE DUALITY OF MORAL EVALUATIONS.

McDowell's Response to a Neo-Humean Argument.

The secondary realist about a given class of statements considers correctness for those statements to consist in their being true and descriptive. While there will be no disputing this conception in the case of secondary properties it is perfectly clear that the opponent of secondary realism about values will be inclined to argue against the purported analogousness in this respect of values and secondary properties.

Within a classical Humean perspective, ascriptions of colour, sound, taste etc. are paradigms of truth-evaluability and the descriptive functioning of language.
These features of statements are determined by the ontogeny of the relevant concepts and in the case of secondary property ascribing statements the relevant concepts (e.g. colour concepts) are direct derivatives of impressions of sensation. On the other hand evaluations and indeed modal claims are held to be neither properly truth-evaluable nor descriptive precisely because the ontogeny of evaluative and modal concepts traces them to impressions of reflection. So in Humean consideration there is a clear difference between colours and values corresponding to the difference between sensation and reflection, the passive and the active. In Hume the distinction between impressions of sensation and impressions of reflexion is correlated with a distinction between passive and active mental faculties - between reason and the passions. Now, while it is unlikely that there will be any enthusiasm for such classical Humeanism, it is the case that many will feel it appropriate to challenge secondary realism about moral values on the grounds that these differ sharply from secondary properties with respect to their action-relatedness. McDowell considers an argument against the status of moral evaluations as (potentially) true descriptions. The argument is Humean in spirit though formulated in rather "un-Humean" terms. The argument may be represented as follows:

(4) **Ascriptions of moral value impute reasons for acting.**

(5) **Propositional attitudes whose content is expressible by true descriptive statements cannot be cited as complete reasons for acting.**

Therefore,

(6) **Ascriptions of moral value are not true descriptive statements.**

A natural supplement to this argument is a further inference from (6) and the correlation (C) of the previous section:

(C) **The correctness of propositions Pi consists in their being true descriptions of the world iff the properties they ascribe are found in the world as genuine properties of things.**

To the conclusion (7):

(7) **Evaluative properties are not to be found in the world as genuine properties of things.**
The complete chain of *neo-Humean* argument, then, is from the role of the relevant mental states in the causation of behaviour, to the semantic role of the sayings that express the content of those states and finally to an anti-realism about the properties.

The would-be secondary realist about values accepts (C) and so is left with the option of rejecting either of premises (4) and (5). McDowell is not prepared to surrender the first of these premises. Indeed, in a sense it is here that we find the key to his departure from the primary quality model of awareness. In holding that judgements of moral value are action-guiding McDowell intends that an agent who accepts such a judgement...

"...may (depending on his opportunities for action) *eo ipso* have a reason for acting in a certain way, independently of anything else that is true of him."18

Moreover, if to stand in this kind of relation to action is partly constitutive of what it is for a judgement to *be a moral evaluation* then values cannot coherently be thought of as simply *there* in the world as primary properties might be supposed to be, since values are *intrinsically* related to our propensities to act.19

McDowell recommends instead rejection of premise (5):

(5) *Propositional attitudes whose content is expressible by true descriptive statements cannot be cited as complete reasons for acting.*

Critical assessment of this rejection will repay us with further material for the construction of a secondary modal realism. The secondary realist must consider moral statements to be (potentially) true descriptions but it now seems clear that, in insisting upon the action-guiding character of moral commitments, McDowell is also insisting that we acknowledge an important non-descriptive aspect of the use of moral statements. In sum, he is advocating a view of moral statements as having a dual, descriptive and non-descriptive, aspect to their use.

In the following sections, I will attempt to bolster the plausibility of an approach which acknowledges this kind of duality by invoking Dummett's discussion of the relationship between the acceptance of assertions and the consequences for action that are associated with that acceptance.20
Dummett makes the point that there is a sense in which all assertions are to be acted on, the acceptance of an assertion as true commits the believer to a line of action. This point is made alongside the suggestion that the work of the later Wittgenstein encourages us to shift attention in our attempts to understand meaning from the grounds on which an utterance is made (truth, verification, confirmation, asertibility etc.) to the consequences of acceptance of that utterance. Whether a consequence based semantics can or ought to be carried through programatically is a matter on which I take no position. However, once taken on board, the central insight that assertions are in \textit{general} to be acted upon helps us abandon the fetish of regarding moral statements as unique in their strong action-relatedness. In order to provide initial backing for this insight, let us consider the case of yet another class of statements.

Dummett writes concerning our settling a question of personal identity:

"\textit{We have reasonably sharp criteria which we apply in ordinary cases for deciding cases of personal identity : and there are also fairly clear consequences attaching to the settlement of such a question one way or the other, namely those relating to ascription of responsibility, both moral and legal, to the rights and obligations which a person has, and also to motivation ( in the sense that it is ordinarily thought that a person has at least a different \textit{kind} of motivation for securing his own future happiness than for securing that of another).} \textsuperscript{22}

He continues by arguing that were we confronted with a community whose criteria of personal identity were different from our own e.g...

"\textit{as a result of a highly literal belief in re-incarnation} \textsuperscript{23}

we would still be in a position to recognize this fact for,...

"\textit{(p)recisely what would make the criteria they used criteria for personal identity would lie in their attaching the same consequences in regard to responsibility, motivation, etc. to their statements of personal identity as we do to ours.}"\textsuperscript{24}

It appears that the very possibility of recognizing the concept of personal identity as present in a community depends upon the members of that community going on in certain ways where this means extra-linguistic as well as linguistic ways.
Let us locate this point explicitly in the context of radical interpretation in order to be clear about its intended force.

There are constraints on the ascription of sentence content that arise from the requirement that we render speakers intelligible. Now, part of what it is to maintain intelligibility is to square the content we ascribe to sayings with what speakers who assent to those sayings believe and with what they go on to say and do as a result of having such beliefs. The connections between beliefs, commitments and action are subtle and my aim is not even to begin to attempt to characterize the complex relations in which they stand to one another. But the general point that can be taken from the personal identity example is that it may be constitutive of the very identity of a concept that is invoked to articulate the content of a speaker's belief that it should stand in some intrinsic relation to commitment and action.

However this claim is faced with certain obvious difficulties. As Dummett himself acknowledges, any attempt to provide an account of the meaning of utterances in consequence-based terms seems to be faced with enormous difficulties in light of some truisms regarding the nature of action. The course of action (if any) that results from the acceptance of an assertion is dependent upon the agent's aims (if any) in the relevant context and the other statements that the agent holds true. Moreover there is, in general, no question of fixing any two of the parameters of belief, aim and action and on that basis deriving a value for the third. Nonetheless, awareness of this limitation does deprive us of the deeply entrenched conviction that there are, at least in salient cases, statements for which we are in a position to specify, perhaps on the basis of charitable assumptions about an agent's background beliefs, courses of action that count as acting on the acceptance of that statement and, for which the relation to action is essential to the identity of the concepts involved in the content of that statement.

(11.23) SECONDARY PROPERTIES MORAL AND VALUES LOCATED ON A CONTINUUM OF ACTION-RELATEDNESS

The picture that is suggested by these brief considerations is one in which action-relatedness is a feature of all (belief-expressing) statements and wherein there is no call for a strict and mutually exclusive categorization of
commitment-independent, descriptive statements on the one hand, and commitment-involving, non-descriptive statements on the other. It would, however, remain possible and natural to locate classes of statements at some distance along a continuum of degrees of commitment-involving content. The continuum picture is natural because it allows us to respect the clear pre-analytic differences between statement classes that appear to contrast sharply in respect of their degree of action-relatedness by placing them at a suitable distance from one another. Consider e.g. predications of types (8) & (9) respectively:

(8) \( x \) is cruel.
(9) \( x \) is yellow

That there is a difference between such paradigmatic predications of values and secondary properties with regard to their action-relatedness is not in question. Thus we can acknowledge comfortably a feature which Blackburn notes as one of many "significant differences between secondary properties and values"^28

i.e... "It is up to a subject whether he cares about any particular secondary property in any way. If morality consisted in the perception of qualities, there would be theoretical space for culture which perceived the qualities perfectly, but paid no attention to them. But however it is precisely fixed, the practical nature of morality is clearly intrinsic to it, and there is not the theoretical space."^29

Even though the proper course for the secondary realist is indeed to take this point, there is an important facet of Blackburn's formulation which merits comment since it raises the issue of the implications that the continuum conception of action-relatedness might harbour for the philosophy of mind.

Clearly what underlies the reference to perception here is the Humean notion that perceptual awareness is in itself passive and the point is well taken that sensitivity to value is not passive but is action-directing. But the issue is whether we must view matters in terms of a Humean conception of mind - according to which each of our mental faculties operates either in the active or the passive mode - in order to make sense of the contrast between secondary properties
and values. The conception of a passive/active continuum allows us to make sense of the striking contrasts with respect to action-directedness of claims that the agent accepts without involving a commitment to the sharp Humean dichotomy. However, it is appropriate to acknowledge that the entitlement to this conception may depend ultimately upon the tenability of the amendments in the conception of mind that it may well be held to enforce. The chain of (Humean) argument that has been invoked proceeded from the role of relevant mental states in the causation of behaviour, to the semantic role of the sayings that express the content of those states and finally to an anti-realism about the properties. This chain of argument properly reflects an intimate relation between our propositional attitudes and our sayings. If we are rejecting a sharp dichotomy between purely passive and purely active mental faculties this cannot leave intact the corresponding opposition of (passive) belief and (active) desire. It seems to have been accepted by certain moral realists, for the case of moral evaluations at least, that the mental states that are the locus of evaluative judgements are neither (pure Humean) beliefs or desires. McDowell himself is explicitly critical of the conception of rational explanation that arises from the acceptance of the opposition of reason and passions which is a feature of.....

"eighteenth century philosophy of mind."\(^{30}\)

Others have attempted to proceed beyond criticism by pursuing an alternative based upon the classification of evaluative mental states in a hybrid category of propositional attitude ("besires"\(^{31}\)) No doubt any proposal to generalize descriptive/non-descriptive duality across the board will benefit greatly from - not to say require - support from generalized versions of these proposals regarding the "mental role" of evaluations but I cannot pursue the matter further here.

(11.30) SUMMARY

In this chapter I have attempted to establish two things. The first is that there is no serious alternative to regarding claims of metaphysical modality as essentially commitment-expressing. The second is that the secondary realist hopes to accommodate this conception of claims of metaphysical modality while maintaining a conception of these modalities as genuine states of the world. It may well be argued, by the primary realist or the anti-realist that the hopes of
the secondary realist are neither here nor there since the secondary realist is simply not entitled to eat the cake and have it with respect to the issue of modal description versus modal commitment. The best response to this criticism is simply to remark that it seems far too early to say whether the secondary realist is entitled to this combination of views. However, it may also be held that a consideration of the issues that have been aired in the second half of this chapter indicates that the secondary realist has earned a prima facie entitlement to the option of casting modal sayings as essentially dualistic with respect to description.

The appropriate judgement to make at this stage is that a form of modal realism which accommodates the conception of modal commitments might be viable in the sense that the kind of realism that it is might be on general grounds a coherent and viable form of position. Given this judgement the ground which emerges as being of central strategic importance to is that which centres upon the claim that modal sayings are even partly descriptive. As matters stand the position is that the secondary modal realist must defend the descriptive function of modal judgements in order to keep alive the prospects of modal realism. Even if the secondary realist's pro-descriptive arguments succeed there still remains the task of pressing home the entitlement to descriptive/non-descriptive duality. The anti-realist, on the other hand has the prospect of killing off the final hopes for modal realism by entering decisive anti-descriptivist arguments.
CHAPTER 12
THE EVALUATION OF SECONDARY REALISM IN LIGHT OF THE PROJECTIVIST ALTERNATIVE

(12.0) INTRODUCTION: SECONDARY REALIST DEPARTURES FROM FAMILIAR REALIST THEMES

It is important to take stock before entering this final stage of assessment of the prospects of modal realism.

At the beginning of Section Three, the position was that the conceptions of modal realism associated with Lewis and McGinn respectively were, for different reasons, inadequate. The stated project was then to develop a third conception of modal realism - secondary modal realism - on the basis of a comparison with the moral realism of McDowell.

A serious question mark hangs over the secondary realist project since it will, no doubt, be felt by some that the objective of formulating a viable theory of modality that merits designation as realism has been lost or abandoned somewhere along the way. Indeed, it is undeniable that there are many junctures that might be identified as signalling departure from genuinely realist intent and it is important to provide an inventory of these. (No further argument will be offered in connection with any of these rejected "realist" claims.)

Firstly, the secondary modal realist is a non-objectual modal realist and so is not to be found propounding an ontological commitment to a distinctive class of object.

Secondly, while a minimum requirement of any kind of realism has been served by the continuing assumption of truth-evaluability for modal statements, there has been no insistence upon a correspondence theory of truth. It may be held that what ought to differentiate modal realist and anti-realist is that the former will insist that modal statements are true in the correspondence sense while the latter will insist that modal statements are true in the assertibility sense.

Thirdly, the standard of truth for modal judgements which is incorporated in secondary realism is such that best judgements of modality are held to determine the extension of the truth predicate as it applies to modal statements. It may be held that in giving up the idea that our best judgements reflect the modal truth that the entitlement to the term "realism" has been abrogated.
Fourthly, and as a consequence of the operant standard of truth, the secondary modal realist cannot accommodate the realist theme of the objectivity of meaning, i.e.

"the notion that the meaning of a statement is a real constraint to which we are bound...and to which verdicts about its truth-value may objectively conform or fail to conform, quite independently of our considered opinion of the matter."1

Since, for the secondary modal realist, the truth-values of modal statements reflect best judgement there can be no question of verdicts about these truth-values conforming objectively to anything quite independently of our considered opinion of the matter.

Fifthly, given the repudiation of the objectivity of meaning it seems to follow that the secondary modal realist is also committed to the repudiation of the thesis of the objectivity of truth for modal statements. To hold that truth for a class of statements is objective is...

"...to hold that a class of statements may be fully intelligible to us although resolving their truth-values may defeat our cognitive powers (even when idealized)..." 2

The falsehood of the objectivity of truth for a class of statements is a clear consequence of the falsehood of the thesis of the objectivity of meaning since to hold that statements may be undetectably true in the way that the objectivity of truth requires is to leave oneself with...

"...no alternative but to think of their meanings as, so to speak reaching into regions where we cannot follow...." 3

Thus the secondary realist standard of truth can be seen as putting paid to the possibility of sustaining two allegedly realist strands of thought.

Sixthly, in acknowledging the anthropocentricity of modality and the commitment expressing function of modal statements the secondary modal realist eschews any clear entitlement to claim modal statements as objective judgements. The objectivity of judgement is....

"the kind of objectivity that statements have when they are apt to record or misrecord features of the real world - features which would be appreciable by any creature possessed of appropriate cognitive powers, whatever its emotional capacities or affective
dispositions."  

Although modal statements are viewed as recording features of the real world, it is not clear that the secondary modal realist will not be keen to accept the distinction between cognitive powers, on the one hand, and emotional capacities and affective dispositions on the other. The reason is that the distinction at least threatens to re-inforce the eighteenth century philosophy of mind which leads to intolerance of the secondary realist conception of the essential descriptive/ non-descriptive duality of modal statements. Hence, secondary modal realism is not recognizably realist in the sense that required by the objectivity of judgement either.

Given these disclaimers the suspicion might be aroused that so-called secondary modal realism has collapsed by default into what is viewed more properly as a version of modal anti-realism. Now any dispute concerning which combination of "realist" theses is really constitutive of modal realism is bound to be fatuous. Ultimately, our concern must be to arrive at the formulation of a defensible conception of modality and then disputes over nomenclature can follow. But the survival of a distinctive identity for secondary realism depends crucially upon its being differentiated from a potent anti-realism with which it shares many important features.

(12.1) PROJECTIVISM PROTECTED BY QUASI-REALISM.

The most potent form of opposition secondary realism about the moral and the modal is a sophisticated projectivism, more specifically Blackburn's projectivism protected by quasi-realism. This projective conception of the modal is the sceptical solution that was anticipated in Ch.6. The shift to projection is proposed as a remedy to the worry concerning the nature of the faculty whereby necessity is detected. The remedy works because it removes the cause of the worry i.e. the assumption that we can only retain proper entitlement to various attractive features of our modal discourse if we regard modalities as features of the non-projected world.

In Blackburn's conception, what is projected when we treat a claim concerning the actual world as a logical necessity is our inability to make anything of a way of thought that denies that claim. His account of the circumstances in which an imaginative block can be projected justifiably as a genuine logical impossibility
is subtle and illuminating. Its main feature is that it distinguishes those imaginative limitations which we can view as arising from naturalistically explicable limitations of our powers of conception from other, deeper imaginative limitations. However from the point of view of the meta-modal discussion it is not so much the details of the circumstances of right projection of conceptual blocks that is of interest, as the content of the meta-theory in which the projective account is contained.

We are interested in the implications that a projective account of modality has for such issues as the truth-evaluability of modal statements, the metaphysical cost of projection, the standards of truth appropriate to modal judgements, the distinctiveness of modal concepts etc. Blackburn calls the meta-theoretic structure in which he deals with these issues quasi-realism, and it is in this meta-theory that our interest lies.

It was indicated in Ch.11 that a conception of modal language in the style of Blackburn differed from secondary realism in that it denied a descriptive function to modal sayings. The metaphysical correlate of non-descriptivism is the view that modalities are not in the world as genuine features of things; the epistemological correlate is that necessity is not detected or recognized but projected outward in appropriate circumstances. In order to consolidate the point that these are indeed the only issues which differentiate the quasi-realist projectivist from the secondary realist about modality, it will prove useful to outline the salient features of a quasi-realistic theory of the modal.

The stated objective of a quasi-realist approach to the moral and the modal is to attempt to earn on the basis of a slender (non value-laden, non modality-laden) metaphysic, those features of moral and modal language that tempt people towards realism.

The first of these realist-seeming features is irreducibility. The modal is distinctively and irreducibly modal and there is certainly no question of projection being interpreted in such a way that it involves the notion of the modal claim having a truth-condition which concerns the agent.

The second feature, and related to the first is that modal claims satisfy the non-subjectivist, minimum condition on genuine judgements. There are standards which pertain to correct projection and there is no question of successful modal judgements being guaranteed to coincide (a la personal
actualism) with the activation of the agent's projecting faculty.

The third feature is semantical cognitivism. In practice we treat moral and modal sentences as capable of truth and falsehood not only by calling them "true" or "false" but by imbuing them with such propositional behaviour as deploying them as premises and conclusions in moral and modal argument. The quasi-realist intends to respect this practice - and perhaps there is no option but to respect this practice - and attempts to earn the right to truth-evaluation for the relevant claims. (The quasi-realist construction of truth satisfies the conception of truth which is determined by the constraints of Ch.6).

The fourth feature is a non-consensual standard of truth for quasi-realistically protected statements. The quasi-realist standard of truth involves an appeal to a standard of truth which allows for improvement at any stage of the moral and modal outlook of any actual community.

There is, of course the question of the quasi-realist's entitlement to these features to be considered and Blackburn is keen to emphasize that the right to treat moral and modal claims in these ways has to be earned. The ability of the quasi-realist projectivist (hereafter, the projectivist) and the secondary realist (hereafter, the realist) to deliver each of these features of modal judgement will stand as a measure of the relative viability of the respective conceptions of the modal. No doubt there is much that remains to be resolved in this respect. However, my intention is to allow that both kinds of theorist have established a prima facie entitlement to those attractive features of modal language to which they lay claim. Then, given this assumption, we can look towards the dimension of theorizing that differentiates the projectivist from the realist in order to assess the viability of this third grade of modal realism. Success in this dimension of theorizing emerges as a test of the viability of realism in precisely the following sense. If it is the case that the modal realist loses in the dispute which separates modal realism from modal projectivism, then modal realism will have nothing to sustain it, for the position will be that the (other) attractive features of modal realism can be had more economically in the acceptance of projectivism.

(12.20) RESOLVING THE REALIST/PROJECTIVIST DISPUTE.

Blackburn is keen to emphasize his view that, in the moral case at least, the dispute between the realist and the projectivist is a genuine dispute and a
dispute that the projectivist wins. Here, I want to examine Blackburn’s reasons for taking this position with a view to evaluating the prospects of settling the dispute between the secondary modal realist and the modal projectivist. His case can usefully be split into two parts.

The second of these is the direct critique of realism and this will be addressed at a later stage. [(12.30), (12.30)] The first part of the case concerns the purported comparative advantages of projectivism over realism. The success of quasi-realism, Blackburn claims, leaves a projective account of morality “far the most attractive” on the grounds of (i) economy, (ii) metaphysics and (iii) the theory of action and desire. Each of these grounds stands as a potential source of advantage of a projective over a realist account of modality. They will be addressed in turn in (12.21), (12.22) & (12.23).

(12.21) **THE PROJECTIVIST ARGUMENT FROM ECONOMY**

The following argument from economy is a direct parallel of an argument that Blackburn offers in favour of moral projectivism.

The projective theory intends to ask no more from the world than what we know is there - the natural world containing actual things, their actual (natural) features and our patterns of reaction to these. By contrast a theory assimilating modal understanding to perception demands more of the world. Perception is a causal process: we perceive those features of things which are responsible for our experiences. It is uneconomical to postulate both a kind of feature of things (their modal features) and a mechanism (intuition) by which we are happily aware of these.

An adequate response to this argument must begin by acknowledging that the modal realist claim that modalities are (genuine) features of the world brings in its wake the need to make a fundamental epistemological choice.

The realist must either take the view that there is no mechanism that affords us awareness of the states in question or take the view that there is such a mechanism. If the realist takes the former position, then a hopeless degree of recognition transcendence ensues. If there is no mechanism of awareness of the states in question then how could we ever be justified in claiming that such states are features of the world never mind arrive at some normative basis for the distinction between merited and non-merited applications of concepts of the
kind at issue. This line of response is a non-starter. Accordingly, it seems that
the realist must opt to grasp the the other horn of the dilemma and avow that
there is a mechanism whereby we are aware of the states in question. It may
then seem natural to charge that this amounts to at least relative extravagance
since the projectivist requires no such mechanism of awareness in order to
account for our experience of the given kind.

It is not clear how much of Blackburn's intention is captured in this articulation of
the case from economy but the case is weak at a variety of points.

The first of these arises in relation to metaphysical economy. Of course it is the
case that wherever we have a realist claiming that $\emptyset$'s are genuine features of
the world and a (correlative) anti-realist claiming that the world (at least in the
absence of our projective contribution) is $\emptyset$-free the anti-realist will have (*ceteris
paribus*) the more economical metaphysic. If the point were simply that anti-
realism is (*ceteris paribus*) metaphysically more economical than a realism that
asserts that there are $\emptyset$-states in the world, then the claim would be true but
utterly question-begging if presented as a comparative advantage of anti-
realism. Moreover, it will be natural for the realist to claim the high ground of
economy *qua better value* on the basis that the slender metaphysic of the
anti-realist grounds an *unsuccessful* attempt to explain the phenomenon of
modalizing. That is to say, the realist can be expected to claim that realism is the
cheapest price at which modality becomes explicable. The metaphysical price
by itself settles nothing here, otherwise the projectivist might as well defer to the
*eliminative actualist* who has the most economical theory of all.

Nor can it be the case that the projectivist can be claiming that a mode of
awareness of modal states is inherently more expensive in virtue of its being a
cognitive or *detecting* faculty or mechanism that is trained on what is genuinely
in the world, when opposed to a faculty of awareness of a state that is *projected*
onto the world. On both realist and projectivist accounts we have an *awareness*
of modal states. From where, then, does the projectivist's purported advantage
of economy arise?

It can only be on the grounds that it is not the *very existence* of a *mechanism* of
awareness of modality that is at issue between projectivist and realist, but the *kind of mechanism* that the realist is being portrayed as demanding i.e. a
faculty of *intuition* where the operation of this faculty is construed as something
more than a natural response to the natural world. Realism is uneconomical, it
must be thought, because it is committed to a modal epistemology which
requires influences other than causal influences on the knowing mind.
The secondary realist response to this charge has already been registered. The
primary realism that McGinn outlines entertains the possibility of our
accounting in this way for our modal awareness, but secondary realism does
not. Our awareness of modalities is an awareness constrained by the
acceptance of the thesis of conceptualism and there is no reason whatsoever to
attribute to secondary realism a commitment to a non-natural account of such
sensitivities. All in all, it is difficult to deal with the argument from economy.
Perhaps the best that can be said in defence of the prospect of such an
argument playing an effective and non question-begging role in the evaluation
of the realist projectivist dispute at this stage is that it would be relevant in a
competition between a wholly naturalistic projectivism and a realism that
required non-causal sensitivities and/or states of reality with which no causal
commerce on our part was possible. But in the context of an opposition to
projectivism that takes the form of a realism that eschews both of these
poisoned chalices the relevance of considerations of economy is somewhat
obscured. This is not to claim that fault has been found with the argument from
economy, rather it is to claim that it has no force in the matter of settling the
realist/projectivist dispute in the absence of further clarification of its intended
content.

(12.22) THE PROJECTIVIST ARGUMENT FROM METAPHYSICS.
Thankfully, the metaphysical argument proves easier to pin down. The
metaphysical argument for a projective theory of morality.....
"...is in effect a development of the simple thought that moral
properties must be given an intelligible connection with the natural
ones upon which they somehow depend." Clearly, it is equally reasonable to expect that modalities must be given an
intelligible connection upon the properties upon which they somehow depend
i.e. the actual properties of things. It transpires, however, that the advantage that
Blackburn claims in this respect for a projective theory of morality is related to
the explanation of a phenomenon that has no modal parallel. Blackburn wants
to say, and rightly so, that the relation of the moral states to the natural states upon which they "somehow depend" is one of B/A supervenience without necessity. This is to insist upon the ban on mixed worlds while further insisting that there are worlds in which something is A'and B* and worlds in which there are things which are A' and non-B*. Now the problem that exercises Blackburn is to explain why it is, given that there is no B*/A' necessity, that there should be a ban on mixed worlds and he takes the view that we can provide an answer here in terms of constraints on the projection of B-states onto A-states - terms to which the realist has no counterpart.

The modal realist can concur with Blackburn that claims of B/A supervenience without necessity are especially difficult to justify. The difficulty is well put in the context of a claim of such dependence of the mental on the physical, "It would be as though some people are B* and thinking of dogs and others are B* and thinking of their aunts, but there is a ban on them travelling to inhabit the same place: completely inexplicable." The dubious spatial metaphor notwithstanding, the point is well taken. However the modal realist does not (ought not!) make a claim of this kind regarding the metaphysical dependence of the modal on the actual. It would indeed be a mysterious and potentially defeating commitment of modal realism that comprised the endorsement of two possible kinds of humans - the essentially human and the contingently human- that were nonetheless not compossible. But the realism that I have defended endorses B/A metaphysical necessity in the case of modal/actual dependence in deference to first-order essentialist commitments. Accordingly, the problem of intelligibility that arises from the ban on mixed worlds in conjunction with the absence of B/A necessity does not even arise in the modal case far less provide a basis on which the projectivist may seek to gain an advantage over the realist.

(12.23) THE PROJECTIVIST ARGUMENT FROM COMMITMENT.

The argument from commitment (as we shall call it to maintain its relevance beyond the moral case) is that projectivism in representing mental states of moral awareness as active desire-based expressions of attitude, rather than passive, motivationally neutral states of belief, represents the pull to action that
is involved in the acceptance of a moral commitment. In this respect, the argument proceeds, projectivism compares favourably with a realism that construes moral sensitivity as a simple belief-based awareness of a worldly state of affairs. The inevitable accompaniment of this construal of moral sensitivity is acceptance of the view that moral awareness would always have to be supplemented with a desire in order that the agent should have even a prima facie reason to act. It also appears to follow from such a view that the cognition of a moral state of affairs could in principle co-exist in an agent with any set of attitudes whatsoever. Again, the content of the parallel case for modal projectivism is clear.

This pro-projectivist case, like the argument from economy is misdirected at secondary realism. It achieves no more on behalf of projectivism than that it compares favourably with an account of modality which severs the seemingly constitutive connection between modal awareness and the patterns of intellectual conduct in which we engage. This dialectical orientation has the consequence that projectivism is only placed to claim a significant advantage over a theory that claims that there is no constitutive connection between the cognition of modality and the course of our thinking. This is an advantage that may be held to accrue over primary modal realism, but while there may be room to doubt whether secondary realism can ultimately be successful in its attempt to square realism with the active component of moral and modal discourse, it certainly cannot stand accused of intending to represent moral beliefs as passive or contingently related to intellectual conduct. It is not the case that that which is believed to be necessary stands on a par with that which is believed to be contingent when we are faced with (potentially) recalcitrant evidence and the secondary realist is distinguished among "realists" in recognizing and attempting to accommodate this feature. The modal content of our beliefs actively regulates our procedures in such scenarios and the secondary realist acknowledges that this conceptual role is (partially) constitutive of what it is to have modal categories of thought.

The projectivist argument from commitment - like the argument from economy succeeds against primary realism but does not even apply to secondary realism.

The pro-projectivist comparative arguments, then do not appear to make so
much as a dent in a suitably sophisticated realism but the realist still has a more
direct challenge to face.

(12.30) **BLACKBURN’S CRITIQUE OF REALISM: (a) THE PERCEPTUAL
MODEL OF AWARENESS**

There are two strands to Blackburn’s critique of McDowell’s moral realism. The
first and less important of these is a critique of the perceptual model of moral
awareness; the second concerns the realist’s conception of the proper scope of
explanation and the role of explanatory considerations in the resolution of the
realist/projectivist dispute.

The critique of the perceptual model can be dealt with swiftly. The appropriate
response to the allegation of the vacuity of the perceptual model of moral
awareness is to concur. The case for so responding has already been made
along with the claim that the prospects of an illuminating perceptual model of
modal awareness are even more dismal.\(^\text{17}\) So, while the critique of the
perceptual model of awareness may apply to McDowell’s moral realism, there
is no perceptual model of modal awareness incorporated within secondary
modal realism as adumbrated here.

(12.31) **BLACKBURN’S CRITIQUE OF REALISM: (b) - THE REALIST
CONCEPTION OF EXPLANATION**

McDowell’s most important arguments in favour of moral realism are arguments
which are intended to establish its explanatory advantages. In the course of
making the positive case in favour of realism McDowell argues:

(i) that values indeed fail an explanatory test which is often mooted as *the*
    explanatory test for reality.

(ii) that this test does not have the status of a unique explanatory test for
    reality.

and

(iii) that moral values pass a more sophisticated and equally valid
    explanatory test for reality.\(^\text{18}\)

Blackburn offers two criticisms of McDowell’s conception of the explanation of
value experience.\(^\text{19}\) It will be argued that these criticisms are both wide of the
mark and that a proper understanding of McDowell’s position reveals genuine
explanatory considerations which can be marshalled in favour of modal realism.

(12.32) **McDowell's Appraisal of Explanatory Tests for Reality**

McDowell's evaluation of explanatory tests for reality depends upon the recognition of two important distinctions. The first distinction is the familiar distinction between kinds of explanation, specifically between causal (C) explanations and non-causal (N) explanations. The second distinction is a distinction between kinds of explanatory test that relate to our experience or awareness of a given range of phenomena, \( \sigma \). These are (T1) and (T2) respectively:

(T1) *If \( \sigma \) vocabulary is indispensable in the explanation of \( \sigma \) experience, then \( \sigma \) states are real.*

(T2) *If the explainer cannot consistently deny the reality of \( \sigma \) states, then \( \sigma \) states are real.*

By simple combination of kinds of explanation with kinds of explanatory test we have four explanatory tests for reality to consider viz: (CT1), (CT2), (NT1) & (NT2).

The reality of values, McDowell argues must be judged relative to a reasonable combination of kind of explanation and kind of test and his conclusion is that values are real in virtue of their satisfying the test (T2) for a non-causal, normative style of explanation. That is to say the appropriate explanatory test for the reality of values is (NT2). Why is this explanatory test reasonable.

The first consideration that is offered is that (T1) tests are *in general* inappropriate tests of reality no matter how interpreted. The test which emerges from the causal explanatory interpretation of (T1) is unreasonable from a secondary realist point of view since not even secondary properties pass it. Indeed, if the standard is the indispensability of \( \sigma \) vocabulary in causal explanations of \( \sigma \) experience, only primary properties will turn out to be real.21

But McDowell seems to want to urge the point against (T1) tests more generally than under the causal explanatory interpretation. He writes:

"The right explanatory test is not whether something pulls its own weight in the favoured explanation (it may fail to do so without thereby being explained away), but whether the explainer can
consistently deny its reality." 22 (My emphasis J.D.)

On this basis the test (NT1) is excluded from consideration as well. This leaves the case of test (CT2) to consider and this, McDowell rules irrelevant to the reality of values. He writes:

"...a virtue (say) is conceived to be not merely such as to elicit the appropriate 'attitude' (as a colour is merely such as to cause the appropriate experiences), but rather such as to merit it. And this makes it doubtful whether merely causal explanations of value experience are relevant to the explanatory test, even to the extent that the question to ask is whether someone could consistently give such explanations while denying that the values involved are real." 23

So the test (NT2) emerges as the explanatory test since it is the only test which is both relevant in relating to non-causal modes of explanation and reasonable in imposing a requirement which falls short of the indispensability of the relevant vocabulary in explanations.

No further comment will be made on McDowell's reasoning at this stage. I turn now to address (in turn) Blackburn's criticisms of McDowell's conception of the explanation of value experience.

The first of these is that McDowell has, in effect, misrepresented the nature of the explanatory interest that is exhibited in certain familiar aspects of our practices of enquiry. [12.330] The second is that McDowell's conception of value experience renders the aspiration to frame causal explanations of value explanations illegitimate. [12.331]

(12.330) BLACKBURN'S FIRST CRITICISM OF McDOWELL’S APPRAISAL.

Blackburn gives the following account of McDowell's case for the explanatory advantages of a realist theory of value over a projectivist theory:

"In effect it uses the 'interest-relative nature of explanation to cite contexts in which proper explanations of various verdicts can be given by citing supposedly projected states of affairs. 'Why did I find that frightening/ funny/ appalling?' It can satisfy the interest behind such questions to answer 'Because it merited fright/ mirth/
humour.' 'Why do we find human happiness good?' 'Because it is good.'

He goes on to make the point that there is no good reason to read into these patterns of question and response anything of more significance than the desire on the part of questioner and respondent to establish whether some local error has occurred. The questioner can be viewed as expressing a suspicion that in the subject's finding this particular thing frightening (funny/appalling/good), what is being exhibited is a strange or anomalous departure from the kind of evaluation that would be expected in the normal course of things. The respondent may be seen as articulating the conviction that no such departure has occurred and that in fact the evaluative verdict that has been called into question is a part of normal, non-anomalous, non-surprising evaluation. Hence Blackburn's illuminating comment:

"Compare: 'why do we say that the cube root of 1728 is 12?' 'Because it is 12.' "

This sober appreciation of the lack of metaphysical significance of the given pattern of question and response is perfectly in order. However, it does not speak to the kind of explanatory consideration upon which McDowell's case is rested. It is true that McDowell's case does, in effect, involve an appeal to the interest relativity of explanation but it does not involve such an appeal in the way that Blackburn suggests. The explanatory test to which McDowell appeals is, as we have seen, the test (NT2) and, indeed, part of his reason for fixing upon this test was that we have more explanatory interests than causal interests and, accordingly, we should not always expect a causal-explanation based test to be appropriate. Now a realist who wished to defend the (NT1) test might also be well advised to appeal to such relativity of our explanatory interests. But the relevant considerations are (i) that Blackburn's point makes sense as a criticism of an (NT1) realist but (ii) McDowell's realism is not based upon the success of values vis a vis (NT1).

To uphold (NT1) realism is to uphold the reality of values on the grounds that needed normative explanations of our value experience cannot dispense with evaluative vocabulary. Thus, the proponent of (NT1) realism might well want to argue that the only satisfactory, genuinely explanatory, responses to the explanation seeking questions of the kind, why does X find this good, are
those which involve a reality affirming emphasis of the presence of the
evaluative property (it is good) or those which invoke the normative propriety of
the detection of the value (it merits such a response). Blackburn's rejoinder can
then take its course but it is of no consequence to McDowell's case since
McDowell's case is not based upon the purported indispensability of evaluative
vocabulary in explanations of value experience. Moreover, perhaps the
irrelevance of this rejoinder is to be explained on the basis that Blackburn has
mislabeled (NT1) for the other criterion upon which McDowell's realism in fact
rests i.e. (NT2)

(12.331) BLACKBURN'S SECOND CRITICISM OF McDOWELL'S
APPRAISAL
There is a second criticism of McDowell's realism which can be developed from
Blackburn's remarks concerning the realist critique of projectivism. Although he
hesitates to attribute the view directly to McDowell or for that matter any other
moral realist, it is clear that Blackburn associates with moral realism a quietist
attitude which deems illegitimate, or at least forlorn, the quest for naturalistic
explanations of moralizing. Blackburn views a projectivist metaphysic (and
the associated opposition to the perceptual model of moral awareness) as
giving space to a wider explanatory interest which realism-cum-quietism
dismisses. The role of this wider explanatory interest is introduced by way of a
further mode of response to the questioner who asks Why does X find Y
frightening / good?
"This questioner may be asking why we find something frightening
because he finds any such reaction puzzling: why do human
beings ever feel fear, or get as far as supposing that anything
merits fear? No doubt there is an answer to hand: one which talks
of the behavioural consequences of the emotion, and their
evolutionary advantages to creatures that have it. In a similar vein
we try to place the activity of moralizing.... In particular we try to fit
our commitments into a metaphysical understanding of the kinds of
fact that the world contains: a metaphysical view which can be
properly hostile to an unanalysed sui generis area of moral...
facts."27
The suggestion that realism is predisposed against this intellectual outlook comes with the following question and characterization:

"Could it be that this explanatory interest is somehow unjustified: that explanations of a certain type cannot be had, or that the desire for them is the desire for an illusory 'external' viewpoint outside of all standpoints and perspectives? This is the justification for not having or wanting an explanatory theory along my lines at all."

There are many strands to this criticism and it is important to take care in their separation.

The first strand concerns quietism. That which Blackburn characterizes as a justification for rejecting the style of explanatory theory on offer might be associated with certain aspects of McDowell's Wittgensteinian strictures against "externality" or the hankering after a "sideways on" perspective on our moral and mathematical procedures. Moreover it might be said that McDowell could have been more emphatic in distancing his meta-theory of the moral from the quietist overtones which are undoubtedly present in the Wittgensteinian philosophy of mathematics which he invokes in order to bolster his meta-theorizing. If quietism were to emerge as a feature of McDowell's moral realism then it would stand as a further feature of this moral realism that would be an unwelcome feature of a generalized secondary realism. With respect to quietism, as with respect to the perceptual model of moral awareness, the secondary realist can take Blackburn's point. But, in defence of McDowell there is no indication in McDowell's main critique of projectivism that he is endorsing such quietism.

The second strand of Blackburn's criticism is based upon the detection of an anti-naturalistic current in moral realism, but this detection is also dubious. What McDowell is sceptical of, and rightly so, is the suitability of causal explanations of our awareness of values to exhaust the region of our legitimate explanatory requirements. The point is that the response of a properly functioning sensitivity to virtues is merited and not just elicited and that...

"... this makes it doubtful whether merely causal explanations of value are relevant to the explanatory test." (My emphasis - J.D.)

This consideration, of itself is quite neutral with respect to the question of whether (broadly) causal explanations of our practices of moralizing and
modalizing are possible or desirable, but it stands as a bulwark against the (imperialistic) aspirations of a certain kind of naturalism to displace non-causal modes of explanation and to colonize all of explanatory space.\textsuperscript{32} The stand of the realist, we might say, is non-naturalistic as opposed to anti-naturalistic. The position is not, as Blackburn has it, that only anti-realism is willing and able to accommodate the eminently legitimate aspiration to develop naturalistic explanations of our modal (and moral) responses to the world. The position is that the realist is railing against (what the realist takes to be) the illegitimate aspiration to develop, to the exclusion of other explanatory projects, only explanations of our modal (and moral) responses to the world which are purely naturalistic.

(12.4) A FINAL STATEMENT OF SECONDARY MODAL REALISM.

It is now possible to characterize extensively the self-image of secondary modal realism. Secondary modal realism embraces a conceptualist epistemology of metaphysical modality and a best-judgement-reflecting standard of truth in modal judgements; it embraces an ontological conception of these modalities as anthropocentric yet genuine features of things; it recognizes the duality of descriptive and non-descriptive role as an essential feature of modal claims and it departs, at crucial junctures from traditionally recognized realist themes. This secondary modal realism is not vulnerable to the projectivist's argument from metaphysics since it views strong metaphysical supervenience of metaphysical modalities upon actual properties as a necessary condition of intelligibility in a theory of metaphysical modality. Secondary modal realism neither requires a perceptual model of our modal awareness, nor depends upon the acceptance of quietism, nor repudiates aspirations to explain naturalistically the phenomenon of our modalizing.

No doubt there is much to be said both on the matter of the tenability of these marks considered both individually and when evaluated in terms of their mutual consistency. However, my final remarks will not be concerned with an attempt to bolster the secondary modal realist's entitlement to any one, or to any given combination, of these features. Rather, I will be concerned to attempt to indicate and to dabble in the region into which the secondary modal realist must venture if the positive case for secondary modal realism is to be developed.
Thus far, the discussion of the explanatory tests of moral reality has been confined to defending McDowell's construal of these against Blackburn's attacks, and I have argued that the attacks miss their target. However, this is not to say that McDowell's explanatory case for moral realism is unproblematic. In this final section, I will argue that there is a significant lacuna in McDowell's positive case for moral reality and I will attempt to indicate how a secondary modal realist ought to react to this position.33

McDowell's case is that values are real and determined to be so by the (NT2) explanatory test for reality, i.e. values are real since one who indulges in the (perfectly legitimate) practice of attempting to provide non-causal explanations of our value-experience cannot consistently deny the reality of values. But before the secondary modal realist can attempt to gain honest title to modal reality by this route, some tough questions concerning the status of the (NT2) test must be addressed. The criticism that leaps to mind in connection with McDowell's claim of the reality of values is that we lack a reason for holding that our interest in these non-causal explanations of, say, the fearful,...

"..will simply not cohere with the claim that reality contains nothing in the way of fearfulness."34

Or to put the matter in a different way, it is not at all clear why McDowell takes the view that the intelligibility which non-causal explanations confer on our responses is undermined by a claim of the non-reality of the fearful.35 What is amiss here is one of two kinds of supplementary contribution. The first would be a general case which purports to establish that (what we might call) fictionalist or instrumentalist - i.e. reality-denying - conceptions of non-causal explanations always undermine the intelligibility of our relevant responses. The second would be a case specific to values (modalities) which drew, explicitly or implicitly, upon some general criteria of demarcation, i.e. criteria which enabled us to separate those cases for which instrumental conceptions of non-causal explanations of our responses do undermine the intelligibility of relevant responses, from those in which instrumentalism does not, or need not, have that effect. How then, should the secondary modal realist proceed?
Two considerations suggest that the pursuit of a locally based, rather than a globally based, case against modal instrumentalism will prove more rewarding. The first is that there is a consideration of economy that militates against a generalized anti-instrumentalist strategy. The modal realist is (of course) prepared to bear the cost of modal ontology, but to rest the case for accepting this ontology on a generalized anti-instrumentalism would be to buy in incautiously to a potentially enormous ontological commitment. The reason is simply that a generalized anti-instrumentalism brings in its wake a new batch of ontological commitment for each case in which we have a non-causal explanatory interest in some kind of "response" that we exhibit. To put matters another way, without the potential safety-valve of instrumentalist construal, ontological commitments will proliferate (via (NT2)) to match our interests in non-causal explanations of our phenomenology.

The second consideration which promotes the attraction of a local opposition to modal instrumentalism is that while the enormity of the task of pursuing a generalized anti-instrumentalism is prohibitive, we have at least a clue about the lines along which a modal anti-instrumentalist case may be constructed.

SCOPE FOR FURTHER WORK (b): AN ATTEMPT TO FILL THE LACUNA IN THE MODAL CASE AND A TRANSCENDENTAL ARGUMENT FOR MODAL REALITY

McGinn claims that the analogy between mathematical and modal theories with respect to empirical conservativeness contrasts with an important disanalogy between the explanatory profiles of mathematical and modal theories. He writes:

"Field... argues plausibly that the role of mathematical statements in scientific explanations is extrinsic to the phenomena being explained: and this is an important part of his case for adopting a fictionalist attitude towards mathematical sentences. However, it seems that modality is not thus extrinsic to the explanations: for one does not have a genuine explanation unless modalities are implicated - so it would not be feasible to combine a realist account of scientifically explanatory sentences with fictionalism about their modal status."
Now, it must be emphasized that McGinn's remarks are not offered with our present concerns directly in mind and, furthermore, that his remarks concern, in the first instance at least, causal explanations. However there are elements within this remark which bode promise for the secondary realist's explanatory-test defence of modal reality.

The crucial thought is contained in the thesis that *one does not have a genuine explanation unless modalities are implicated*. This thesis might be developed in two ways to illuminate the issue of the status of our (NT2) test.

In the first place, given the (only slightly) more explicit thesis that *all explanations implicate modalities*, it follows *a fortiori* that explanations of our *modal experience* implicate modalities.

In the second place, the thesis ought to be interpreted in lines with the T2 conception of an explanatory test [12.32] as I shall now proceed to argue.

The content of the thesis that *all explanations implicate modalities*, hangs delicately upon the ambiguity of "implicate". A T1-reading of the (latter) thesis yields an interpretation according to which modal vocabulary is indispensable in the explanation of modal experience. A T2-reading of the thesis yields an interpretation according to which the explainer cannot consistently deny the reality of modal states. The first of these interpretations appears simply implausible, for while it may be the case that explanatory claims depend for their explanatory status upon their modal status, there can be no question of statements whose modal status is not manifest in their syntax failing of explanatory status. For example, while the theorems of a genuinely causal-explanatory theory may have to be counterfactual -sustaining in order to fulfil a full and genuine explanatory role, there is clearly no bar to formulating the relevant theory in purely actualist vocabulary. This point would appear to apply *mutatis mutandis* to non-causal modes of explanation. A fact which is well attested when we consider those actualist (in vocabulary)normative explanations of our experience of values (and of the fearful and suchlike) which McDowell illustrates. The second interpretation, i.e that the explainer cannot consistently deny the reality of modal states seems at least *more plausible than the first*. McGinn's case would appear to be that we know *a priori* that there can be no nomanilizing of the modalities that support explanatory activities since a purportedly modally-nominalized explanation *simply fails to be an explanation.*
If this thought is correct, then we have in the modal case a kind of guarantee against the possibility of denying the reality of modalities which feature in explanations which does not hold for evaluative components. The comparable security of modal reality might be illustrated in the following way.

If we had a complete naturalistic explanation of moralizing, i.e. of what it is and, quasi-realistically why we do it, then there would have to be at least scope for doubt as to whether the kind of non-causal explanatory interest which McDowell taps would have any further locus. McDowell clearly thinks that this kind of non-causal interest is ineliminable. But insofar as they are discernible, his grounds for this view are that the naturalistic explanatory project is incompletatable rather than that it leaves something out even when, by its own lights, complete. So, in one sense, the question of whether values are real hangs upon whether the naturalistic explanations of the kind the projectivist lionizes are to be had. If McGinn’s thesis of the intrinsincness of modalities to explanations is correct, then the dispute between the modal realist and the modal projectivist differs from the moral dispute in a crucial way. If the projectivist enterprise of naturalistic explanation is wholly successful, it will still be the case that real modalities have succeeded in getting in behind, as it were, the causal explanation of our modalizing, for we cannot have genuine explanations - even explanations of our own modalizing - that cohere with the denial of the reality of the modalities which are intrinsic to the explanatory practice.

Three final comments are in order concerning this “transcendental” argument for modal reality which has emerged from the consideration of the explanatory test for reality.

The first is that the claim that lies at the heart of the argument, i.e. that all explanations implicate modalities stands as an eminent potential target of attack. I have not attempted to defend this claim here since I have no clear sense of how it might be defended and not because it strikes me as standing in no need of defence.

The second is that the argument may seem to establish at best only the reality of causal modality since it is causal modality which sustains, in the relevant sense the practice of naturalistic (ultimately causal explanation). However, to concede this much would be to prompt the secondary realist about
metaphysical modality to argue, as Wiggins has, for a dependence of causal modalities upon "the de re must of essence" and to seek to gain the reality of metaphysical modality thereby.

The third and final comment is that the transcendental argument will be of interest to the afficianado of the modal realist/projectivist dispute not least because its applicability to the modal case and its inapplicability to the moral echoes a theme which already haunts the modal quasi-realist. Namely, that the phenomenon of modalizing unlike that of moralizing appears to overflow the bounds of the naturalistically explicable.

(12.6) CLOSING STATEMENT

The assessment of the health of modal realism which emerges from this thesis is brief but not pessimistic. The conceptions of modal realism due to Lewis and McGinn do not yield plausible views of the modal but moreover they leave one with the sense of not having got to the heart of the question of the objectivity of modality. The secondary modal realism which has been developed here is not short on attractive features, indeed it has been constructed with a view to accommodating these. Furthermore, in attempting to provide a realist contrast to quasi-realist projectivism it does, I claim, get to the heart of the question of the objectivity of modality by responding directly to Blackburn's challenging agenda. The dialectical obligations of the would-be secondary modal realist are of three kinds. Firstly, to earn properly the right to those attractive features of modality which have traditionally been associated with an anti-realistic metaphysical outlook - in particular, the function of modal claims as what I have termed "commitments"; secondly, to investigate more thoroughly the mutual consistency of the marks of secondary modal realism which have been claimed here on their individual merits; thirdly, to accept the challenge of refining and clarifying the explanatory tests for reality which McDowell has placed on the agenda but whose defence remains to be constructed.

My view is that the health of modal realism depends squarely upon the satisfactory execution of these tasks. This is not in itself a pessimistic overview, but that these regions are all but uncharted reflects well the lack of modal realist progress since the re-birth of metaphysical necessity.
APPENDIX A:
THE VIABILITY OF THEORIES OF TRUTH FOR LANGUAGES CONTAINING MODAL OPERATORS

(A.0) INTRODUCTION
The viability of a homophonic theory of truth for a language containing modal operators emerges as an issue of great philosophical interest. The pursuit of the project is motivated in two main ways:

(a) The rejection of possible world semantics will only be properly credible when successful alternative semantic proposals are shown to be available.\(^1\) If a homophonic theory of (absolute) truth can be provided for a modal operator language \(L_m\), this will provide the basis for the attainment of a variety of semantic goals, perhaps most notably those associated with the "Davidsonian programme".\(^2\)

(b) The semantic claim of 'non-cognitivism' is that the (non-)cognitive role of a certain class of sayings is such that they are not, strictly speaking, truth-evaluable. The availability of an adequate theory of truth for a class of sentences stands as a one-way test in a cognitivist/ non-cognitivist dispute.\(^3\) If the truth-theoretic treatment of a contentious class of declarative sentences proves straightforward, this, of itself, is no feather in the cognitivist cap. If it proves that the sentences are not susceptible to the processing, then this is a powerful semantical point in favour of non-cognitivism. In this way, truth-theoretic considerations impinge on the question of the (non-)cognitive role of declarative modal sentences. [See Ch.6]

In a seminal paper\(^4\) Peacocke argues that an adequate theory of (absolute) truth is constructible for a language containing modal operators. The acceptability of Peacocke's approach palpably depends upon the acceptability of a methodological principle and an associated strategy for semantic theorizing. No justification of this principle is offered by Peacocke or, as far as I know, by those who accept the theory of truth that he proposes.\(^5\)

Davies also claims to have provided an adequate theory of truth for a language containing modal operators\(^6\) albeit modal operators with slightly different semantic properties from those with which Peacocke is concerned. Davies'
theory depends upon methodological principles in addition to those required in Peacocke’s case although, again no justification of these is forthcoming. Many serious difficulties can be raised in connection with the methodological principles (and the associated strategy) upon which the acceptability of these truth theories depend. My position is that the right to the truth theoretic “results” has yet to be earned and that it can only be earned by addressing, and then overcoming, these difficulties. My tentative conclusion is that no case against Peacocke’s theory is proven and to that extent at least the right of access to the theory of truth is defensible.

I will deal in SECTIONS ONE and TWO with Peacocke’s theory and the issues that it generates. I will deal in SECTION THREE with Davies’ theory and the further issues that are raised by that style of theory alone.

SECTION ONE

(A1.0) PEACOCKE’S TRUTH THEORY

Peacocke presents a truth theory for a simple modal propositional language, Lo, with two unstructured sentences, "P" and "Q" along with the sentential operators "~", "&" and "□".7 The axioms are as follows:

(T1) □ [TRUE ('P', Lo) <-> P]
(T2) □ [TRUE ('Q', Lo) <-> Q]
(T3) □ [TRUE (' ~A', Lo) <-> ~TRUE (Lo, A)]
(T4) □ [TRUE (' A & B', Lo) <->TRUE (Lo,A) &TRUE (Lo,B)]
(T5) □ [ TRUE (' □ A', Lo) <-> □ TRUE (Lo, A)].

Here, "A" and "B" are variables over Lo sentences and axioms (T3) - (T5) are abbreviations of their universal closures.

Every instance of the schema (S):

(S) □ [TRUE (Lo, ' α ') <-> α ]

is provable in such a theory as long as we assume that the logic of the proof theory is at least as strong as quantified S4.8 So the theory is of sufficient strength to generate strict truth-conditions as well as material truth-conditions for each sentence of Lo. (The strict conditional is equivalent to the necessitated material conditional " □ (P->Q)"). The theorems required by Convention T, i.e. every instance of the schema (M):

(M) TRUE (Lo, ' α ') <-> α
are only derivable via their necessitations.

(A1.1) WALLACE'S OBJECTION TO PEACOCKE'S TRUTH THEORY
This theory is an appropriate target of an objection which has it that necessitated T-theorems and, therefore, theories that imply them, are false. The possibility that is appealed to in order to support the allegation of falsehood for the necessitated T-theorems is that words might have had different meanings. Gupta rehearses the argument for the falsehood of (1):

(1) □ ('Lizzy is playful.' is true in English <-> Lizzy is playful.)
"...if 'Lizzy' in English had been used to talk about, say Martha - the morose and unplayful child - then the sentence 'Lizzy is playful' would have been false. Though of course the change of name would leave Lizzy's playfulness unaffected."10

(A1.2) REPLY: THE ESSENTIALIST PRINCIPLE
Peacocke considers what is essentially the same objection as it pertains to a consequence of a substitution instance of (T5) i.e (2):

(2) TRUE [ (Lo, □ (~ (P& ~P)') <-> □TRUE ( Lo, (~ (P& ~P)' ) ]
He writes,
"This is said to be false because ... '~'and '&' might have meant something different...... Not so: the right side says that necessarily the expression '~(P& ~P)' is true in Lo and those expressions could not have meant anything else in that very language Lo. (Lo is a proper name of that language.) Languages are here identified by the meanings of expressions in them and a language in which '~' meant something other than negation would not be Lo."11
He then generalizes:
"This position has the consequence that if the language parameter place of the semantic predicates used in a truth-theory is filled by a proper name, the axioms will generally each be necessarily true or necessarily false."12
Clearly, this case for the necessitation of the axioms of the theory applies equally to the theorems.
The principle that is invoked by Peacocke, and upon which the acceptability of
his proposed truth-theory depends, is what we might call the essentialist principle: a language has its semantic properties essentially. No justification of this principle is offered by Peacocke or, as far as I know, by those who accept the theory of truth that he proposes. However the principle hardly presents itself as one that stands in *noneed* of justification and, indeed, it is susceptible to a variety of objections. Accordingly, the task of providing a philosophically adequate theory of truth for the modal operators is unfinished for it involves a defence of the essentialist principle and no defence of the principle has been forthcoming.

I propose to offer a defence of the essentialist principle considered in the context of the *theoretical* projects that it regulates. That is to say the guiding question is whether semantic theorizing improves or deteriorates when it is conducted on the basis of theories in which the principle is incorporated. In order to tackle this question, I would like to locate the essentialist principle in a slightly extended context - one which affords a specific conception of what a language is.

The essentialist principle has the consequence that languages are *modally inflexible*, i.e. a language cannot survive a counterfactual variation in its semantic properties. What I want to suggest is that modal inflexibility is naturally accommodated along with temporal inflexibility - a language cannot survive any change over time in the meaning of the expressions that it contains - in a conception of languages as abstract objects. Moreover, far from standing in opposition to any deeply entrenched canons of semantic theorizing, this conception is reflected in the presuppositions of many familiar theoretical projects. I do not claim that this is the only way in which the essentialist principle can be defended, only that it strikes me as the most promising way of proceeding. My main aim is to show where acceptance of the essentialist principle leads and to chart the territory upon which a more thorough defence must be mounted. I will develop my position through a series of responses to objections against the essentialist principle.

(A1.3) **THE FIRST OBJECTION TO THE ESSENTIALIST PRINCIPLE: INITIAL MISCONCEPTIONS DISPELLED.**

If the conception of languages as temporally and modally inflexible is to stand
any chance of acceptance then an effort has to be made to square that conception with the strong intuition that languages could and do survive changes of meaning on the part of the expressions that they contain. There is obviously and undeniably a contingency in the association of our signs with the uses in which they are deployed - that is why the situation that Gupta described is perfectly intelligible. Equally, there exists, obviously and undeniably, the phenomenon whereby the use of a sign changes over time. These points are not at issue; the only issues concern whether and how these features can be represented theoretically. I will illustrate, by dealing with a relevant objection, how these phenomena can be given theoretical representation by one who wishes to uphold the modal inflexibility of languages.

Anil Gupta makes a point which suggests that proponents of the essentialist principle are at a loss to represent these phenomena given the conceptual resources to which they restrict themselves. He proposes that we recognise two concepts of truth "both of which are present in our ordinary conceptual scheme." He proceeds:

"On the first concept here represented by $T_1$ ($= \text{is a true}_1 \text{sentence of L}$) a sentence $A$ is true in a world $W$ if and only if $A$ is true in $W$ with the meaning it has (in $L$) in $W$. On the second concept of truth $T_2$... a sentence $A$ is true in $W$ if and only if $A$ is true in $W$ with the meaning it has in the actual world." It is a consequence of the essentialist principle that only $T_2$ is in order. If the distinction between $T_1$ and $T_2$ is to be non-trivial, the acceptability of $T_1$ depends upon the purported possibility that a sentence of a given language $L$ may vary in meaning from world to world and this "possibility" is not consistent with the rigidity of the term "$L$". To put the point in a slightly different light, it would follow that our necessitated $T$ theorems were false if truth were interpreted a la $T_1$ but true given the $T_2$ interpretation.

Gupta wants to say, moreover, that we must recognize both concepts of truth if we are to keep faith with our natural, practical judgements concerning semantic counterfactuals. But, if we must, the essentialist principle is clearly damaged since its acceptance militates against recognition of a concept (truth a la $T_1$) which is apparently required in our semantic theorizing.

The case that is intended to compel our acceptance of $T_1$ is based on the
consideration of these semantic counterfactuals:

(3) If "red" were to mean what "white" means then snow would be red.

(4) If "red" were to mean what "white" means then "snow is red" would be true (in English).

The case proceeds:
"Intuitively we judge (4) to be true but (3) false. If so, then 'true' in (4) must be understood as expressing the first concept of truth. If it expresses the second concept, (3) and (4) say the same thing and hence have the same truth value." [Here I have substituted my own enumeration for Gupta's.]

The most attractive form of rejoinder on the part of the proponent of the essentialist principle will be to show that the intuitive contingency, which underpins the natural acceptance of (4), can be represented in a way that does not involve recourse to the concept $T_1$ or to any other concept whose content is not consistent with the essentialist principle. Such a rejoinder is available.

The first move in dealing with (4) will be to replace it with a formulation that embodies a relativization of semantic concepts to a language viz;

(5) If "red" were to mean (in English) what "white" means (in English) then "Snow is red" would be true (in English).

The best that can be said of this counterfactual is that it is trivially true since it has an impossible antecedent, but this clearly is not the ground upon which (4) merits assent. That assent is given on the basis of the perceived contingency in the sign-meaning relation and the representation of that contingency can be expedited as follows:

(6) If "red" were to mean (in Twin-English) what "white" means (in English) then "Snow is red." would be true (in Twin-English) where Twin-English is just like English except that "red" refers in Twin-English to white and "true in x" is interpreted a la $T_2$. (An obvious parallel can be constructed to represent our intuitive judgement of the temporal flexibility of the sign-meaning relation.)

In summary, then, the rejoinder to Gupta is that the intuitive contingency of the sign-meaning relation can be represented as the contingency that one language, rather than another, is the actual language of the population.
Now, the outstanding drawback with this proposal is that it renders every change in the semantic properties of expressions sufficient for a change of language. The slightest counterfactual variation in the referent of a name -- as when "Lizzy" refers not to Lizzy but to Martha -- demands description as a scenario in which a different language is being considered, and this we would not ordinarily, or intuitively, endorse. Now, this consequence is indeed counter-intuitive and, it must be conceded, phenomenologically inaccurate. But, if we are prepared to allow that these considerations cannot of themselves be decisive, then the proponents of modal and temporal inflexibility are not defeated by the noted phenomena.\textsuperscript{18}

(A1.4) THE SECOND OBJECTION: ESSENTIALIST SEMANTICS IS NON-EMPIRICAL

Peacocke claims that the acceptance of (what is in effect) the essentialist principle presents no obstacle to the conception of the study of language as an empirical study. In an earlier paper\textsuperscript{19} he presents a strategy for the construction of a theory of meaning - the actual language strategy - that provides us with a context in which this case may be developed.

In the last section it was proposed that we should represent the flexibility of the sign-meaning relation as one rather than another language being the actual (current) language of the community. It is an empirical matter to establish which language is the actual language of the community. Roughly speaking, a language L can be identified as the actual language of a population P if its sentences, their syntactic and semantic properties fixed by the truth theory, match the empirically ascertained content of the population's utterances. The empirical component is, as usual, a matter of relating patterns of assent and dissent to reasonable patterns of belief. For present purposes, nothing turns on accepting any particular version of the empirical constraints on interpretation. What is important here is to appreciate the role of both empirical and non-empirical components of semantic theorizing. An analogy with the application of mathematics - in particular with geometry - helps our appreciation here.

Let us accept that space is not but might have been Euclidean, then we can represent this contingency in the claim that Euclidian space might have been
actual. It is not a contingent fact about Riemannian space that triangles of
different areas have non-equal angle sums but it is contingent that Riemannian
space is actual. It is an empirical matter to establish which space is actual. Our
theory of space is sensitive to the observations and measurements that we can
make and, they are defeasible in the light of these considerations. However, in
the course of this project we deploy pure geometry with all of its resources
including a variety of logically possible spaces whose structural properties are a
matter for \textit{a priori} determination. The scientist then attempts to gain evidence
that will help us to select among hypotheses that are \textit{a priori} possibilities, e.g.
that space is Euclidean, Riemannian etc.

Davidson has also urged that the distinction between pure and applied
semantics should be appreciated by way of analogy with that between pure and
applied geometry. In his view we should not claim that there are two different
kinds of languages, formal and natural. Rather we can be interested in
languages in two kinds of ways. For certain purposes we fix the relevant
features of an object-language under study by stipulation - all that we could
want to know is known exactly and completely: an enterprise of this kind is
purely \textit{a priori}. But when we are interested in the empirical study of language
our hypotheses are..

"\textit{open to test, subject to error and doomed to be to some extent
incomplete and schematic}".

This is not true when we deal with pure, abstract semantical structures but when
this fact is located in methodological context it provides no threat to the idea that
a theory of meaning should be an empirical theory.

\textbf{(A1.5) THE THIRD OBJECTION: A PLATONISTIC EPISTEMOLOGY OF
UNDERSTANDING}

If languages are to be regarded as some kind of abstract object then we must
explain how we can make this claim without a commitment to a Platonistic
conception of the epistemology of understanding.

In the first place, understanding, or language mastery, or linguistic competence
must be construed as a range of \textit{abilities} to execute and respond to appropriate
speech acts. Certainly we speak of an agent's understanding as \textit{knowledge of}
a language, but it is a fantastic misconception to attempt to extract from this
an epistemological commitment to explain understanding on the model of cognition of an object. From the standpoint of our interest in the epistemology of understanding it is of relatively minor importance whether a language is supposed to be an abstract, as opposed to a psychological, concrete or whatever other kind of object, for understanding is not a matter of training a cognitive faculty on any kind of object - it is not like perception.23

But even if this insight is rejected and one is determined to harbour a relational (a knowledge of) conception of the epistemology of understanding, the actual language strategy still provides no guaranteed route to a platonistic epistemology. Even given that the actual language strategy unequivocally brings in its wake an ontological commitment to abstract objects, it must be emphasized that the strategy is a strategy for the theory of interpretation. But the theory of interpretation need not, and perhaps ought not be conceived as a theory of understanding. Once we absolve a theory of interpretation of the responsibility of generating a set of rules or instructions grasp of which purportedly explains native speakers' (implicit) knowledge of the language, there is no reason why the ontological commitments of the theory of interpretation should determine our conception of the epistemology of understanding.24

Acceptance of the actual language strategy for the theory of interpretation does not, then commit one to a view of an agent's understanding of a language as a matter of cognition of an abstract object.

SECTION TWO

This section continues to deal with objections to Peacocke's theory but for the purposes of exposition I have chosen to present it separately from the objections in section one above since the arguments are rather dense and to some extent self-contained.

(A2.1) THE FOURTH OBJECTION (MARK 1): PEACOCKE'S PRINCIPLE GIVES RISE TO CIRCULAR DEFINITIONS OF LANGUAGES.

Peacocke anticipates an objection against his proposal for the specification of languages on grounds of circularity, i.e.:

"....that the only way of specifying what "Lo", taken as a proper
name of one of these languages, refers to, is to advert to a truth theory that actually contains the name 'Lo'. "25

However, Putnam has argued (in relation to Carnap's proposal that languages be defined by semantic rules) that a worse consequence than circularity obtains when Tarski's 'semantical conception of truth' is employed for the purposes of individuating a language.26 I will adapt Putnam's central points to the present case. Consider a simple language $L_1$ defined by the use of the semantical predicate "true - in - $L_1" as follows:

\[(\text{DF}) \quad L_1 = \text{df: the language } L \text{ such that for any sentence } S \text{ of } L, \]

\[
S \text{ is true} - \text{in} - L_1 \iff \begin{cases} 
(\text{case a}) \quad (S=\"the moon is blue\") & \text{The moon is blue} \quad \text{or} \\
(\text{case b}) \quad (S=\"snow is white\") & \text{Snow is white} \\
& (\text{syntactic restriction}) \text{ no other inscription is a sentence of } L. \end{cases}
\]

A first reaction to this proposed definition may indeed be one which echoes Peacocke's mention of circularity, i.e. that the specification of the referent of the name "$L_1" contains the name "$L_1" since the name features as part of the truth-predicate "x is-true-in-$L_1". Putnam responds by pointing out that as the Tarskian conceives of the concept of truth, the predication "x is-true-in-$L_1" contains the item "$L_1" only as a syntactic part - its occurrence does not have the semantic significance of naming the language to be defined. The truth-predicate (expressing the "semantical concept of truth") that Tarski shows us how to define\(^{27}\) is to be understood as language relative in the sense that a truth predicate is defined for each language, but each truth-predicate is itself semantically unstructured. That is to say, one cannot think of "x is -true-in-$L_1" as a predicate which is built up from "x is true in $y" in the way that "Tom is the brother of Bill" can be analysed into semantically significant parts including the dyadic relation "x is the brother of y". Now the point is not simply that the Tarskian avoids circularity by choosing the syntax of the truth-theory in such a way as to avoid use of the item "$L_1" as a name. Of course we could write the truth-predicate in any way we please "TRUE(x)"", "TRUE $L_1(x)"", "T(x)". What is important is the conceptual significance of Tarski's truth-predication. Given the (semantically) dyadic relation "x is true in $y", we can form the closed sentences:
"Lizzy is playful" is true in English.

"Lizzy est folaitre" is true in French.

and, most graphically;

(9) \( (x)(\exists y)( x \text{ is true in } y) \)

all of which contain the same predicate of truth. For the Tarskian to think of the truth-predicate in terms of the structure of a dyadic relation is self-defeating since to do so is, as we see from the example, to import a universal conception of truth (i.e. truth for arbitrary or variable L). This is a conception whose definability Tarski repudiated!

Hence, when we appreciate fully the conceptual content of the semantical conception of truth, and through this the (absence of) semantic significance of the item "L_1" in the Tarskian truth-predicate "x-is-true-in-L_1", we appreciate that there is no circularity involved in defining the language name "L_1" via use of that predicate. However this appreciation leads us to another problem.

(A2.2) THE FOURTH OBJECTION (MARK2): THE DEFINITIONS MAY BE NON-CIRCULAR BUT THEY ARE ALSO NON-SEMANTIC

As intended in the semantical conception of truth, the truth-predicate "x-is-true-in-L_1", is subject to eliminative definition. This abbreviated truth predicate is (analytically) equivalent to a disjunctive predication i.e

(10) S is-true-in-L_1 \iff [(S="The moon is blue" & The moon is blue) 
or (S="Snow is white" & Snow is white)]

More generally:

".....to be [true in any given language L] is identified with the property of having the spelling of any one of the sentences of L (say the nth in some standard enumeration) and its being the case that the nth condition in a list of truth conditions recursively associated with the sentences of L_1 by the definition Tarski constructs is satisfied ." 28

When we introduce the extended, non-abbreviated truth predicate i.e. the definiens of "x-is-true-in-L_1" into the definition of "L_1" it can be seen even more clearly that the circularity, allegedly arising from the use of the name "L_1", was purely apparent. The modified definition is (DFM1):

\( /Over \)
(DFM1) \[ L_1 = \text{df: the language } L \text{ such that for any sentence of } L, S \]
\[ (S = \text{"The moon is blue" } \& \text{ The moon is blue}) \]
\[ \text{or } (S = \text{"Snow is white" } \& \text{ Snow is white}) \]
\[ \text{iff } [ \text{(case a) } S = \text{"The moon is blue" } \& \text{ The moon is blue} \]
\[ \text{or } \text{(case b) } S = \text{"Snow is white" } \& \text{ Snow is white} \]
\[ \& \text{ (syntactic restriction) no other inscription is a sentence of } L. ] \]

The defect of this definition is not circularity arising from the appearance of a semantic term "L_1" in definiens and definendum - rather it is that the definition of the language is a non-semantic definition. The only definitional characteristic of a language is the syntactic component which characterizes its sentences. Manifestly, a semantically distinct language in which the sentences "The moon is blue" and "Snow is white" are associated with truth-conditions other than, respectively, the moon is blue and snow is white will, as long as these are its only sentences, satisfy the above definition of L_1.

I accept that Putnam's case demonstrates decisively that Peacocke's proposal to identify languages by the meanings of expressions they contain, cannot be carried through by way of definitions of languages that deploy Tarski's semantical conception of truth. However the matter does not end here.

(A2.3) REPLY : A NON-TARSKIAN DEFINITION OF THE OBJECT LANGUAGE

We must consider the possibility that there may be some other way of proceeding in the definition of languages that does not rely on the semantical conception of truth. In fact it seems that Peacocke is indeed committed to an alternative procedure.

In the course of outlining the significance of the claim that the Tarskian truth predicate is not a construct from a semantically more basic predicate, "x is true in y", I remarked that this latter predicate implicitly depends upon a concept of truth in a variable or arbitrary language. Peacocke utilizes such a predicate in the style of truth theory that he proposes - it is indeed as a name that the item "L_1" occurs in Peacocke's theory. Happily, this ensures that a definition based on this semantical concept, unlike a counterpart based on Tarski's truth, will be genuinely, ineliminably semantic. However the charge of circularity based upon the appearance of the name "L_1" in definiens and definendum is now quite
appropriate and must be faced. Peacocke's own way with the charge is to claim that the use of the term "L₁" is dispensible in the definition ("specification") of the language but, unfortunately, he does not indicate how this is possible. However, we can turn again to Putnam in order to acquaint ourselves with the form that such a definition might take. We achieve the desired result by modifying the previous definition by substituting for the extended Tarskian predicate the predicate "TRUE (L,S)" where this is understood as expressing the concept of truth in arbitrary or variable L, thus;

\[ (D F M 2) L₁ = \text{df: the language L such that for any sentence of L, S; } \]

\[ \text{TRUE (S,L)} \]

\[ \text{iff [ (case a) S="The moon is blue" & The moon is blue}
\]

\[ \text{or (case b) S="Snow is white" & Snow is white}
\]

\[ \text{& (syntactic restriction) no other inscription is a sentence of L.]} \]

Putnam claims that this descriptive definition describes uniquely the language \( L₁ \). Since the definition succeeds in terms of uniqueness and avoids circularity, its acceptability will depend entirely upon the acceptability of the key concept that it employs, i.e. the concept of truth in arbitrary or variable L. The question is, then, whether this concept is acceptable. I will consider two objections to the acceptability of the concept of truth in arbitrary or variable L and then indicate a line of thought which suggests that its acceptability is pre-supposed in the project of interpretation.

(A2.41) TRUTH IN VARIABLE L: UNACCEPTABLE BECAUSE UNDEFINABLE?

It may be thought that the definability of the concept is the key here. Acknowledging that Tarski was correct in his contention that the concept of truth for variable L cannot be defined, we might then attempt to legislate the unacceptability of the concept on that basis. However, definability is not a neutral criterion of conceptual respectability in the present context for the kind of definition that Tarski has in mind is a definition that is free of semantic vocabulary. The requirement that truth for variable L should be definable by these restricted means is motivated by the attitude that semantic concepts are
respectable only insofar as they are reducible to, or eliminable in favour of, non-semantic concepts. If the respectability of a semantic concept is being held to require that it be susceptible to eliminative definition then it is clear that this criterion of respectability is not acceptable to anyone who takes seriously the view that languages are to be specified semantically. Only a concept of truth that resists definition by solely non-semantic means could possibly introduce a genuine semantic element in the specification of a language. A vivid illustration of this point has already been encountered, for it was the eliminability of is-true-in-\( L \) (à la the semantical conception) that brought about the collapse of the first definition of a language into a merely syntactic restriction.

Of course it will remain open to the objector to insist that the eliminability of all semantic vocabulary is a well motivated objective and so much the worse for any proposal to specify languages in ineliminably semantic terms. But then the quality of the objection against the concept of truth in variable L can be seen to be related directly to the plausibility of the programmatic eliminative materialism that motivated Tarski. In that case, I presume, few will be inclined to regard the objection from undefinability as carrying much weight.

A second proposal would find semantical concepts respectable just insofar as they are free of paradoxes such as those inherent in the pre-theoretical or intuitive concept of truth. The content of our intuitive concept is conferred by the use of the term "true" and its cognates and as such it is vulnerable to the liar paradox etc. So if truth in variable L is identifiable with the intuitive concept, and Putnam, for example, seems to be endorsing this identification, then it would appear that we deploy truth in variable L at the unacceptable cost of importing inconsistency into our semantic theorizing.

The rejoinder is simply that truth in variable L should not to be identified with the intuitive concept. The appropriate weaker claim is that the concept of truth in variable L models more accurately than the semantical conception the concept of truth that we ordinarily deploy. But, plainly, it does not follow from this weaker claim that truth in variable L reflects all of the features of our natural-linguistic

(A2.42) TRUTH IN VARIABLE L: UNACCEPTABLE BECAUSE PARADOXICAL?

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use of truth predicates. In particular it does not follow that truth in variable L will
give rise to semantic paradox.

There is no reason to expect that truth in variable L must *everywhere* give rise
to semantic paradox, i.e. regardless of restrictions on the kind of object
language to which it is applied. What gives rise to the paradox of the liar in our
natural linguistic deployment of the intuitive concept of truth is the application of
the truth predicate to sentences containing the truth-predicate itself. (Natural
languages contain their own truth-predicate.) This possibility does not arise for
the application of the truth predicate to the sentences of our modal propositional
object language \(L_o\) given the standard assumption that it contains no semantic
vocabulary.

The upshot is that once we repudiate the identification of the intuitive concept of
truth with truth in arbitrary or variable L we remove the only basis that there is for
holding that the latter concept is of itself paradox-laden. My conclusion is that
neither objection against the acceptability of the concept of truth in variable L
succeeds.

(A2.43) A POSITIVE CONSIDERATION : THE PROJECT OF TRUTH-
THEORETIC INTERPRETATION PRESUPPOSES TRUTH IN
VARIABLE L.

A positive approach would counter allegations of the unacceptability of the
concept of truth in variable L by arguing that the enterprise of using a theory of
truth to interpret the speech of a community *pre-supposes* the availability of the
concept of truth in variable L.

Tarski's criteria of adequacy for truth-definitions included the derivability, for
each object language sentence, of a theorem of the form (11);

\[(\text{11}) \text{ s is true in } L \text{ iff } p\]

in which the right hand side of the bi-conditional was a meta-language
*translation* of a sentence mentioned on the left. The defined truth-predicate is
introduced to us in a way that exploits, albeit indirectly, our independent access
to the concept of translation. When the semantic project is one in which we are
attempting to illuminate the notion of meaning by way of a theory of truth, we
cannot construe adequacy in the truth theory as dependent upon satisfaction of
a translation requirement. Rather it is our pre-theoretical grasp of a concept of
truth that enables us to verify T-sentences. Now this concept of truth that is within our grasp and which grounds this verification cannot be identified with the semantical conception of truth as it applies to our own or for that matter any other language. Grasp of Tarskian truth predicates could not ground our verification of T-sentences in the case of a new language under study, for each of these is a semantically distinct unstructured predicate \textit{true-in-}L_n. Our recognition of the truth of T-sentences in the interpretation of new languages seems to require that we are possessed of a truth concept which is available for application in the case of new languages i.e. a concept of truth for arbitrary or variable L. It is mastery of such a concept, it may be argued, which grounds our recognition of the familiar "true" in the new contexts "true in L_a", "true in L_b" etc. and our ability to verify T-sentences containing it.

\textbf{(A2.5) SUMMARY OF SECTION TWO}

The use of the Tarskian \textit{semantical conception of truth} for the purpose of defining a language via a theory of truth does not result in circular definitions. However, a proper appreciation of the semantical conception of truth shows that the intended definition collapses, disastrously, into a merely syntactic restriction. Peacocke's proposed language definitions utilize a distinct concept of truth, i.e. truth for an arbitrary language. Since such a definition avoids circularity, triviality and is otherwise successful in its own terms, the question of the acceptability of this definition turns entirely on the acceptability of the concept of truth it deploys. To require that this concept of truth is acceptable only if definable is to beg the question against the proposal that a language should be individuated semantically and, moreover, to do so on the basis of implausible eliminative materialist suppositions. To require that an acceptable concept of truth should be paradox-free is reasonable but the allegation that the concept of truth in variable L is paradox-laden is supported only by a gratuitous claim of identity between this concept and our intuitive concept of truth. The claim of identity is to be repudiated and reflection on the source of the semantic paradoxes indicates that there is no further reason to associate these with the application of the concept of truth in variable L. Alongside a minor positive consideration, the replies to the objections from indefinability and paradoxicality stand as the defence of the acceptability of the concept of truth in variable L. The conclusions
are (i) that the concept and the style of definition that deploys this concept are acceptable and so (ii) Peacocke's proposal to specify languages semantically - a proposal upon which the viability of the truth theory has been held to rest - is defensible.

I will comment further upon sections one and two in the conclusion of the chapter. In the meantime, I will consider a truth theory for weak necessity operators that is due to Davies. This theory extends the methodological presumptions of the previous theory in taking a position on the conditions of existence of languages in addition to acceptance of the essentialist principle and the actual language strategy.

SECTION THREE: WEAK NECESSITY

(A3.0) WEAK NECESSITY AND ITS TRUTH THEORY

There is a family of essentialist claims of a type which attribute necessities to contingent existents:

(12) It is necessary that Socrates is human.

A semantic representation of the intended content of such claims must proceed without incorporating the unintended consequence that the denotation of the term "Socrates" (i.e. Socrates) should exist at every possible world. One way of achieving this is by interpreting the sentence (12) as containing a weak necessity operator $\Box_w$ so that the sentence is of the form:

(13) $\Box_w Fa$

Kripke introduces the term "weak necessity" in the following rough formulation:

"When weak necessity is at issue we say that "$\Box(A(t_1,\ldots,t_n))$" is true if and only if with respect to every possible situation in which the denotations of "$t_1,\ldots,t_n$" exist they are A".34,35

Martin Davies defends a truth-theory that he has developed for the weak necessity operator and in so doing he is led to consider the issue of the existence conditions of languages.36 He must consider this issue, for when weak necessity is in play the truth of a meta-linguistic statement such as:

(14) $\Box_w (\text{TRUE(}"Fa",\text{Lo}))$

is dependent upon an evaluation which considers those situations in which the
denotation of "Lo" exists.

The details of Davies' theory are not of present concern - we can assume that it is perfectly viable given the methodological assumptions he makes. It is only these assumptions concerning the existence conditions of languages that I wish to discuss. The success of his project depends squarely upon the truth of these assumptions and to the extent that these emerge as questionable so does the success of the project.

(A3.1) **THE CONTINGENT EXISTENCE OF LANGUAGES UNSUPPORTED**

Davies is a proponent of the conception of languages as unchanging and unchangeable things. It may therefore seem initially surprising that he is in fact proposing that languages should be held to exist (in general) contingently. However there is no reason to demand that abstractness requires non-contingent existence. Perhaps it is in considering the natural numbers as paradigm abstract objects that we become susceptible to treating necessary existence as a mark of abstractness, for there seems to be no remotely plausible basis for treating natural numbers as contingent existents. However, Frege deploys criteria of abstractness which permits that abstract objects may depend for their existence on the existence of particular concrete objects. It follows, given the contingent existence of these particular concrete objects that the abstract objects in question also exist contingently. For Frege natural numbers are *pure* abstract objects; that is to say that they do not depend for their own existence on the existence of any particular concrete objects. Other abstract objects such as sets and sequences (whose *members* are not pure abstract objects) do depend for their existence upon the existence of their members. Consequently sets and sequences are, in general, contingently existing abstract objects. There is no reason to expect that the actual language theorists in treating languages as abstract objects is bound to treat them as pure abstract objects in Frege's sense.

The foregoing is no more than a defence of the very idea of a contingently existing abstract object, but what of Davies' positive case for including languages in this category? He writes:

"... since the objects denoted by the names of Lo exist (we may suppose) contingently and languages have their semantic
properties necessarily it is natural to allow that Lo itself exists contingently. "39

Unfortunately, herein we have the extent of the case. It may indeed be "natural" to hold that languages exist contingently if we are intent upon identifying these with empirical phenomena - the products or practices of humans in social groups in specific regions displaying mutual intelligibility, etc. On this view the existence of languages such as English, German, etc. has a contingency rooted in our existence and evolution as a species and, no doubt, what might be termed our "forms of life". But the actual language strategist is committed to interpreting such elements of contingency as the contingency that this or that language, specified semantically, is ever the actual language of a population. The actual language strategist, if he wishes to provide a justification for treating languages as contingent existents, had better look elsewhere.

(A3.2) AN ESSENTIALIST JUSTIFICATION

While Davies offers no justification of the contingent existence of languages, he does present us with a criterion of their contingency of existence; call this (CE):

(CE) A language exists in a possible situation if and only if the objects to which its names refer all exist. 40

There is a familiarity about this criterion of contingency in that it echoes the (natural) criterion of the contingency of existence of sets and sequences; these being held to exist in those possible situations in which all of their members exist. But there is no obvious relationship between these cases and that of a language - that is to say, there is no obvious justification of (CE) that can be manufactured from the thought that the linguistic case is somehow a special case of the set-theoretic. The following essentialist justification seems more promising.

Consider the thought that the semantic properties of languages are essential properties of those languages. Now, in general, we can think of essentiality of properties in this way: if object x has property P essentially then we can say of each possible situation that in that situation either x exists and is P or x fails to exist. Consequently a possible situation in which nothing has P is a situation in which x fails to exist, e.g. a possible situation in which nothing is human is a situation in which Socrates does not exist. How then might we envisage a
situation in which nothing instantiates the semantic properties of $\text{Lo}$ - a situation in which nothing could be $\text{Lo}$ - bearing in mind that we cannot take recourse to scenarios in which no such language is used? It is at this stage that the contingency of existence of the referents of the names of $\text{Lo}$ may be thought relevant. Perhaps we can argue as follows. It is essential to a genuine proper name - as opposed to other singular terms, e.g. definite descriptions - that it should have a referent in order that it be meaningful at all. So, a situation in which Socrates did not exist would be a situation in which no proper name of any language could genuinely refer to Socrates. $\text{Lo}$ could not exist in such a situation since it numbers among its essential properties that expressed in the axiom (15):

(15) $\Box_w(\text{REFERS}("\text{Socrates}"$, $\text{Lo}$, Socrates))

Similarly for each distinct referent of an $\text{Lo}$ name and so the essentiality of semantic properties can ground a case for arguing that the contingency of language existence should match the existence of the referents of proper names of the language.

I have two kinds of observation to make on this argument.

(A3.3) THE PRIVILEGED STATUS OF PROPER NAMES UNEXPLAINED

This argument, and moreover Davies criterion of contingency of language existence quite generally, confers a totally unexplained status of privilege to the proper names of the language. An adequate explanation of this status must do more than persuade us that proper names are, as it were, essentially referential - it must further persuade us that only proper names have this quality. The prospects of developing such an explanation are not promising. If the case for proper names being essentially referential is to rely on their having, in some sense, a demonstrative component $a \text{ la}$ the "direct" theory of reference then the same arguments are widely held to apply, mutatis mutandis, to at least some predicates. That is to say, even if these arguments can be sustained then it is difficult to see how Davies' condition can be a sufficient, as opposed to a necessary condition for the existence of languages. There is no ruling out in advance the possibility that some other justification of the privileged status of names may be constructible, but the obvious course of justification is not sufficient. An appropriate justification might be termed Millian in advocating the
essentiality or directness of the reference of proper names while denying this for the case of predicates or "general names".42

(A3.4) THE JUSTIFICATION THREATENED BY EMPTY PROPER NAMES.
If it is proposed that the existence of all of the referents of the proper names of a language in a possible world is even a necessary condition of the existence of that language in that world, the most obvious source of difficulty for this proposal is the phenomenon of empty or bearerless names. We can develop an argument that is designed to show that acceptance of the condition leads to disaster for the actual language strategy.

It is a direct consequence of the proposed necessary condition that no language that exists at the actual world contains an (actually43) empty name. In turn, then, no language that exists can be identified with the actual language of a community such as our own in which the use of bearerless names is a notable feature. The effect of adopting Davies' condition is, therefore, to rule out a priori the attainment of the professed goal of the actual language strategy i.e. to select on the basis of empirical constraints which semantically defined language is the actual language of the community.

It is at this point that we should bear in mind the larger picture and I think that when we do so we reach a more sober evaluation of the predicament that Davies' condition generates for the actual language strategy.

Assume that Davies' condition is not in force and that absolutely any language can be held to be available, existent at the actual world, as an a priori candidate for identification with the speech behaviour of a community of speakers. Let us now imagine that we are dealing with a case of the following kind. As interpreters of population P we find an expression which best fits our (ever -evolving) theory as being of the syntactic class whose members are used as proper names. However, despite our conviction that the expression is standardly, and uniformly used with quite serious, genuine, assertoric intent44 we can find no bearer for this "name" and come to conclude that the name has no bearer. How are we to represent the semantic properties of this expression via the resources of a theory of reference and truth?

A language, considered as fixed by legislation, is specified by appropriate semantic rules - let's say axioms given the present context. Now what, in the
context of truth or reference theoretic semantics, is the form of semantic axiom that is appropriate to deal with an empty name in a language? A semantic theory in the style of Davies deals only in austere axioms of reference, that is to say axioms such as (16):

\[(16) \Box_w \text{REF}(''a'',a,L)\]

that state barely the referent of a name. That the axioms are necessitated is irrelevant here.

Now, it seems that if a theory confines itself to such axioms it cannot model a community's use of (sentences containing) empty proper names without entailing falsehood. So let us be clear that Davies' theory, given its restriction to austere axioms of reference, would face this problem anyway, irrespective of the criterion of language existence. But this is not only Davies' problem, for it seems that in general reference-cum-truth theoretic semantics has nothing at all to say about proper names that lack reference.\(^{45}\) It may be argued that reference-cum-truth theoretic semantics need not confine itself to axioms of reference that are austere. Fair enough, perhaps it need not. But the only other proposal that comes to mind is one whereby the referent of a name is identified with that of a definite description, and, for familiar reasons, this hardly seems a promising approach.\(^{46}\)

\(\text{(A3.5) RUSSELLIAN THOUGHTS AND THE EXISTENCE OF LANGUAGES}\)

Finally, we must not simply assume that it is a defect in a theory of truth which aspires to serve as a theory of sense that it can ascribe no content to sentences containing empty proper names. For such a theory is answerable to constraints related to propositional attitude ascription and it may be argued that no thought is expressed via the use of an empty name. This is the position of John McDowell\(^{47}\) and in effect it construes the radical interpreter as ascribing content on the basis of a Russellian conception of a thought - i.e. there are thoughts whose existence depend upon the existence of an object that the thought is about.\(^{48}\)

The emergence of Russellian thoughts in the discussion is illuminating for it would now appear that Davies' condition on the contingency of existence of languages echoes a familiar theme from the theory of content. Davies' languages are made for the expression of Russellian thoughts in that they are
available for each other in the same possible worlds. A world in which Nixon does not exist is a world in which Russellian thoughts about him are not, as it were, available to be thought, correlatively, that world has no languages containing proper names of Nixon. I am not concerned to defend Russellian thoughts with a view to defending Davies' condition of language existence, I am merely indicating the direction in which a (badly needed) philosophical justification of the condition of language existence might be expected to proceed.

(4.0) SUMMARY OF THE APPENDIX

The objections of Section One seem to me to have been the most relevant and central to the project of constructing homophonic theories of (absolute) truth for languages containing modal operators. Both of the theories that have been under consideration here are dependent upon the essentialist principle and the objections of Section One are clearly directed towards that principle. However, the objections fail for, contrary to allegation, the essentialist principle can be held consistently with the modal and temporal flexibility of the "sign-meaning" relation; the principle does not thwart the claim to empirical status of theories of interpretation and, finally, even if the principle is augmented by the logically distinct ontological thesis that languages are abstract objects this does not involve a commitment to a platonistic epistemology of understanding.

The considerations that emerge from the discussion of Section Two are perplexing. It is not obvious whether a defence of Peacocke's theory requires the definability of the proper name of the language that features in the axioms and theorems of the theory. If a defence does require this then, manifestly, there is trouble for the theory given the choice between on one hand, a genuinely semantic definition of (e.g.) "Lo" involving a theoretical concept whose propriety is (at least) highly dubious, and on the other a definition that collapses into the purely syntactic in virtue of its deployment of an eliminable but (otherwise?) quite proper theoretical concept. However, it is in the first instance the project of defining (proper names of) languages that is threatened in the face of this dilemma and not the essentialist principle, and the case that the latter is particularly dependent upon the former has not been made. To make such a case would be the most obvious strategy available to the opponent of the
essentialist principle. 

Davies' theory (discussed in Section Three) is more vulnerable than Peacocke's since it inherits all of the exposure of the latter and has increased liability on two fronts. The outstanding difficulty with this theory is that it invests in proper names an unexplained and privileged status in the determination of the (modal) existence conditions of languages. If this difficulty can be overcome or circumvented then there will be scope for the exploration of the dependence of Davies' conception of the existence of languages upon the ascription of Russellian thoughts in the interpretation of a speech community.

At the outset, I proposed two factors motivating the pursuit of theories of (absolute) truth for modal languages. One was the desire for an alternative to possible world semantics and the other was the prospect of a score in the dispute between modal cognitivists and their opponents. I consider the latter to be of greater importance in the context of the discussion of modal realism and I will close by commenting upon the effect of the discussion of this chapter on that issue.

The position was that the susceptibility of modal operators to (adequate) truth-theoretic interpretation stood as a one-way test in the dispute over truth-evaluability. The non-cognitivist gains an upper hand if it can be shown that an adequate truth-theoretic interpretation of the operators cannot be - or more modestly has not been - provided. It is my view, on balance, that it should be concluded that the non-cognitivist has not scored a point here. However, it is also true that the philosophical case for the adequacy of those truth theories that have been discussed here needs to be developed and improved in many respects. Until that task is addressed properly the threat of a semantic argument for modal non-cognitivism will remain on the horizon.49
FOOTNOTES

Unless context indicates otherwise, references of the form §n.n are to sections of this thesis.

INTRODUCTION TO SECTION ONE.

1. Lewis 1986b, p.viii.
2. ibid, pp.136 ff.
3. ibid, pp.4-5.

CHAPTER 1

1. Lewis 1986b, p.17.
3. In what follows, I use the model-theoretic terminology favoured by Lewis. See Lewis op cit, pp.17-20.
5. Lewis op cit, p.20.
6. A point worth making is that the case for modal quantification so put, does not, even if successful, compel an acceptance of possible worlds (genuine or ersatz) as the indices of quantification. There are other proposals which have as much prima facie claim to meeting the modal relevance requirement as those advocating possible worlds and which are unashamedly quantificational. According to one such proposal, (Fisk1973) modal operators be treated as quantifiers over natures where these are regarded as sui generis modal objects. However, for other reasons this proposal is not semantically attractive e.g. relevance logic has to be deployed in the meta-language.
7. For details see Forbes op cit, p.87-89.
8. Tarski 1956a.
13. ibid, p.238.
14. It would appear that Forbes accepts that realism does generate utility in funding this kind of explanation. His concern then is to oppose realism on the grounds that this semantic utility is outweighed by those philosophical disadvantages of realism which arise from "the nominalist-actualist objection from epistemology " (ibid, p.79). In contrast, my position, it will emerge, is (i) that no semantic utility is generated by realism in furnishing an explanation of this kind (§1.40 -1.44 below) and (ii) that the nominalist-actualist objection - according to which "knowledge of properties of objects requires experience of these objects or of their effects" (loc cit ) - is not of central dialectical importance in the realist/anti-realist debate (Ch.2, passim).
15. ibid, pp.72-74. I follow Forbes' enumeration of sentences.
17. *loc cit*.
18. *loc cit*.
19. This argument is left implicit by Forbes. *loc cit*.
20.
21. "..(l)n respect of the possible worlds ontology modal language seems pointedly impoverished .and [there are] no clear cases of quantification (standard or non-standard) over the alleged worlds...Yet surely if there are such entities and we daily quantify over them, our language might reasonably be expected to extend to overt recognition of them (.)". McGinn *op cit*, p.151.
22. *ibid*, p.146.
23. *loc cit*.
25. The case is presented thus:

"I believe that there are possible worlds other than the one we happen to inhabit. If an argument is wanted it is this. I believe, and so do you, that things could have been different in countless ways. But what does this mean? Ordinary language permits the paraphrase: there are many ways things could have been besides the way they actually are. On the face of it this sentence is an existential quantification. It says there exist many entities of a certain description, to wit 'ways things could have been'. I believe that things could have been different in countless ways; I believe permissible paraphrases of what I believe; taking the paraphrase at its face value, I therefore believe in the existence of entities that might be called 'ways things could have been'. I prefer to call them 'possible worlds'." Lewis 1973, p.84. (Quoted in McGinn *op cit*, p.149.)
27. Lewis *op cit*, p.84.
28. See n.25.
29. McGinn is responsible for this useful phrase. McGinn *op cit*, p.150.
30. Consider the phenomenon of the division of linguistic labour as evidence of this complexity. See Putnam 1975b, *passim*.
31. McGinn remarks such variety as a feature of the matrix of ontological locutions pertaining to places and times. McGinn *op cit*, p.150.
32. Compare absolutism about (physical) space.
34. c.f. Quine 1961a, p.4.
35. Forbes *op cit*, p72.
37. Here I am proposing an application of what I take to be an essentially Wittgensteinian insight.
38. See the interpretation of Wittgenstein in Wright 1980, pp.252-9.
39. These, following Forbes, are the inferences to which our attention is confined. They are those inferences whose validity is not controversial (i.e. they are not valid in one system and invalid in another) and "which any semantics has to get right if it is to be taken seriously". See Forbes op cit, p.70.

40. I have restricted the claim to "semantic-transformational" explanations of validity on the grounds that it would be incautious to claim that Ln validity is inexplicable *tout court* given the variety of explanatory interests that we have. By a "semantic-transformational" explanation I mean no more than an explanation of the kind (including both modest and full-blooded varieties) that has been under discussion.

41. Lewis 1986b, p.12
42. *ibid*, pp.5-20.
43. Lewis 1986b, p.12
44. Lewis *ibid*, p13. The point is also noted, and dealt with in Forbes *op cit*, pp.89-94. This and other sources of the "expressive incompleteness" of modal operator languages are discussed at length in Hazen 1976.
45. Wiggins 1976a; 1976b; 1980 Ch.7.

CHAPTER 2
1. Lewis 1986b.
4. §1.36.
5. Lewis *op cit*, p.84. Although there are, at least, *prima facie* exceptions to the principle. Might we not say that a person may cause her hand to move?
6. *ibid*, p.84.
7. *loc cit*.
8. Strictly speaking causal connectedness establishes that the entities are not abstract but I am assuming that *non-abstractness* can be conflated harmlessly with concreteness.
9. *loc cit*.
11. *ibid*.
13. e.g. Goldman 1967
15. Wright *op cit*, p.85.
16. Ch.9 below.
17. For details see McGinn *op cit*, pp.154-6. I will not rehearse the arguments since Lewis accepts that neither of these routes to knowledge of necessity is viable. See Lewis *op cit*, p.114.
20. c.f. Wright *op cit*, p.96.
21. This objection recapitulates a Kantian theme. (See Dancy 1985, p.218-21; Kant 1961, B3-4.) If a priori knowledge cannot be (in the first instance, canonically) of particulars, then the genuine modal realist's other worlds and other worldly donkeys, being particulars, cannot be proper objects of a priori knowledge. The genuine modal realist can accept the Kantian principle and endorse the further principle that modal knowledge is never dependent upon our ability to think of or refer to a particular world. This, however, would only be to postpone serious trouble (see §4.30 ff.)

22. For the vaunting of the analogy, see Lewis 1973, Lewis1983, passim.


24. ibid, p.158.

25. For more on this issue see §A1.5.

CHAPTER 3
1. Lewis 1986b, p.113.
2. ibid, p.90.
3. ibid, p.87.
4. ibid, p.88.
5. loc cit. See also § 1.510 below.
6. ibid, p.114-5.
7. loc cit.
8. Lewis op cit, p.113.
9. ibid, p.114.
10. ibid p.90.
11. See Introduction to Section One.
13. loc cit.. Perhaps this standard is too low but then, it is to be borne in mind, it will be made easier thereby for the method of recombination to meet the emergent criteria of infallibility.
14. c.f. Wittgenstein 1953,§258
17. Lewis 1983a, p.125.
19. ibid, p.88.
20. ibid, p.114. In such cases our modal opinions are to be justified by appeal to a principle which advises rejection of arbitrary limitations upon the possible.
22. Lewis op cit, p.88.
23. Except, perhaps, in those cases, if there are any, in which a drawing or picture is applicable and decisive.
24. Kripke op cit, passim.
25. The example is from Dummett 1978e, p.428. For the record, Dummett takes the view that these would not be tigers.
26. Lewis op cit, p.88.
CHAPTER 4

2. loc cit.
5. loc cit.
6. §1.40 -1.43.
7. §5.40
8. Lewis op cit, p.140. Lewis is concerned with the idea that there can be disagreement concerning whether the commonly acknowledged possible worlds are abstract or concrete. My point is directed to the idea of a parallel disagreement concerning whether possible worlds are individuals or "states". I take it that my point must be at least as strong as Lewis's.
9. loc cit.
12. See Wiggins 1980a, pp. 112-14; Forbes 1985 Ch.5, pp.96-126.
13. Lewis op cit, p.83.
15. Lewis op cit, pp. 5-20.
16. ibid, pp 104-8.
17. Lewis himself indulges in modalizing about worlds as when he considers the propositions (7) & (8):

(7) Two worlds cannot differ in their laws without differing in their qualitative character. (Lewis 1986b, p.14)
(8) The world could have been different in countless ways. (Lewis 1973, p.84)

This is harmless as long as he has recourse to analyses which do not involve the application of modalities to worlds and Lewis's analysis of these propositions is derivable from the slogan every way a world might have been is a way that some world is. Presumably, this slogan is to be taken as a format for reduction of talk involving modalities of worlds to the language of the modal realist theory proper which contains only non-modal talk of worlds. Hence (9) & (10):

(9) There are no two worlds which differ in their laws without differing in their qualitative character.
(10) There are countless non-actual worlds.

This is not, of course, to say that these are successful analyses. The point is simply that Lewis has a standard recourse in such cases. Cases in which Lewis appears to modalize about the totality of worlds are less
straightforward since there is no obvious recourse when he affirms the likes of (11):

(11) It is not contingent which conditions the entire system of possible worlds satisfies.

But then again it is not obvious that Lewis could not simply abandon this way of speaking or that this is genuine modalizing. The point which this claim is intended to serve is that wishing that certain non-contingent things were otherwise is idle. (Lewis 1986b, p.125) This he could say as well by saying that it is only wishes about contingent things which are not idle and that any wishes concerning the amodal (submodal?, pre-modal?) and the necessary alike are idle.

18. McGinn does not consider the phenomenon of indexical identification of the actual world and so fails to note a crucial disanalogy between the actual world and other possible worlds in respect of the condition (EXL).

21. See Lewis 1986b, pp.87-92 et passim & Ch.3 above.
22. See Lewis 1986b Ch.3, entitled "Paradise on the Cheap?"
23. ibid, p.165.
24. These are intended as characterizations of the so-called Frege-Russell theory and Kripke's alternative "picture" respectively. See Kripke 1980, passim.
25. This apparent lacuna in the causal picture of reference is hinted at in McGinn's remarks on the causal theory of reference in McGinn 1984, p.166.
26. This point is suggested by Dummett's famous discussion of abstract objects. See Dummett 1973, pp. 471-512.
28. Lewis dismisses Dummett's way of drawing the abstract/concrete distinction for objects in terms of a distinction between kinds of senses that proper names might have, insisting that such factors tell us nothing of the nature of the entities in question. One might have expected that the complete absence of proper names for worlds might have drawn Lewis's comment. (See Lewis 1986b, p.82 n.56.)
29. This is intended as a characterization of Lewis's argument from theoretical utility. See the Introduction to Section One above.
30. Lewis 1986b, p.3.

CHAPTER 5.
2. ibid, p.6.
3. loc cit.
5. ibid, p. 216.
6. See Blackburn loc cit & Ch.12 below.
7. c.f. Lewis 1986b Ch.1; Forbes 1985 Ch.4.
10. See §1.40 -1.43.
12. *loc cit*.
13. §1.41 ff.
15. *ibid*, p.70.
16. See n.10.
17. Forbes *op cit*, p.94.
18. *loc cit*.
21. The use of the term "humanity" in this context is initiated in Grandy *op cit*.
23. Lewis *op cit*, p.4.
24. One hears in conversation the notion that world talk is metaphorical and the hint that this is a viable option has been dropped in the literature (e.g. McGinn's interpretation of Kripke's conception of possible world talk as "evocative metaphor", McGinn 1981a, p.162). However, I know of no attempt to develop this initial conception.
25. Even if it is the case that metaphor is anti-systematic (c.f. Davidson 1982g p.245; Blackburn *op cit*, p.180) in that there are no rules for the construction of metaphor, that is not to say that a systematic body of discourse cannot be deployed metaphorically. In any case, the use of world talk as metaphor precedes its systematization at the hands of modal semanticists. See §5.6 below.
26. For a useful summary of the various approaches to the meaning of metaphors see Blackburn *op cit*, pp.171-9.
27. Davidson *op cit*.
28. It is also wrong to attempt to characterize these linguistic activities in terms of special kinds of illocutionary force for one can make an assertion in the metaphorical deployment of a statement and, arguably one must make an assertion in deploying it mendaciously.
29. Davidson *op cit*, p.257.
31. Wiggins *op cit*, p.205. See Ch.6 below.
33. *ibid*, p.187. Compare Nietzsche:
"What then is truth? A movable host of metaphors, metonymies, anthropomorphisms: in short, a sum of human relations which have been poetically and rhetorically tempered by, transferred, embellished, and which, after long usage, seem to be fixed, canonical and binding. Truths are illusions
which we have forgotten are illusions; they are metaphors that have become worn out and have been drained of sensuous force, coins which have lost their embossings, and are now considered as metal and no longer as coins."

Nietzsche, "On Truth and Lies in an Extramoral Sense" cited in Blackburn op cit, p.181. I am indebted to Nick Smith for preventing me from contracting the erroneous translation of the title that appears in Blackburn op cit.

34. Hence the essential irrelevance to the general debate of the point that possible world talk originated as metaphor. Perhaps the only change of meaning in the term "world" that is required, if it is a change at all, is that it is no longer the captor of (unrestrictedly) all that there is, just as "atom" no longer designates the smallest part of what there is.

35. e.g. Field 1980a, passim.

36. This approach to fictional discourse is proposed in Lewis 1986c.


INTRODUCTION TO SECTION TWO


CHAPTER 6


4. ibid, pp.168-72.

5. ibid, pp.172-7.

6. ibid, pp.177-86.

7. ibid, pp.168-9.

8. ibid, pp.169

9. loc cit.

10. loc cit.

11. §1.40 - 1.44.

12. Dummett distinguishes these kinds of thesis as reductionist and reductive respectively (Dummett 1982), but his nomenclature hardly assists one in bearing the distinction in mind. His discussion offers an inventory of the sources of failure of the "effective translatability" requirement that is part and parcel of the former kind of proposal, which failure motivates the shift to endorse a proposal of the latter kind. The same distinction between analytic and non-analytic reductions is also drawn in Blackburn 1984, pp.151-8.


15. On the former point see Wittgenstein 1953 (§258) where the distinction between being right and seeming right to me, is emphasized as a condition on the possibility of judgement. On the latter point see Wiggins 1980c, pp.208-210.

16. This kind of criticism of naive subjectivism in ethics is offered in Blackburn op cit, pp.168-9.

17. See n.10 above.


19. See McGinnop cit, p.169. The attributions to Hume of (personal actualist) reductionism and of non-cognitivism occur almost contiguously (loc cit) and without any comment on their relationship.


21. Sometimes Hume characterizes (semantical) non-cognitivism as the semantic accompaniment to the functioning of active as opposed to passive mental faculties:

"Reason is the discovery of truth or falsehood. Truth or falsehood consists in an agreement or disagreement either to the real relations of ideas or to real existence and matters of fact. Whatever, therefore, is not susceptible of this agreement or disagreement, is incapable of being true or false and can never be an object of our reason. Now 'tis evident that our passions, volitions and actions are not susceptible of any such agreement or disagreement; being original facts and realities complete in themselves and implying no reference to other passions, volitions and actions. 'Tis impossible therefore that they can be pronounced either true or false and be either contrary or conformable to reason." Hume op cit, p.458


23. See Ch.12.

24. Hume op cit, passim.


26. Hare is scathing in his rebuke of those realists in ethics who insist always upon casting their opponents in a descriptivist role:

"They...have not rid themselves of the prejudice that everything we say of anything has to be the ascription of some sort of descriptive property to it: if not an 'objective' quality of the thing then a 'subjective' property consisting in some relation the thing stands in to a subject (e.g. that of arousing an attitude in him). This is an old and tedious mistake, which it was the achievement of the early non-descriptivists to expose: when we say something moral we do not have to be ascribing any kind of property, subjective or objective." (Hare 1985, p.46)

27. Locus classicus, Ayer 1936.


29. ibid.

30. See Ch.12.
31. The position which Blackburn's theory occupies is also rendered invisible by the distinction that is drawn by Forbes (Forbes 1985, pp.216-20) between modal non-cognitivism and "modal objectivism". He introduces modal objectivism as the view that...

"......in some sense there are features of reality which make modal judgements true or false... provided that it is understood that there is nothing in the use of the label which implies that an objectivist cannot appeal to facts about psychology; both 'internal' and 'external' features of reality are prima facie suitable for an objective grounding for modal truth. The position which affords the proper contrast with objectivism is that of the non-cognitivists according to whom the content of modal propositions (sic) is such as to render the notions of truth and falsity not genuinely applicable to them."

Quasi-realism is emphatically not non-cognitivist for it insists on truth-evaluability but it is not objectivist either since it balks at the acceptance of "features of reality which make modal judgements true or false."

32. The terms "sceptical paradox" and "sceptical solution " are taken from Kripke 1982 where a sceptical paradox/solution concerning meaning is developed in an attempt to cast light upon the rule-following problematic of Wittgenstein 1953 §188-240. See, ironically, McGinn 1984 pp. 65-6 for the suggestion that Kripke's sceptical solution recapitulates a strategy that is antecedently familiar in such disparate quarters as ethical discourse (expressive theories) scientific theoretical discourse (instrumentalist theories) and mathematical discourse (nominalist theories).

34. See e.g Davidson 1982h, Wright 1987 p.6.
39. Compare Hume's pessimistic view that we can hope for satisfactory but not true opinions. (Hume op cit, p272.)
40. I am concerned here with the (alleged) non-cognitivism of the later Wittgenstein e.g. in The Remarks on The Foundations of Mathematics (Wittgenstein 1956). (For the allegation of later Wittgensteinian non-cognitivism, see Forbes op cit p.219. Forbes follows the interpretation of Wright 1980) I am not concerned with the Tractarean non-cognitivism about logical necessity that is the upshot of the conception of (truth-evaluable) significance as the division of logical space. (Wittgenstein 1961 , §4.463).
41. See Wittgenstein 1956, II.28 et passim ; Wright 1980, Ch.XXI.
42. Dummett 1978a, p.51.
44. Wiggins, loc cit.
46. *ibid*, pp.211
47. See Davidson 1982, *passim*.
49. Properly this should be considered a further contrast since the moral cognitivist has a prima facie difficulty with the applicability of the marks of truth to the case of practical deliberative judgements ("Must V") and there is no comparable difficulty for modal cognitivism. (Wiggins *op cit*, pp. 214-7.)
51. This point is made, but with different concerns in mind, in Wright 1980, pp. 280-1.
52. Not that the non-cognitivist is going to claim that (B) is false for given non-cognitivism modal sentences are not truth-evaluable. From the stand point of the non-cognitivist, the objection is best deployed as a challenge to the cognitivist in the form of the charge that the cognitivist project does not work on its own terms since falsehood, by the cognitivist's own lights, of axioms and theorems is truth-theoretic inadequacy par excellence.
53. See Appendix A below.

**CHAPTER 7**

2. The first problem that we encounter in this messy business concerns the sorts of things that constitute the proper domain of the relation of supervenience e.g. states, properties, predications. In speaking of "truths" McGinn (*loc cit*) appears to have a *statement* oriented conception in mind. This practice squares with Dummett's concerns to construe the commensurable concept of *reduction* as a relation between families of statements. (See Dummett 1978g, 1982.) My intention is to follow McGinn and Dummett in this respect.
3. See e.g, Blackburn 1984 (Ch.6), 1985a; Kim 1984; Lewis 1986b *passim*; McFetridge 1985 and Teller 1983. I will often attribute a point or a distinction to more than one of these authors despite the fact that their disparate terminologies and logical structures often obscure the fact that they are (in my judgement) saying the same thing.
4. Blackburn 1985a, Kim *op cit*.
6. Thus weak supervenience is consistent with the premises of the Cartesian argument against the *identity theory* in Kripke 1980, Lecture III.
7. It is notable that the significant modal claim NEC - (for an account of its significance see §8.11 below) - :

   \[ \Diamond(x)(B^*x \rightarrow A^x) \]

follows from STRONG given the assumption that something in some world is B* and A*. But it is important to note that NEC is not equivalent to property identity for it still leaves open the possibility that there are organisms whose pain states (say) are not realized as C-fibre stimulation. It does not, however, permit the possibility of C-fibre stimulated organisms
who are not feelers of pain.


9. Putnam 1983f. The example which Putnam discusses concerns nomological necessity but the moral for unrestricted modalities, such as metaphysical modality, is clear.


11. Putnam op cit, p.108

12. ibid, p.109.


14. ibid, p.174.

15. I am here allowing myself (and Putnam and McGinn) the luxury of the notion of the same instant across possible worlds.

16. loc cit.

17. loc cit.

18. ibid, p.173.

19. loc cit.

20. loc cit.

21. ibid, p.174.

22. loc cit.

23. In developing this consideration I am expanding on a more specific point concerning physical indiscernibility made in Blackburn 1985a.

24. The thesis STRONG:

\[(\text{STRONG}) \square [\exists x](B^* x \land A^* x) \rightarrow \square (y)(B^* y \rightarrow A^* y)]\]

may be false even when (=):

\[(=) \square (x)(B^* x \rightarrow (y)(B^* y \rightarrow (y = x))]\]

is true if there is one world in which the unique B* is A* and another world in which its unique B* is non-A*. However, the trivial truth of STRONGis secured given an inter-world version of the identity of B-indiscernibles,

\[(=^*) \square [(x)(B^* x \rightarrow \square (y)(B^* y \rightarrow (y = x)))]\]

The acceptibility of this stronger principle will obviously depend upon the suitability of the B-family as well as delicate questions relating to the propriety of haecccetism. (On haecccetism see Kaplan 1975 & Lewis 1986b)


26. An extremely thorough discussion of these issues is to be found in Wiggins 1980a, Ch.2.


28. The distinction between local and non-local applications of supervenience is made in Kim op cit.


30. loc cit.

31. These essentialist claims are modal instances of the (NEC) thesis.

32. loc cit.

33. Such problems feature strongly in the struggle for a Tarskian theory of truth for a modal operator language. See Appendix A.

34. See §A1.2.
35. No doubt the issue is complicated by the phenomenon of indexicality. For example, if "S" and "S'" are indexical or token-reflexive sentence tokens of the same syntactic type, "I am cold.", there is undoubtedly a sense in which these tokens mean the same thing on different occasions of their standard use despite the fact that their truth-value will vary across utterers. However I cannot see any point in contriving this utterly commonplace and unmysterious phenomenon to support the possibility that independence requires. Assume the language L is free of indexical items.


37. Nothing, of course, depends upon the choice of the necessity operator, "□" here. A complementary case for its dual possibility operator, "◊" can easily be made.

38. I have in mind the truth theory in Peacocke 1978. Again, see Appendix A.

39. This is the standard intention. See (e.g.) Putnam 1975d, p.233, p.243 ; Kripke 1980, p.164; Forbes 1985, p.237.


41. Note that even if one was inclined, for whatever reason, to insist upon the falsehood of the first-order essentialist claims the security of weak supervenience of the necessary on the actual, and of the modal in general on the actual is guaranteed by the regulative status of the rejection of independence.

42. See Ch.6.


CHAPTER 8

1. See Blackburn 1984, p.221 & McFetridge 1985, passim. Throughout this chapter, I indicate, as necessary, whether conceptual or metaphysical modality is involved in the intended interpretation of a formula by the use of subscripted modal operators (e.g. "□ M" & "□ C").

2. See e.g. Blackburn 1985b, p.13 where it is mooted that the secondary (associated) properties of bodies are metaphysically but not conceptually supervenient upon their primary (base) properties.


5. Given that the essentialist claims are true, and the thesis of metaphysical SWR false we have confirmation in the modal case of a tentative thesis of Blackburn (Blackburn 1985a) viz, that metaphysical SWR claims are, in general, untenable and that either B*/A" (metaphysical) independence or B*/A' (metaphysical) necessity proves preferable.


7. loc cit.

8. See n.10.


10. Quine 1961b. Putnam holds that Quine's non-classical conception of
analyticity stems from the identification of analyticity with the positivist conception of a priori. See Putnam 1983g.

15. This concept is mentioned in Dummett 1978e, pp.420-1 and in Quine 1961b, p.24.
16. See Kripke 1980 passim, Putnam 1975b passim & Wiggins op cit, Ch.4 et passim.
17. Wittgenstein 1953 passim.
18. The account of pure rule-following in this section is drawn from Wright 1989, pp. 255-6.
19. ibid, p.255.
20. Contrast the case of moral judgement (See n.7.) Precisely what we cannot do in the case of the application of a moral evaluation is to represent matters as if the output judgement is the product of an inferential process linking (i) A minor premise ("N") stating naturalistic features of a situation and (ii) A major premise stating an a priori or purely conceptual condition on what fits or fails to fit the rule governing the application of an evaluative term "E". For a compelling rule-following related explanation of why this cannot be done see McDowell 1981.

21. Wright op cit.
22. ibid.
26. See Wittgenstein op cit §218. For more on Wittgenstein's deployment of this platonist imagery see McDowell op cit, pp.145-54; McGinn op cit, pp.21ff; Wright op cit & Wright 1980, Ch.1 et passim. This objectivist picture has been associated with definite semantic theses such as the investigation- independence of meaning (Wright 1981) or the objectivity of meaning (Wright 1987, pp.5 ff).

CHAPTER 9
2. ibid, pp.178-82. I accept this anti-empirical component of the case and I will not spend time on its exposition. For non-conservativeness see Field 1980a, passim.
4. ibid, pp.184ff.
5. See §6.30 - 6.31.
8. loc cit, n.51.
9. ibid, p.176. See Nagel 1979a, p.171.
15. Although like McGinn's non-objectual realist, Lewis is left claiming a priori knowledge on the slender basis that there could be no empirical modal knowledge.
17. ibid, p.184.
18. In advancing these highly general criticisms I am manifesting the influence of Fodor's work in the field. See, in particular, Fodor 1974, 1981 & Fodor 1981a, passim.
19. I acknowledge that a fuller discussion would deal with the possibility of a functional characterization of cognitive relations of organism-environment interaction. I can only record my view that a retreat to that kind of characterization entails a departure from the substance of purported causal explanations of knowledge.
23. loc cit.
24. ibid, pp.184.
25. As characterized in Ch.8 above.
27. In the context of these considerations it can be appreciated that the retreat to a characterization of the a priori in terms of (the causal relations between agent and) justifying statements as opposed to the knowledge claim itself achieves two aims. First, it recognizes the role of inference in the acquisition of knowledge and second, it does not deem knowledge claims a priori solely in virtue of the fact that the "subject matter" of the knowledge claim itself is not properly viewed as that which can be a cause. Both of these advantages accrue in the instance of a posteriori universal generalizations given that the canonical account of our knowledge of these is framed in terms of enumerative induction and causal, evidence-giving contact with particular instances. No doubt this canonical account appears simplistic, but that is of no consequence to the main point.
29. See §8.12.
31. ibid. See Kripke 1980, pp. 113-5.
32. Dancy op cit, p.220.
33. Again, conceptualism as adumbrated in Ch.8 above.
34. This claim will be borne out in Ch.10
35. See §6.02.
CHAPTER 10
4. *loc cit*.
5. McDowell *op cit*, pp.111 ff.
7. McDowell *op cit*, p.111.
8. Perhaps this contrast is reflected in the contrast between the appeal of modal conceptualism and the utter implausibility of moral conceptualism.
9. *loc cit*.
10. See the discussion of the role of causality in epistemology at §9.5.
11. McDowell *op cit*, p.119.
13. McGinn 1981a, p.184. Given that McGinn is aware of this tendency it is extremely puzzling that he should make the following remark: "*Kripke clearly wishes to maintain a strongly objectivist view of modal truth: his essentialism commits him to it and he often speaks, realistically, of our seeing whether some statement is necessary or contingent.*" ibid, p.161. (My emphasis - J.D.)
18. McDowell *op cit*, p.112.
19. *loc cit*.
20. *loc cit*.
23. c.f. the stronger views voiced in Ayer 1936.
25. ibid, p.147.
26. ibid, pp.13-4.
27. ibid, p.151.
28. This vivid phrase is Blackburn's (Blackburn 1981, p.173.). Interestingly Blackburn is claiming, in this context that McDowell's views on rule-following in ethics entail a community consensus standard of correctness in ethical judgement. McDowell disowns this standard of correctness (McDowell 1985b, p.120 ff.) but it is not clear why he thinks that he may do so. The non-consensual but internal standard of correctness in rule-following which will be introduced below would seem to fit perfectly his purposes.
30. McDowell *op cit*, p.118.
32. *loc cit*.
33. c.f. Quine 1961b.
36. Wittgenstein 1953 *passim*.
38. Wittgenstein 1953. For concept modification see §67 & pp.208ff; for the requirements of a rule see §206-242.
41. Wright 1989, Section III *et passim*.
42. Wright himself is concerned with this difficulty *ibid*, pp. 247ff.

CHAPTER 11

1. Blackburn uses the term "commitment" more widely than this, intending it to apply to any broadly assertoric sayings. He then distinguishes within this class of sayings those which are and those which are not simple expressions of belief. I have chosen to use the term "commitment" in the way indicated since (i) I find Blackburn's usage misleading and (ii) The notion of expressing a commitment strikes me as being well suited to the labelling of a role for sayings which is conduct-related and not simply belief stating. (As far as I can gather Blackburn proposes no general term for the former kind of role for sayings.) My intentions are at one with those of Blackburn in aiming at this distinction. See Blackburn 1981, 1984 (Ch.6), 1985b, 1986.
3. This is to associate with Quine a critique the necessary/contingent distinction via his critique of the analytic/synthetic distinction. See Quine 1961a & Putnam 1983g.
4. This is intended as a Wittgensteinian conception. See Wittgenstein 1956 V,6; 4,5 et passim & Wright 1980, p.377 et passim.
5. See Ch.6 & Ch.12.
8. See §11.22 below. By failing to pay any heed to this striking feature of logical modality both Lewis and McGinn leave themselves open to the charge of harbouring primary realist attitudes to modality.
10. Here I will discuss only kind-based essentialist claims but the general idea is easily transferable to essentialist claims concerning individuals.
11. The metaphysical import of merited application of a term - as articulated in (2) - is a notion that was deployed in the critique of Lewis's evaluation of
what he called "Kripke's problem. See §3.511.

12. §10.31 above.

13. Perhaps this is related to the relative ease with which we (think we) can conceive of an ideal scientific point of view differing radically from our own when compared with an ideal moral point of view differing radically from our own.


15. See §6.20.

16. See §10.21 - 10.43.


18. loc cit


20. Dummett 1973, Ch.10

21. ibid, pp.354 ff.

22. ibid, p.358.

23. loc cit.

24. loc cit.


27. Of course this specification will be defeasible in the light of a better appreciation of the agent's belief/desire profile. For an informative and concise discussion of these issues see Fodor 1981, Introduction.


29. ibid, p.15.


CHAPTER 12

1. Wright 1987, p.5

2. loc cit

3. loc cit

4. ibid, p.6

5. See Ch.11, §11.23 et passim.


8. For a concise statement of these see Blackburn 1984, Ch.6.


11. loc cit

12. §9.40 ff.


16. See §7.4

17. §10.11,§10.12.


22. McDowell op cit, p.118

23. loc cit.


25. loc cit.

26. ibid, p.13.

27. ibid, pp.17-8

28. loc cit.

29. See McDowell 1981, passim.

30. i.e. McDowell 1985,passim.

31. ibid, p.118.

32. Compare Wiggins' remark:

"Surely it can be true that we desire x because we think x good and that xis good because we desire x...the explanation of the "because" is different in each direction the second "because" may have to be explained in some such way as this: such desiring by human beings directed in this way is one part of what is required for there to be such a thing as the perspective from which the non-instrumental goodness of x is perceived." (Wiggins 1976c, p.106)

33. No doubt there is room for a challenging and far-reaching scepticism concerning the very idea that our non-causal explanatory interests carry the same ontological authority as our causal explanatory interests. However, I assume in what follows that the notion of a non-causal explanatory test for reality is feasible.

34. McDowell 1985, p.119.

35. loc cit.

36. This is Field's notion of empirical conservativeness. See Field 1980, passim.


38. Compare Davidson, who in discussing the modal status of the theorems of a theory of interpretation (i.e T-theorems) , makes the point that some concession to "intensionality" is involved in the concept of a law and that this concession must be made for any empirical science. (Davidson 1982 p.xiv). He goes on to say in the relevant essay:

"A theory that passes the empirical tests is one that can in fact be projected to unobserved and counterfactual circumstances ...The trouble is, the theory does not state that it has the character it does." (Davidson 1982b, p.174)

39. Although it is arguable that the particular cases which McDowell chooses are implicitly and (broadly) deontically modal insofar as explanations of the form:

(i) x had response of type R to C because C merited R
can be characterized as standing in logical relations to claims of the form:

(ii) x ought to have had an R-response to C.

40. For this conception of quasi-realist success, see Blackburn 1986, p.138.

41. McDowell's ultimate objection appears to be that there is no question of our being able to stand back from the purported mechanism of projection in order to view, from a wholly naturalized perspective, its workings. See McDowell 1985, p.122.

42. Wiggins 1980a Ch.6 §7, et passim.


APPENDIX A

1. It should be noted that the status and proper scope of that programme are far less matters of consensus than they once seemed to be. For example, the very idea of a systematic theory of meaning has come under pressure with the resurgence of interest in the rule-following problematic of Wittgenstein (see Wright 1980, Ch. XV pp. 279-92; Wright 1981 passim) and the case for theorizing in a fashion that recognizes an intra-individual, subjective probability interpreted, dimension of meaning brings in it wake a diminished role for a theory of truth (See e.g. McGinn 1982c, Burge 1982, Fodor 1981b). Relatedly, the connection between the content of the axioms and theorems of a 'theory of meaning' and speakers' knowledge has also been subjected to intense scrutiny in the context of the more general question of whether a theory of truth is apt to play any role in the theory of speakers' understanding (See e.g. Dummett 1976b, Wright 1981a, Evans1981). There remains, however, the conviction that a theory of truth is a central plank in the project of the interpretation of the sayings and thoughts of the members of speech communities. For the "Davidsonian programme" see Davidson 1982 passim, Evans & McDowell (eds) 1976, Introduction & Platts 1980, Introduction.

2. See §1.2.

3. See §6.43.


7. Peacocke op cit., pp.476-7. Here I will deal only with the truth-theory proposed for a modal propositional language. (Moreover I have departed from the theory that Peacocke presents in stylistic detail.) While the issues of most obvious philosophical interest arise in connection with these relatively simple languages, it should be pointed out that Peacocke's development of a truth theory in the first-order case requires a substantial extension of technical apparatus - quasi-sequences inter alia. Since I do not consider myself competent to comment on the methodological or philosophical significance of this extension of apparatus I can only remark
that it may raise difficulties beyond those which emerge in the case of the truth-theory for the propositional language.

8. The need for a logic of this strength is of broader interest. Davidson has argued that satisfaction of Convention T is a "criterion of theories" (Davidson 1982j, p132. See also Davidson 1982i, passim). Given that only a truth theory whose logic is at least as strong as S4 can satisfy Convention T this would suggest that we have, from a rather unexpected source, a consideration in favour of the stronger modal logics as being those which are genuinely truth-preserving. This, of course, cannot fail to bear on the otherwise bemusing debate as to which is the "right" modal logic.

9. The objection is articulated in Wallace 1969 & 1970. See esp. Wallace 1970 p.121 & pp. 138-40. The claim that necessitated T-theorems are false is made by Putnam and also attributed to Quine by Putnam in Putnam 1988 (p.63 & p.65 n.7 respectively.)


11. Peacocke op cit, pp. 477-8

12. ibid, p.478

13. See n.5 above.

14. The explicit claim that we should regard languages as abstract objects is made by authors whose conceptions of semantic theory differ considerably otherwise. See Blackburn 1984, pp 18-26; Lewis 1983b passim; Katz 1980 passim. Also, while Davies does not, as far as I know, explicitly endorse the conception of languages as abstract objects, he embraces modal and temporal inflexibility in his declaration that languages are "unchanging and unchangeable" (Davies 1983, p.6). For Peacocke's commitment to a methodology of temporal inflexibility see Peacocke 1976b.

15. Gupta op cit, p.453. That we operate the concept T2 is supposed to be established by our natural acceptance of such propositions as:

All contradictions are necessarily false. (loc cit).

16. loc cit.

17. ibid, p.454.

18. Dummett makes the point that most types of semantic theory offer a static account of language (i.e. an account of use at a given point in time) although their proponents are obviously aware that languages - in the everyday sense of the term - change and bifurcate. His ensuing discussion articulates well the dismal prospects of our contriving a theory that contains a dynamic account of language use and linguistic change. (Dummett 1978d, pp. 410-6).


20. Davidson 1982k, p.60.

21. Compare Wittgenstein's remark:

"The philosophy of logic speaks of ...... the spacial and temporal phenomenon of language, not about some non-spacial, non-temporal phantasm. [Note in margin: only it
is possible to be interested in a phenomenon in a variety of ways] But we talk about it as we do about the pieces in chess when we are stating the rules of the game, not describing their physical properties " . Wittgenstein 1953, §.85.


23. For further development of these, essentially Wittgensteinian thoughts see McGinn 1984 pp.98-102 and Blackburn 1984, Ch 2. For a statement of the view that understanding is a matter of cognizing an object see Katz 1980, Ch 2 et passim .

24. For a conception of interpretation that is not aimed at characterizing speakers' knowledge see Wiggins 1980c.


27. Tarski 1956a.


29. ibid , p.64.

30. loc cit .

31. Proper names of languages then will be descriptive names in Evans' sense, (Evans 1982, p.14 et passim) i.e they can be thought of as introduced with the intention that their referent should be the referent of the introducing description whatever that may be. Donnellan also claims that proper names can function in this way. The example that he offers is that the name "Newman" may be introduced (now) as a proper name whose referent is the first child born in the twenty-first century (Donnellan 1979b).

32. See Popper 1959, p.274 cited in Field 1980b, p.83. Field himself takes this reductionist view.

33. This point is made in Davidson1982d, p.218, p.223; Wiggins 1980c, p.196 and Peacocke 1976, p.163.

34. See Davies op cit , p.438; Kripke 1977, p.69

35. It is worth pointing out that Peacocke's theory applies to a strong necessity operator, i.e an operator whose truth-condition is given along the lines: 

\[ \Box_s (A(t_1,\ldots,t_n)) \] is true iff with respect to every possible situation, the denotations of "t_1\ldots t_n" exist and are A.

Thus it is false that it is (strongly) necessary that Socrates is human. If we want to use the strong necessity operator in making true essentialist claims regarding contingent existents we would render the English sentence "It is necessary that Socrates is human." as being of the form :

\[ \Box_s [(\exists x) (x=a) \rightarrow Ha] \]

For a discussion of the shortcomings of both the strong and the weak modal operators in the task of the interpretation of our modal use see Davies 1983, pp. 216-9.


37. See n.14 above.

38. For these observations concerning Frege see Dummett 1973, pp. 509-10.
41. The term 'the direct theory of reference" is coined in Salmon 1982 in connection with the theories of reference associated with Kripke and others such as Putnam, Donellan and Kaplan. The predicates in question include, prominently, predications of *natural kind*. In an appropriate and vivid phrase Wiggins describes certain of these as having senses which are "reality-involving (Wiggins 1980a, Ch.3 et passim ). Demonstratives themselves, of course, are the clear favourites for consideration as essentially or directly referential and these are not proper names either but we are considering only languages that do not contain these.
43. The parenthesis is in place in order not to beg any questions against the view that a name may be *contingently empty*, e.g. it may be thought that "Sherlock Holmes" is a name (in English) which is actually empty but which refers (in English?) to an entity in some worlds. It appears that Kripke held this view at one time, although a swift retraction was forthcoming in an Addendum to the same paper. (Kripke 1971. See p.65 for the claim and p.172 for the retraction.)
44. There are of course many other contexts of use of names which have, strictly speaking, no bearer. The names "Sherlock Holmes","Robin Hood", and "God" are all *arguably* bearerless but they are clearly disparate in respect of their profile of use in our community. I do not consider these or other cases but it is not clear that a semantic theory that includes a component theory of reference has any more options in such hard cases than it does when dealing with standard cases such as the one I raise.
45. Burge comments :
"*Non-denoting singular terms have been a prime stimulus or irritant to students of the use and formal representation of language......*" (Burge 1980, p.167).
However, semantic theorizing in terms of concepts other than truth or reference prove far more promising in this respect. I have in mind theories that attempt to characterize part of the meaning of sentences by way of more obviously epistemic concepts such as that of conditional subjective probability. See n.1 above.
48. For the distinction between Russellian and Fregean thoughts see Noonan 1985. Fregean thoughts are omnitemporal existents. Their existence is never, except in the case of the "I" thoughts of soliloquy, dependent on that of any contingently existing object that the thought is about. So, with the exception of this token-reflexive case it seems natural to say that Fregean thoughts are necessary existents.
49. It must also be pointed out that the truth-theories for sentential modal operators are by no means the only non-objectual theories that have been proposed. In particular Wiggins and Peacocke in something of a joint effort
(Wiggins 1976b, Peacocke 1976c) have proposed a truth-theory which treats uses of "necessarily" and "possibly" as adverbial modifications of predicates. (As suggested by the "surface grammar" of such sentences as "Socrates is necessarily human.") The would-be non-cognitivist must remain alive to the possibility that this approach might succeed even if the sentential operator approach fails.
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