**Chapter 8**

**Conclusions and Avenues for Further Development**

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The book has outlined a novel semantics of attitude reports and modal sentences based on a rather rich ontology of attitudinal and modal objects or more generally satisfiable objects. While many philosophers and perhaps semanticists may feel hesitant to accept such a wealth of less familiar objects, from the perspective pursued in this book the acknowledgment of such an ontology for the semantics of natural language goes along with the methodology of descriptive metaphysics. This means giving priority to intuitions and in particular intuitions reflected in language, rather than philosophical preconceptions on what there is as well as philosophical considerations of ontological economy and of what there ultimately is.

 It is notable that the rejection of propositions is shared with the approach of ‘metaphysics first’ of Devitt (1996, 2013). Devitt argues that what should play the central role in the semantics of attitude reports are not propositions, but mental entities like thoughts in a naturalized sense, entities acceptable on metaphysical grounds alone. The approach pursued in this book rejects propositions in favor of mind-dependent attitudinal objects because it is an approach of ‘descriptive metaphysics first’, as one may put it.

 This book has discussed a range of empirical motivations and applications of the ontology of satisfiable objects for a new semantic analysis of attitude reports and modal sentences. The ontology avoids conceptual problems with abstract propositions, and the semantic analysis of attitude reports avoids conceptual and empirical problems for the Relational Analysis. The semantic analysis of modal sentences differs radically from the standard semantics on which modal verbs act as quantifiers ranging over worlds, and it avoids a range of problems for that semantics when applied to deontic modals. The ontological and semantic theories this book has developed manifest a number of convergences with recent views of cognitive content bearers as well as recent localized approaches to modality. They also match recent research on which clausal complements do not act as referential terms, but rather as predicates of content bearers.

 There are a range of open issues inviting a further development of the approach. First of all, there are various philosophical elaborations and applications to pursue. The ontology can be developed much further. This includes developing the ontology of modal objects for modals other deontic modals. It includes spelling out the particular way in which satisfiables may depend on acts and in which they themselves may be individuative of acts. It includes clarifying how attitudinal objects may display properties of concreteness, yet endure past the act that produced them (claims, offers, demands). Finally, it includes clarifying the way attitudinal objects may be based on or grounded in lower-level objects (the by-relation) and how that may bear on the properties attitudinal objects can have. The ontology of satisfiables also invites further applications and integration within the ontology of the social world. That would include elaborating the ontology of satisfiables such as debts and possessions (of unspecific objects), and relating the ontology to the ontology of artifacts of the more familiar sort. The ontology of satisfiables also invites an integration into the ontology of the mind in general, which ought to include clarifying the relation of satisfiables to emotions and other mental states that fail to have satisfaction conditions in the same way. The ontology also invites applications to perception and further elucidations of philosophical issues such as the normativity of mental content.

 There are a range of linguistic issues that need to be developed further. The syntax proposed was that of ‘simplified syntax’, thus the syntactic proposals ultimately need to be elaborated within a properly developed syntactic theory. The semantic analyses were based on a syntactic view of lexical decomposition of attitude verbs in syntax (light verb-noun for a satisfiable object), a view that certainly requires further independent justification and development.

 The semantics analysis of modals was focused on deontic modals, and the application to other modals is yet to be fully developed. Also the syntax-semantics interface for modals itself requires much further development since the syntactic decomposition of modal verbs as light verb – modal object noun is plausible only for a small number of modals.

 Truthmaker semantics was used only at the sentential level. However, sentence-based truthmaker semantics itself still awaits the development of a compositional semantics at the subsentential level.

 Attitudinal-objects semantics was applied mainly with finite clauses in mind (*that*-clauses). But it is a semantics that is meant to be applicable to other clause types as well. It is fairly obvious how attitudinal-objects semantics may apply to certain uses of interrogatives and the corresponding attitudinal objects. Questions display the characteristic properties of attitudinal objects, though they involve answerhood conditions as their satisfaction conditions. This means that questions have as their satisfiers constative attitudinal objects. Embedded interrogatives may also serve to describe mental attitudinal objects of inquiry, which have as their satisfiers attitudinal objects of knowledge. But interrogatives are not restricted to describing particular illocutionary or mental objects, but have a more general meaning, which permits them to be used in a variety of other contexts (e.g. with verbs like depend as in *Who comes depends on who is invited, John announced who is invited*).

 Infinitival clauses present a general linguistic challenge since infinitival clauses and finite clauses in languages such as English do not always come with semantic differences.[[1]](#footnote-1) Lohninger / Wurmbrand (2019) show that some languages do display a general semantic distinction between the choice of finite clauses and infinitival clauses as complements.[[2]](#footnote-2) It would be further support for the view developed in this book if that semantic contrast can be cast in terms of a unified ontology of modal and attitudinal objects, making use the notion of direction of fit (infinitival clauses would apply to objects with a world-to-word/mind direction of fit, finite clauses to objects with a word/mind-to-world direction of fit).

1. In certain cases, the choice of a finite or an infinitival clause indicates a difference in the satisfiers of the respective attitudinal objects: the finite clausal complement applies to an attitudinal object whose satisfiers are situations, the infinitival complements to one whose satisfiers are action, for example in (1a) and (1b) below:

(i) a. John decided that he was sick.

 b. John decided to leave.

Infinitival wh-clauses may be used as predicates of practical knowledge, that is, attitudinal objects whose satisfiers are actions, as in (2a), in contrast to (2b):

(ii) a. ?? John knows how to open the bottle (but he does not know how to open it himself).

 b. John knows how one can open the bottle (but he does not know how to do it himself).

 Infinitival clauses in English, though, do not always apply to attitudinal objects whose satisfiers are actions or even attitudinal objects with a world-to-word/mind direction of fit:

(iii) a. John believes to be sick.

 b. John believes that he is sick. [↑](#footnote-ref-1)
2. Lohninger and Wurmbrand themselves propose that infinitival clauses denote situation and finite clauses propositions, in those languages, a view that is not compatible with that of this book. [↑](#footnote-ref-2)