CHAPTER 10

First-Order Logic, Incongruism, and Anti-Formalism

Anders Kraal

1 Introduction

Modern formal logic has oftentimes been said to provide a tool for conceptual analysis. Gottlob Frege, for example, says in Begriffsschrift that his formal logic aims at clarifying “the relations of concepts.”¹ Similarly, Bertrand Russell and A.N. Whitehead say in the Principia Mathematica that their formal logic aims at “the greatest possible analysis of the ideas with which it deals.”² And Wilfred Hodges, a distinguished contemporary logician, speaks of formal logic as “an aid to definition and conceptual analysis.”³

The most widely used version of modern formal logic in contemporary analytic philosophy is standard first-order predicate logic (henceforth just “first-order logic”). Indeed, first-order logic, in its Gentzen-style natural deduction guise, has become “the most universally accepted method (within philosophy) of ‘doing logic.’”⁴

As is the case with all formal logics, however, the idea that first-order logic is an adequate tool for the conceptual analysis of a given proposition is something that is (or ought to be) open to inquiry, and there is more than one position that can be taken in response to it. Let us use the name congruism for the position that for a given system of formal logic and a given set of propositions, the propositions of that set can be adequately analysed in terms of the relevant system of formal logic; and let us use the name incongruism for the opposite view. Let us moreover use the name formalism for the position that formal logic

is a better tool than non-formal logic for the conceptual analysis of a given set of propositions; and let us use the name *anti-formalism* for the opposite view.

In this chapter I shall single out a set of propositions with regard to which I shall defend incongruism (vis-à-vis first-order logic) and anti-formalism. The set of propositions I shall single out takes as its members what I shall call “divine nature doctrines,” by which I mean doctrines such as “God exists,” “God is almighty” and “God is all-good” as these doctrines are understood in classical theism.5 The selection of this particular set is pertinent in view of a number of special difficulties that have long been taken to attach to these propositions.6

To the extent that analytic philosophers have made use of modern formal logic in analyzing divine nature doctrines, first-order logic has been the preferred choice. But exactly how first-order analyses of divine nature doctrines are to be carried out in practice is a matter of disagreement.7 Consider for example the doctrine “God exists.” Some take “God” as an argument and “exists” as a monadic function,8 and then subject the doctrine to an argument-function analysis:9

\[
\text{Exists}(\text{God})
\]

Others take “God” as a monadic function and subsume “exists” to quantifier analysis:10

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7 See, once again, my papers “The Emergence of Logical Formalization in the Philosophy of Religion” and “Logic and Divine Simplicity.”

8 In this paper I follow Fregean terminology and speak of arguments and functions rather than of singular terms and predicates.
