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# SCIENCE AND REASON

by

# **David Leslie Fairfax Williams**

1984

This thesis is presented to the University of Auckland in fulfilment of the requirements for the degree of Doctor of Philosophy. This thesis is dedicated to my mother

and

to the memory of my father.

#### FOREWORD

This thesis has a somewhat long genealogy extending back to the early 1970s when I first became acquainted with the ideas of Paul Feyerabend who was at that time a visiting lecturer in the Philosophy Department at Auckland University. Through stimulating my interest in the role played by social and psychological influences in determining the development of scientific knowledge, Feyerabend's lectures led me to explore ways in which current theories in social psychology - the subject in which I was then a student - might be used to make sense of this process. I subsequently attempted to develop a social psychological theory of scientific change, and this became the topic of my Master's thesis. Even then, however, I was not entirely convinced about the validity of the approach I was following, and I soon found myself turning to problems in the theory of knowledge which increasingly seemed to me to be at the core of much contemporary discussion in philosophy of science.

In this way I turned my attention away from the particular domain of social psychology, and towards general philosophy. This transition in my locus of interest has culminated in this thesis.

Few works of this kind are the unaided product of one person's effort, and this is no exception. I gratefully acknowledge the support and criticism of Fred Kroon who has played the role of midwife to this thesis both as helpful supervisor and generous friend. In this connection too I wish to thank Graham Vaughan of the Psychology Department for his friendly support and comments. The continuing assistance and invaluable advice of Alan Robson is gratefully acknowledged as is the help I received from two other good friends, Martin Tweedale and Peter Wills. I hope the result does justice to their expectations; any shortcomings are of course wholly my own.

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Finally, I could not consider this list of acknowledgements complete without making special reference to Lorraine Wilkinson. Her continuing interest and support through what must have been demanding domestic circumstances contributed a great deal to making this thesis possible and for that I am deeply grateful to her.

### ABSTRACT

In this thesis we attempt to undercut the debate between those who argue that because humans are rational and moral creatures it follows that they have to be viewed and studied in a different way to (other) natural beings, and those who argue that because humans are natural beings they can be viewed and studied in much the same way as other natural beings. We claim that the reasons/causes distinction which plays a central role in this debate derives from the Cartesian thought/reality distinction, and argue that a rejection of this undermines the reasons/causes distinction, and with it, the modern humanist-naturalist debate.

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