

PREFACE TO SECOND PRINTING

Several years ago when this work first appeared, it had become apparent that scientists, who play such a key role in the nuclear enterprise, needed to be alerted to the many questions of conscience and legality that were inextricably inter-linked with their work. These lay at the heart of the nuclear weapons problem, for whatever the political and military leaders might ordain, the manufacture of such weapons was a plain impossibility without the active assistance of the scientific profession. Yet no substantive work on this topic had till then been attempted. Such a work appeared at that time to be an urgent and important need.

If the problem was then acute and serious, it is even more so now. The power of nuclear science has grown and with it has grown the power of the individual scientist. Scientists have more power today than they had then, to initiate new developments. The changes in the world order that have occurred in the intervening years enable individual scientists to hold themselves out as available for employment. Those who seek their expertise may include not only governments but other entities as well. The power of global destruction that these scientists command renders it imperative that they be alerted on a continuing basis to the conscience problems that arise.

Hence the need for a re-issue of this work, for which there had been many requests from concerned scientists, professional groups, socially concerned organisations and also from lawyers. I am grateful for the active encouragement I have received to this end from various professional groups and organisations in different countries.

Over the years since this book first appeared, many scientists - and some in positions of leadership in their profession - have shown a deep sensitivity to the social and legal concerns dealt with in this book. Yet, despite the outspoken expression of their views, the scientific conscience has still not been sufficiently sensitised to register a significant result in this vitally important field.

It has been a source of satisfaction, however, that this work has, on occasion, been used in proceedings where conscience issues concerning nuclear scientists have been under consideration.

What is observed in these pages is as relevant now as it was then and it is hoped that the re-issue of this volume will make it more widely available to the scientific profession.

The book is re-issued in its original form but I have sought to up date it by including my more recent work as contained in extracts from

three judicial Opinions bearing upon the matter, which I have had occasion to deliver in recent years.

These Opinions cover the medical aspects of nuclear weaponry, the problems associated with underground nuclear testing and the question of the illegality of nuclear weapons in general. These Opinions serve to amplify the information pertinent to the social and legal problems associated with nuclear weapons and to provide the reader with a composite text which, I hope, is a sufficiently comprehensive and updated survey of the wide range of issues involved.

I trust it will be of assistance not only to weapons scientists but to all who are interested in this seminal problem concerning the very survival of humanity.