The Agent of Trachoma
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Recent Studies on the Biology, Biochemistry
and Immunology of a Prokaryotic Obligate Parasite
of Eukaryocytes
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To the Memory of
HANS BERNKOPF (1910-1967)
Professor and Teacher of Virology
A pioneer in virus and trachoma research whose contributions to the
development of research in these fields are acknowledged

Editor’s Preface
Although the agent of trachoma has now been generally accepted as non-viral,
it was for so long considered a virus that it seems appropriate to include
this review as a Monograph in Virology. Hence, this volume should be useful
not only to those working directly with the trachoma agents, but also to
virologists who need an overview of the developments during the last decade
which have distinguished these chlamydial agents from the viruses.

JOSEPH L. MELNICK
Preface
The opportunity to write a review on the recent developments in the
research on the agent of trachoma had arisen from the invitation of Professor
J. L. MELNICK to revise the review written in 1962, by the late Professor
HANS BERNKOPF. As a result of marked developments in research on the
immunology and biochemistry of the agent, a new review which will compile
the knowledge added in the last decade seemed necessary. I have, therefore,
referred mainly to studies on Chlamydia trachomatis which were published during the last decade. The very important studies on Chlamydia psittaci are beyond the scope of this monograph.

I wish to thank my colleagues, Professor I. C. MICHAELSON and Dr. B. MAYTHAR from the Department of Ophthalmology, Hadassah University Hospital, Jerusalem; Drs. Z. ZAKAY-RONES, I. SAROV, from the Department of Virology, B. GUTTER, and Y. ASHER, Y. COHEN, and H. LOKER from the Laboratory for Molecular Virology, for their continuous and enthusiastic collaboration; Professor S. E. LURIA, Department of Biology, Massachusetts Institute of Technology, Cambridge, Mass., for the critical discussions on the nature of obligate parasitism of viruses and prokaryotes in eukaryotic cells; Professor E. JAWETZ, Department of Microbiology, University of California, San Francisco, Calif., for his continuous interest and support; Dr. M. L. TARIZZO, World Health Organization, Geneva, for his continuous interest and help; Professor A. L. BARRON, on sabbatical leave from the Department of Microbiology, School of Medicine, State University of Buffalo, N. Y.; Professor H. M. JENKIN, Department of Microbiology, Hormel Institute, University of Minnesota, Austin, Minn., for the critical reading of the manuscript and for their comments; Dr. Julia Hadar for proofreading the manuscript; and my wife Miriam Becker for her continuous encouragement.

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The review of the literature was completed July 1972. However, some manuscripts published during 1973, while the Monograph was prepared, are also included.