# Epidemiology and Infection

Formerly the Journal of Hygiene)

# **Epidemiology and Infection**

(Formerly the Journal of Hygiene)

### EDITED BY

J. R. Pattison
Professor of Medical Microbiology
University College, London and the Middlesex Hospital Medical School

J. G. Cruickshank Consultant Microbiologist, Public Health Laboratory, Exeter, Devon C. R. Madeley
Professor of Virology,
University of Newcastle
upon Tyne

W. C. Noble Professor of Microbiology, Institute of Dermatology, London

Assistant editor
P. Morgan-Capner
Consultant Virologist,
Public Health Laboratory,
Preston

## IN CONJUNCTION WITH

M. J. Anderson (London)
R. M. Anderson (London)
R. D. Barry (Australia)
P. S. Brachman (Atlanta)
M. Degré (Oslo)
S. M. Feinstone (Bethesda)
R. G. Finch (Nottingham)
R. J. Gilbert (London)
Anna Hambraeus (Uppsala)

M. H. Hinton (Bristol)
J. B. Kurtz (Oxford)
J. C. de Jong (Bilthoven)
M. J. Lewis (Nottingham)
D. H. Lloyd (London)
R. R. Marples (London)
O. H. Meurman (Turku)
P. P. Mortimer (London)
J. Naidoo (London)

J. S. Oxford (London)
B. Rowe (London)
M. B. Skirrow (Worcester)
R. S. Tedder (London)
H. E. Tillett (London)
D. van der Waaij
(Groningen)
A. T. Willis (Luton)

Epidemiology and Infection publishes reports of research and original findings in subjects related to infectious diseases. Particular emphasis is given to the epidemiology, prevention and control of such diseases, but the field covered is broad and includes the microbiological, virological, immunological, clinical and social aspects of infectious diseases of man and animals.

© Cambridge University Press 1987

# PERMISSIONS

### Copying

This journal is registered with the Copyright Clearance Center, 27 Congress Street, Salem, Mass. 01970. Organizations in the USA who are also registered with the C.C.C. may therefore copy material (beyond the limits permitted by sections 107 and 108 of US copyright law) subject to payment to C.C.C. of the per-copy fee of \$5.00. This consent does not extend to multiple copying for promotional or commercial purposes. Code 0950-2688/87 \$5.00 + .00.

ISI Tear Sheet Service, 3501 Market Street, Philadelphia, Pennsylvania 19104, USA, is authorized to supply single copies of separate articles for private use only.

For all other use, permission should be sought from Cambridge or the American Branch of Cambridge University Press.

### SUBSCRIPTIONS

Epidemiology and Infection (ISSN 0950-2688) is published annually in two volumes of three parts in February, April, June, August, October and December.

The subscription price of volumes 98 and 99, 1987, is £45 net (USA and Canada US \$102.50) per volume (post free); single parts are available at £18 net (USA and Canada US \$43) plus postage. Back volumes are also available. Orders, which must be accompanied by payment, may be sent to any bookseller or subscription agent or to the publisher: Cambridge University Press, The Edinburgh Building, Shaftesbury Road, Cambridge CB2 2RU, or in the USA and Canada to Cambridge University Press, 32 East 57th Street, New York, NY 10022. Second class postage paid at New York, NY, and at additional mailing offices. POSTMASTER: send address changes in USA and Canada to Epidemiology and Infection, Cambridge University Press, 32 East 57th Street, New York, NY 10022.

Claims for missing issues should be made immediately on receipt of the subsequent issue.