

Animal Welfare

Vol 6 No 2

1997

Articles

Use of shelters by laboratory rats

Postgraduate teaching in farm animal welfare

Night shooting of wild impala

Rocking in chimpanzees

Behaviour of pigs in lairage

Environmental enrichment for bush dogs

Pigeon behaviour under crowded conditions

Reports and comments

Book and video reviews

UNIVERSITIES
FEDERATION
FOR
ANIMAL
WELFARE

Animal Welfare

ISSN 0962-7286

Editor-in-Chief: James K Kirkwood

Editorial Assistant: Laura Beveridge

Scientific Officer: Melissa Albentosa

Development Officer: Victoria Taylor

Typesetter: Indira Patel, Samantha Griffin

Universities Federation for Animal Welfare

8 Hamilton Close, South Mimms, Potters Bar, Herts EN6 3QD, UK

Tel: 01707 658202 Fax: 01707 649279

Section Editors

Farmed mammals and fish

Professor Berry M Spruijt

Animal Welfare Centre

Utrecht University

Yalelaan 17

3584 CL Utrecht, The Netherlands

Zoo and wild animals

Dr Miranda Stevenson

Royal Zoological Society of Edinburgh

Edinburgh Zoo

Murrayfield

Edinburgh EH12 6TS, UK

Ethics and philosophy

Dr Marian Stamp Dawkins

Department of Zoology

University of Oxford

South Parks Road

Oxford OX1 3PS, UK

Companion animals

Dr Dennis C Turner

Institute for applied Ethology and

Animal Psychology (IEAP)

Vorderi Siten 30

Postfach 8816 Hirzel, Switzerland

Laboratory animals

Professor Jann Hau

Department of Comparative Medicine

University of Uppsala

Box 570

75123 Uppsala, Sweden

Poultry

Dr Linda Keeling

Department of Animal Environment
and Health

Swedish University of Agricultural Sciences

PO Box 234

SE-532 23 Skara, Sweden

Editorial Advisers

Dr Robert Baker - ANZCCART, University of Adelaide, Australia

Dr M F Bouissou - Institut National de la Recherche Agronomique, France

Mr Roger Ewbank - Ealing, London, UK

Dr Michael Festing - University of Leicester, UK

Dr David Fraser - Centre for Food and Animal Research, Ottawa, Canada

Professor Benjamin Hart - University of California, Davis, USA

C B Hart - Berkhamsted, Herts, UK

Professor David Morton - University of Birmingham, UK

Dr James Serpell - University of Pennsylvania, USA

Professor John Webster - University of Bristol, UK

Animal Welfare (ISSN 0962-7286) brings together the results of scientific research and technical studies related to the welfare of animals kept on farms, in laboratories, as companions, in zoos or managed in the wild.

Subscription rates: Individuals £50/US\$100; Corporate/Institutes/Libraries £70/US\$140 per year.

Orders: Can be made direct to UFAW and are accepted by Volume, which consists of four issues per year.

Papers: Instructions for authors are summarized on the inside back cover; comprehensive instructions are available on request. Manuscripts should be submitted preferably to the appropriate Section Editor or to the Editor-in-Chief.

Animal Welfare is abstracted in *Biological Abstracts*; *CAB Abstracts*; *Current Contents/Agriculture, Biology and Environmental Sciences*; *Current Primate References*; *Focus on: Veterinary Science & Medicine*; *The InterActions Bibliography*; *Research Alert*; *SciSearch*; *Sociological Abstracts*; *Toxicology Abstracts*; *Veterinary Update*; is indexed in *Zoological Record*, and is covered by the *Science Citation Index*.

© 1997 UFAW

All rights reserved; no part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means; electronic, mechanical, photocopying, recording or otherwise without the prior written permission of the Publisher. **Opinions expressed by authors do not necessarily reflect the views of UFAW, its Council, Staff, Members or Associates, the Section Editors or the Editorial Advisers.**

Animal Welfare

ISSN 0962-7286

Volume 6 Number 2

May 1997

CONTENTS

ARTICLES

- Use of in-cage shelters by laboratory rats** 95
P Townsend
- Postgraduate teaching in farm animal welfare and ethics** 105
V Lund
- Welfare implications of the night shooting of wild impala** 123
(Aepyceros melampus)
A R Lewis, A M Pinchin and S C Kestin
- The effect of a short-term biomedical research protocol on stereotyped rocking in young chimpanzees** 133
K A Pazol and M A Bloomsmit
- The behaviour of pigs in lairage in relation to their post-weaning management: results of a postal survey** 139
E J Hunter, H L Riches, H J Guise and R H C Penny
- Effect of wood-pile feeders on the behaviour of captive bush dogs (*Speothos venaticus*)** 145
R Ings, N K Waran and R J Young
- Behaviour and thermogenesis of racing pigeons housed under transport conditions** 153
J Gorssen and P Koene
- REPORTS AND COMMENTS** 169
- Safer roads for horses
- Welfare of animals kept for harvesting of blood
- Economics and food animal welfare
- Humane killing of laboratory animals
- Ethics of Xenotransplantation
- Farmed fish welfare
- Humane control of vertebrate pests
- BOOK AND VIDEO REVIEWS** 174
- An Introduction to Keeping Sheep, 2nd edition*
- Agricide: The Hidden Farm and Food Crisis That Affects Us All, 2nd Edition*
- Taking Animals Seriously: Mental Life and Moral Status*
- Urban Wildlife*
- Managing Vertebrate Pests: Feral Goats*
- Kinds of Minds: Towards an Understanding of Consciousness*
- Food Ethics*
- Animal Welfare Legislation in Canada and Germany*
- Birds of Prey: Management and Training*

Published by

Universities Federation for Animal Welfare

8 Hamilton Close, South Mimms, Potters Bar, Herts EN6 3QD, UK

Tel: 01707 658202 Fax: 01707 649279