

Nutrition Research Reviews, published annually by Cambridge University Press, presents authoritative and critical reviews of research that advance new concepts and encourage fresh thinking on a variety of nutritional problems. The journal's main objective is to encourage the exchange of fundamental ideas on nutritional well-being. The subscription (excluding VAT) to volume 8, 1995, is £49 including postage (US \$89 in USA, Canada and Mexico).

The Proceedings of the Nutrition Society, published by Cambridge University Press, in part record meetings of the Symposium type, at which experts in a particular field are invited by Council to make contributions on specific parts of it and at which general discussion follows these invited contributions. The meetings also include sessions at which papers are communicated by members and others on original work. It is proposed at present to publish summaries of the papers read at each meeting, each communication being recorded in the Society's *Proceedings* by means of an abstract not exceeding in length 400 words or the equivalent space in print. The *Proceedings* are published three times a year.

The subscription (excluding VAT) to the *Proceedings* is £126.00 (US \$240.00 in USA, Canada and Mexico). Single issues are £44.00 (US \$85.00 in the USA, Canada and Mexico) each; postage extra.

Copying. This journal is registered with the Copyright Clearance Center, 222 Rosewood Drive, Danvers, MA 01923. Organizations in the USA who are also registered with C.C.C. may therefore copy material (beyond the limits permitted by sections 107 and 108 of the US copyright law) subject to payment to C.C.C. of the per-copy fee of \$11.00. This consent does not extend to multiple copying for promotional or commercial purposes. Code 0007-1145/95 \$11.00+10. Organizations authorized by the Copyright Licensing Agency may also copy material subject to the usual conditions.

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.

INDEX OF AUTHORS

Alamowitch, C.	241	French, S. J.	179	Poupon, R.	227
Anderson, A. S.	163	Giboudeau, J.	227	Read, N. W.	179
Asp, N.-G.	275	Grooten, H. N. A.	253	Reilly, J. J.	323
Batterham, E. S.	259	Klipstein-Grobusch, K.	323	Roberts, M. A.	323
Berger, A.-M.	241	Kloots, W. J.	287	Rumsey, R. D. E.	179
Boillot, J.	241	Kuwata, T.	299	Schreurs, V. V. A. M.	253
Bornet, F. R. J.	241	Kyriazakis, I.	191	Shepherd, R.	163
Bruzzo, F.	241	Kyung Lim, S.	227	Skingle, D. C.	259
Campbell, D. M.	163	Lau, J.	311	Slama, G.	241
Coudray-Lucas, C.	227	Lee, W. T. K.	311	Tsuchita, H.	299
Cynober, L.	227	Leung, S. S. F.	311	van Amelsvoort, J. M. M.	287
De Bandt, J. P.	227	Luo, J.	241	van Barneveld, R. J.	259
de Deckere, E. A. M.	287	Macleod, N. A.	155	Wang, S. H.	311
Deb Hovell, F. D.	155	Murray, B.	179	Weijs, P. J. M.	253
Durand, D.	209	Norton, B. W.	259	Xu, Y. C.	311
Duric, M.	155	Önning, G.	275	Zeng, W. P.	311
Edwards, C. A.	323	Ørskov, E. R.	155	Zhao, G. Y.	155
Emmans, G. C.	191	Ortigue, I.	209		
Fadzin, R.	179	Potter, J.	323		
Fairweather-Tait, S. J.	311				
Feng, Y. L.	155				

CONTENTS

Editorial

Nutrient bandwagons. *D. A. T. Southgate* 153-154

Saliva, osmotic pressure and water transport

The use of intragastric nutrition to study saliva secretion and the relationship between rumen osmotic pressure and water transport. *G. Y. Zhao, M. Đuric, N. A. Macleod, E. R. Ørskov, F. D. Deb Hovell & Y. L. Feng* 155-161

Factors affecting dietary intake

The influence of dietary advice on nutrient intake during pregnancy. *Annie S. Anderson, Doris M. Campbell & Richard Shepherd* 163-177

Adaptation to high-fat diets: effects on eating behaviour and plasma cholecystokinin. *S. J. French, B. Murray, R. D. E. Rumsey, R. Fadzlin & N. W. Read* 179-189

The voluntary feed intake of pigs given feeds based on wheat bran, dried citrus pulp and grass meal, in relation to measurements of feed bulk. *I. Kyriazakis & G. C. Emmans* 191-207

Adaptation to undernutrition in ewes

Adaptation of energy metabolism to undernutrition in ewes. Contribution of portal-drained viscera, liver and hindquarters. *Isabelle Ortigues & D. Durand* 209-226

Hepatic metabolism in rats

Metabolism of ornithine, α -ketoglutarate and arginine in isolated perfused rat liver. *Jean Pascal De Bandt, Luc Cynober, Soo Kyung Lim, Colette Coudray-Lucas, Raoul Poupon & Jacqueline Giboudeau* 227-239

Effects of dietary propionate on hepatic glucose production, whole-body glucose utilization, carbohydrate and lipid metabolism in normal rats. *Josette Boillot, Catherine Alamowitch, Anne-Marie Berger, Jing Luo, Françoise Bruzzo, Francis R. J. Bornet & Gerard Slama* 241-251

Pregnancy and leucine utilization in the rat

Meal feeding and leucine utilization in pregnant rats. *P. J. M. Weijs, V. V. A. M. Schreurs & H. N. A. Grooten* 253-258

Effects of heat-treated amino acids

The effect of heat on amino acids for growing pigs. 4. Nitrogen balance and urine, serum and plasma composition of growing pigs fed on raw heat-treated field peas (*Pisum sativum*). *R. J. van Barneveld, the late E. S. Batterham, D. C. Skingle & B. W. Norton* 259-273

Lipid metabolism and the effect of complex carbohydrates

Effect of oat saponins on plasma and liver lipids in gerbils (*Meriones unguiculatus*) and rats. *G. Önning & N.-G. Asp* 275-286

continued on page facing inside back cover

For Index of Authors see inside back cover

CAMBRIDGE
UNIVERSITY PRESS



0007-1145(199502)73:2;1-Z