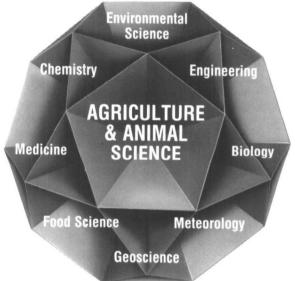
Agriculture research has many facets



That's why you need the **Science Citation Index**®

The Science Citation Index covers the most important facets of agriculture and animal science research. So you get the information you need from the agriculture and animal science journal literature ... plus you locate articles relevant to your research from the 100 other scientific disciplines represented.

The Science Citation Index gives you access to every substantive article in each of the 3,300 publications covered. And the SCI®'s coverage extends from 1955 to date. That's three decades of important scientific literature!

To find out more about the Science Citation Index's many facets, write or call us at the address below.



Institute for Scientific Information®

Customer Services Department, 3501 Market Street, Philadelphia, PA 19104 U.S.A. Telephone: (215)386-0100, ext. 1371, Cable: SCINFO, Telex: 84-5305 European Office: 132 High Street, Uxbridge, Middlesex UB8 1DP, United Kingdom Telephone: 44-895-70016, Telex: 933693 UKISI

01985 ISI 48-3678

Continued from back cover

STANLEY PRICE, M. R. Game domestication for animal production in Kenya: feeding trials with oryx, zebu cattle and sheep under controlled conditions	367
STANLEY PRICE, M. R. Game domestication for animal production in Kenya: the nutritional ecology of oryx, zebu cattle and sheep under free-range conditions	375
KIRBY, E. J. M., APPLEYARD, MARGARET and FELLOWES, GWYNNETH. Variation in development of wheat and barley in response to sowing date and variety	383
FOLDES, A., DONNELLY, J. B., MAXWELL, C. A., JAMES, S. B. and CLANCY, S. L. Circadian rhythm in wool depilation force in Merino and Merino × Border Leicester sheep	397
GREEN, C. F., FURMSTON, D. T. and IVINS, J. D. Time of sowing and the yield of winter barley	405
RAMOS, J. M., GARCIA DEL MORAL, L. F. and RECALDE, L. Vegetative growth of winter barley in relation to environmental conditions and grain yield	413
KATYAL, J. C., DOSHI, S. P. and MALHOTRA, P. K. Use of cluster analysis for classification of Benchmark soil samples from India in different micronutrient availability groups	421
SINGH, S. and PRASAD, R. Studies on the nitrification inhibitor, dicyandiamide (DCD), for increasing the efficiency of nitrogen applied to rice	425
ESECHIE, H. A. Relationship of stalk morphology and chemical composition to lodging resistance in maize (Zea mays L.) in a rainforest zone	429
JANES, A. N., WEEKES, T. E. C. and ARMSTRONG, D. G. Carbohydrase activity in the pancreatic tissue and small intestine mucosa of sheep fed dried-grass or ground maize-based diets	435
CORBET, SARAH A. and PLUMRIDGE, JANETTE R. Hydrodynamics and the germination of oil-seed rape pollen.	445
WILMAN, D. and HOLLINGTON, P. A. Effects of white clover and fertilizer nitrogen on herbage production and chemical composition and soil water.	453
SHORT NOTES	
Parsons, C. M. Influence of caecectomy on digestibility of amino acids by roosters fed distillers' dried grains with solubles	469
HASSAN, G. A., EL-NOUTY, F. D. and SALEM, M. H. Relationship between milk intensity and pituitary-thyroid function in water buffaloes	473
PRAKASA RAO, E. V. S., SINGH, M., GANESHA RAO, R. S. and RAMESH, S. Effect of urea and neem cake coated urea on yield, and concentration and quality of essential oil in Java citronella (Complene of the property of the property)	477

THE JOURNAL OF AGRICULTURAL SCIENCE

CONTENTS

Vol. 104 Part 2 April 1985

	PAGE
SADANA, U. S. and BAJWA, M. S. Manganese equilibrium in submerged sodic soils as influenced by application of gypsum and green manuring	257
NATARAJAN, M. and WILLEY, R. W. Effect of row arrangement on light interception and yield in sorghum-pigeonpea intercropping.	263
BRUCKENTAL, I., HALEVI, A., AMIR, S., NEUMARK, H., KENNIT, HANNA and SCHROEDER, G. The ratio of naturally occurring ¹³ C and ¹² C isotopes in sheep diet and faeces as a measurement for direct determination of lucerne hay and maize grain digestibilities in mixed diets	271
SADANA, U. S. and TAKKAR, P. N. Effect of salt, alkali and zinc on iron equilibrium in submerged soils	275
Keatinge, J. D. H., Dennett, M. D. and Rodgers, J. The influence of precipitation regime on the management of three-course crop rotations in northern Syria	281
REYNOLDS, L. P., FERRELL, C. L., NIENABER, J. A. and FORD, S. P. Effects of chronic environmental heat stress on blood flow and nutrient uptake of the gravid bovine uterus and foetus.	289
EBERSOHN, J. P., MOIR, K. W. and DUNCALFE, F. Inter-relationships between pasture growth and senescence and their effects on live-weight gain of grazing beef cattle.	299
SHARMA, P. K., SINHA, A. K. and CHAUDHARY, T. N. Upward flux of water and deep-placed P in relation to soil texture, water table depth and evaporation rate	303
CHOUDHARI, S. D., UDAYKUMAR, M. and SASTRY, K. S. K. Physiology of bunch groundnuts (Arachis hypogaea L.).	309
STARR, CAROL, SUTTLE, JANET, MORGAN, A. G. and SMITH, D. B. A comparison of sample preparation and calibration techniques for the estimation of nitrogen, oil and glucosinolate content of rapeseed by near infrared spectroscopy	317
PINK, D. A. C. and WALKEY, D. G. A. Effect of temperature and light intensity on resistance in marrow (Cucurbita pepo) to cucumber mosaic virus	325
CHAMBERLAIN, D. G., THOMAS, P. C., WILSON, WILMA, NEWBOLD, C. J. and MACDONALD, J. C. The effects of carbohydrate supplements on ruminal concentrations of ammonia in animals given diets of grass silage.	331
RAI, R. Competitiveness and effectiveness of carbendazim-resistant mutant and indigenous <i>Rhizobium</i> strains of chick pea (Cicer arietinum Linn.) in calcareous soil	341
DHILLON, S. S. and LARSSON, S. Screening technique for frost resistance in Brassica oil seeds	345
COLEMAN, G. S. The cellulase content of 15 species of entodiniomorphid protozoa, mixed bacteria and plant debris isolated from the ovine rumen	349
ZYGOYIANNIS, D., STAMATARIS, C. and CATSAOUNIS, N. The melting point, iodine value, fatty acid composition and softness index of carcass fat in three different breeds of suckled lambs in Greece	361

Continued on inside back cover

© Cambridge University Press 1985

COPYING. This journal is registered with the Copyright Clearance Center, 21 Congress Street, Salem, Mass. 01970. 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 US copyright law) subject to payment to C.C.C. of the per-copy fee of \$05.00. This consent does not extend to multiple copying for promotional or commercial purposes. Code 0021-8596/85/2828-0001 \$05.00.

ISI Tear Service, 3501 Market Street, Philadelphia, Pennsylvania 19106, 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 New York offices of Cambridge University Press. POSTMASTER: send address changes in USA and Canada to The Journal of Agricultural Science, Cambridge University Press, 32 East 57th Street, New York, NY 10022.