

For those of you who need to know what's happening in statistics . . .

The Institute of Mathematical Statistics
and
The American Statistical Association

announce publication of Volume Two of

**CURRENT INDEX TO STATISTICS:
APPLICATIONS, METHODS AND
THEORY**

An annual computerized index to the statistical literature

Coverage — Over 4,000 articles in “core” and “related” journals for 1976 are indexed. Author index & index by key words. Example of subject index (complete reference to journal, volume, pages, etc., is given):

Important word

Asymptotic Properties of Non-linear Least Squares Estimators • R. I. Jennrich
Interval Estimation of Non-linear Parametric Functions • Halpern, Mantel
Interval Estimation of Non-linear Parametric Functions, II • M. Halpern
On a Problem in Non-linear Prediction Theory • J. B. Robertson
Convergence in Non-linear Regression • T. Tornheim
Non-linear Regression with Minimal Assumptions • H. M. Wagner
Non-linear
Discrimination Among Mechanistic Models • G.E.P. Box
New Analysis of Variance Model for Nonadditive Data • J. Mandel
Simplified Experimental Design • M. J. Box

Key word

Who should subscribe — All individuals who spend any significant fraction of their time doing statistics. Anyone who spends more than *one hour per year* looking for an article on a particular topic in statistics or redeveloping some technique that already exists in the literature will find it cost effective to have a personal copy of this index.

Editor — Brian L. Joiner, University of Wisconsin.

Management Committee — Donald A. Gardiner, Chairman; Robert M. Elashoff, Seymour Geisser, David Hoaglin, David L. Wallace

Subscription Rates — \$9.00 for members of the two sponsoring societies
\$12.00 for other individuals
\$18.00 for organizational/library subscriptions
(Volume One, covering 1975 journals, available at the same rate.)

Send orders and remittance to —

**The Institute of Mathematical Statistics
Business Office
3401 Investment Blvd. Suite 6
Hayward, California 94545**

THE ANNALS OF STATISTICS

VOLUME 6

May 1978

No. 3

Articles

- A natural identity for exponential families with applications in multi-parameter estimation H. M. HUDSON
- Likelihood ratio tests for order restrictions in exponential families
TIM ROBERTSON AND EDWARD J. WEGMAN
- A finite sample distribution-free performance bound for local discrimination rules W. H. ROGERS AND T. J. WAGNER
- Asymptotically efficient solutions to the classification problem
LOUIS GORDON AND RICHARD A. OLSHEN
- Nonparametric estimation of partial transition probabilities in multiple decrement models ODD AALEN
- Bahadur efficiencies of the Student's t tests
DOUGLAS H. JONES AND J. SETHURAMAN
- Sequential Bahadur efficiency ROBERT H. BERK AND L. D. BROWN
- Interval estimation for the unbalanced case of the one-way random effects model JAMES D. THOMAS AND ROBERT A. HULTQUIST
- Asymptotic normality of multivariate linear rank statistics in the non-i.i.d. case F. H. RUYMGAART AND M. C. A. VAN ZUIJLEN
- Weighted median regression estimates ... FRIEDRICH-WILHELM SCHOLZ
- Estimates of location: a large deviation comparison
GERALD L. SIEVERS
- Repeated measurements designs, II
A. HEDAYAT AND K. AFSARINEJAD
- On conditional least squares estimation for stochastic processes
LAWRENCE A. KLIMKO AND PAUL I. NELSON
- Covariance characterization by partial autocorrelation matrices
M. MORF, A. VIEIRA AND T. KAILATH
- Bayesian confidence bands for a distribution function M. BRETH
- An adaptive solution to ranking and selection problems ... Y. L. TONG
- Admissible solutions of finite state sequence compound decision problems STEPHEN B. VARDEMAN
- Strong convergence of a stochastic approximation algorithm
LENNART LJUNG

Short Communication

- A note on a finite population plan PETER W. M. JOHN

CATALOG OF PUBLICATIONS OF THE INSTITUTE OF MATHEMATICAL STATISTICS

ANNALS INDEX

The Annals of Mathematical Statistics, Index to Volumes 1-31, 1930-60, edited by J. Arthur Greenwood, Ingram Olkin and I. Richard Savage, 1962, xiii+658

Nonmember Subscriber Cost—\$15.00, Member Cost—\$7.00.

Order directly from Robert Elashoff, Treasurer, IMS, Business Office, 3401 Investment Blvd., Suite 6, Hayward, California 94545.

STATISTICAL RESEARCH MONOGRAPHS

This series is sponsored jointly by the Institute of Mathematical Statistics and the University of Chicago. Discount to members of IMS is 20 percent.

The passage problem for a stationary Markov chain by J. H. B. Kemperman, 1961, 127 pp. List price—\$7.00.

Statistical inference for Markov processes by Patrick Billingsley, 1961, 75 pp. List price—\$4.95.

Sequential identification and ranking procedures by Robert E. Bechhofer, Jack Kiefer and Milton Sobel, 1968, xvii+420 pp. List price—\$20.00.

The analysis of frequency data by Shelby J. Haberman, 1974, 432 pp. List price—\$15.00 (Available only as Midway Reprint Paperback)

Order directly from the University of Chicago Press, 11030 S. Langley Ave., Chicago, Illinois 60637.

SELECTED TABLES IN MATHEMATICAL STATISTICS

This series of volumes is prepared by the Committee of Mathematical Tables of the Institute of Mathematical Statistics and is published by the American Mathematical Society for the IMS. Discount to members of IMS is 25 percent.

Selected tables in mathematical statistics, Vol. I, edited by H. L. Harter and D. B. Owen, 1970, vi+405 pp. \$13.20

Selected tables in mathematical statistics, Vol. II, edited by H. L. Harter and D. B. Owen, 1974, viii+338 pp. \$16.40

Selected tables in mathematical statistics, Vol. III, edited by H. L. Harter and D. B. Owen with J. M. Davenport, viii+424 pp. \$21.60

Selected tables in mathematical statistics, Vol. IV, edited by D. B. Owen and R. E. Odeh with J. M. Davenport, x+309 pp. \$18.00

Selected tables in mathematical statistics, Vol. V, edited by D. B. Owen and R. E. Odeh with J. M. Davenport, viii+263 pp. \$16.80

Send prepaid orders directly to the American Mathematical Society, P.O. Box 1571, Providence, Rhode Island 02901, Attention: Sales Department.
