

# Pacific Journal of Mathematics

S. A. Argyros, On compact spaces without strictly positive measure . . . . .	257
S. R. Bell, Regularity of the Bergman projection in certain non-pseudoconvex domains . . . . .	273
C. R. Borges and G. Gruenhagen, Sup-characterization of stratifiable spaces . . . . .	279
G. Ceresa and A. Collino, Some remarks on algebraic equivalence of cycles . . . . .	285
C. K. Chui and M. Hasson, Degree of uniform approximation on disjoint intervals . . . . .	291
G. G. Gundersen, Meromorphic functions that share two finite values with their derivative . . . . .	299
R. Hartley, Lifting group homomorphisms . . . . .	311
G. W. Johnson and D. L. Skoug, Notes on the Feynman integral, III: The Schroedinger equation . . . . .	321
J. C. Kieffer, Some topologies on the set of discrete stationary channels . . . . .	359
H. Luschgy and W. Thomsen, Extreme points in the Hahn-Banach-Kantorovič setting . . . . .	387
Z. Piotrowski, A. Rosłanowski and B. M. Scott, The pinched-cube topology . . . . .	399
E. Saab and P. Saab, A dual geometric characterization of Banach spaces not containing $l_1$ . . . . .	415
W. Schachermayer, Norm attaining operators on some classical Banach spaces . . . . .	427
M. Scharlemann, Essential tori in 4-manifold boundaries . . . . .	439
J. C. H. Simon, Non-linear representations of Poincaré group and global solutions of relativistic wave equations . . . . .	449
A. R. Wadsworth, $p$ -Henselian fields: $K$ -theory, Galois cohomology, and graded Witt rings . . . . .	473

*Subject listing on back cover*

# PACIFIC JOURNAL OF MATHEMATICS

## EDITORS

DONALD BABBITT (Managing Editor)

University of California  
Los Angeles, CA 90024

HUGO ROSSI

University of Utah  
Salt Lake City, UT 84112

C. C. MOORE and ARTHUR OGUS

University of California  
Berkeley, CA 94720

J. DUGUNDJI

Department of Mathematics  
University of Southern California  
Los Angeles, CA 90089-1113

R. FINN and H. SAMELSON

Stanford University  
Stanford, CA 94305

## ASSOCIATE EDITORS

R. ARENS

E. F. BECKENBACH  
(1906–1982)

B. H. NEUMANN

F. WOLF

K. YOSHIDA

## SUPPORTING INSTITUTIONS

UNIVERSITY OF ARIZONA  
UNIVERSITY OF BRITISH COLUMBIA  
CALIFORNIA INSTITUTE OF TECHNOLOGY  
UNIVERSITY OF CALIFORNIA  
MONTANA STATE UNIVERSITY  
UNIVERSITY OF NEVADA, RENO  
NEW MEXICO STATE UNIVERSITY  
OREGON STATE UNIVERSITY

UNIVERSITY OF OREGON  
UNIVERSITY OF SOUTHERN CALIFORNIA  
STANFORD UNIVERSITY  
UNIVERSITY OF HAWAII  
UNIVERSITY OF TOKYO  
UNIVERSITY OF UTAH  
WASHINGTON STATE UNIVERSITY  
UNIVERSITY OF WASHINGTON

---

The Supporting Institutions listed above contribute to the cost of publication of this Journal, but they are not owners or publishers and have no responsibility for its content or policies.

---

Mathematical papers intended for publication in the *Pacific Journal of Mathematics* should be in typed form or offset-reproduced (not dittoed), double spaced with large margins. Please do not use built up fractions in the text of the manuscript. However, you may use them in the displayed equations. Underline Greek letters in red, German in green, and script in blue. The first paragraph must be capable of being used separately as a synopsis of the entire paper. In particular it should contain no bibliographic references. Please propose a heading for the odd numbered pages of less than 35 characters. Manuscripts, in triplicate, may be sent to any one of the editors. Please classify according to the scheme of Math. Reviews, Index to Vol. 39. Supply name and address of author to whom proofs should be sent. All other communications should be addressed to the managing editor, or Elaine Barth, University of California, Los Angeles, California 90024.

There are page-charges associated with articles appearing in the Pacific Journal of Mathematics. These charges are expected to be paid by the author's University, Government Agency or Company. If the author or authors do not have access to such Institutional support these charges are waived. Single authors will receive 50 free reprints; joint authors will receive a total of 100 free reprints. Additional copies may be obtained at cost in multiples of 50.

---

The *Pacific Journal of Mathematics* is issued monthly as of January 1966. Regular subscription rate: \$132.00 a year (6 Vol., 12 issues). Special rate: \$66.00 a year to individual members of supporting institutions.

Subscriptions, orders for numbers issued in the last three calendar years, and changes of address should be sent to Pacific Journal of Mathematics, P.O. Box 969, Carmel Valley, CA 93924, U.S.A. Old back numbers obtainable from Kraus Periodicals Co., Route 100, Millwood, NY 10546.

---

The *Pacific Journal of Mathematics* ISSN 0030-8730 is published monthly by the Pacific Journal of Mathematics at P.O. Box 969, Carmel Valley, CA 93924. Application to mail at Second-class postage rates is pending at Carmel Valley, California, and additional mailing offices. Postmaster: Send address changes to Pacific Journal of Mathematics, P. O. Box 969, Carmel Valley, CA 93924.

PUBLISHED BY PACIFIC JOURNAL OF MATHEMATICS, A NON-PROFIT CORPORATION

Copyright © 1983 by Pacific Journal of Mathematics