

Photogrammetric Engineering

Volume XVII

JUNE, 1951

Number 3

CONTENTS

List of Sustaining Members	341
Important Announcements	342
Board of Direction, Executive Committee and Committee Chairmen	345
Principles of Application of Photo-Interpretation to Engineer Intelligence— <i>Matthew M. Witenstein</i>	349
PANEL DISCUSSION—ADAPTABILITY AND ACCURACY OF STEREO-PLOTTING INSTRUMENTS	356
United States and International Methods of Comparing Accuracy of Photogrammetric Instruments— <i>John V. Sharp</i>	358
How to Build a Dam— <i>Leon T. Eliel</i>	361
Large-Scale Small-Contour Interval Topographic Mapping— <i>Louis A. Woodward</i>	364
Report from Aero Service Corporation— <i>A. O. Quinn</i>	367
Accuracy and Adaptability of Stereoplotting Instruments as Revealed by U. S. Geological Survey Practice— <i>Robert E. Altenhofen</i>	370
Discussion and Summarization— <i>Professor Ir. W. Schermerhorn</i>	375
General Discussion	379
Calibration of Survey Cameras and Lens Testing— <i>Dr. Duncan E. Macdonald</i>	383
PANEL DISCUSSION—CAMERAS, LENSES, AND CALIBRATION	391
The Specification of Resolving Power Tests— <i>Dr. Irvine C. Gardner</i>	392
Calibration of Lenses and Cameras— <i>Dr. K. Pestrecov</i>	398
European Point of View on Standardizing the Methods of Testing Photogrammetric Aerial Cameras— <i>F. L. Corten</i>	401
English Viewpoint: Lens Testing and Camera Calibration— <i>J. E. Odle</i>	406
Various Viewpoints— <i>Professor Schermerhorn</i>	413
A Camera Manufacturer's Comment on Camera Calibration— <i>Revere G. Sanders</i>	415
Discussion	417
Mississippi Highway Department Conducts Training Course in Highway Photogrammetry— <i>W. J. Crecink, Jr.</i>	425
Photogrammetry Saves Time for State Highway Department.	430

Continued on page 341

Entered as second-class matter at the Post Office at Menasha, Wisconsin, under the Act of August 24, 1912. Additional entry as second-class matter at the Post Office at Washington, D. C.

Published five times a year, during the months of March, April, June, September and December, by the American Society of Photogrammetry. Publication Office 450-458 Ahnaip St., Menasha, Wis. and at Society's Address—P.O. Box 18, Benjamin Franklin Station, Washington, D. C.

Copyright 1951 by the American Society of Photogrammetry. Reproduction of this issue or any part thereof, may be made only after obtaining the specific approval of the Society's Chairman of the Publications Committee.

The Society is not responsible for any statements made or opinions expressed in its publications.

Subscription Rates—\$6 annually for subscribers in United States and its possessions; and \$6.50 annually, elsewhere. Society pays the postage. Price of individual back numbers—in U. S. and its possessions, \$1.75 per copy for single purchase of 3 or less and \$1.65 per copy, for 4 or more; elsewhere \$1.85 per copy for single purchase of 3 or less and \$1.75 per copy, for 4 or more.

CONTENTS (Continued)

PANEL DISCUSSION—INTEGRATION OF PHOTOGRAMMETRY INTO HIGHER EDUCATION	431
A Study of the Status of Photogrammetry in the Engineering Schools of the United States and Canada— <i>Russell C. Brinker</i>	432
Instruction in Photogrammetry at the University of Illinois— <i>Professor W. H. Rayner</i>	442
Suggested Equipment for Teaching Photogrammetry— <i>Professor Lawrence Perez</i>	446
Higher Education for Photogrammetry in Government Mapping— <i>Robert L. Moravetz</i>	456
Training in Photogrammetry for Highway Engineering— <i>H. J. Spelman</i>	458
Training for Aerial Photographers and Commercial Mapping— <i>J. Robert Coltharp</i>	461
Discussion	464
Topographical Mapping by Helicopter— <i>G. C. Emerson</i>	473
Supplementary Report of Research Committee	483
National Research Council	488
Review of Books, Publications and Papers	489
News Note—International Archives of Photogrammetry	491
News Notes	482, 491
News of Photogrammetrists	494
Resolving Power	494
Index to Advertisers	341

SUSTAINING MEMBERS

<p>Abrams Aerial Survey Corp. Abrams Instrument Corp. Aero Service Corporation Aeroflex Laboratories Aircraft Operating Co. of Africa (Pty) Ltd., Johannesburg, S. Africa The Air Survey Co. of Africa Ltd., Durban, Natal, S. Africa Jack Ammann Photogrammetric Engineers Anso Division of General Aniline and Film Corp. Michael Baker Jr., Inc. Bausch & Lomb Optical Company Miss Louise A. Boyd Brunsviga Maschinenwerke, Braunschweig, Germany Chicago Aerial Survey Co. Diretoria de Hidrografia e Navegacao, Rio de Janeiro, Brazil Eastman Kodak Company Edgerton, Germeshausen & Grier, Inc.</p>	<p>Fairchild Aerial Surveys, Inc. Fairchild Camera & Instrument Corp. Galileo Corp. of America Grant Photo Products, Inc. Mark Hurd Mapping Co. Hycon Mfg. Company The Kalart Company, Inc. Park Aerial Surveys, Inc. Photographic Survey Co., Ltd., Toronto Harrison C. Ryker, Inc. J. G. Saltzman, Inc. Servicos Aerofotogrametricos Cruzeiro Do Sul, S. A., Rio de Janeiro, Brazil Otto Fennel Soehne, Kassel, Germany Wallace Aerial Surveys Wallace & Tiernan Products, Inc. Williamson Company of Canada, Ltd. Henry Wild Surveying Instruments Supply Co. Ltd., Heerbrugg, Switzerland. Zeiss Aerotopograph, München, Germany</p>
---	---

INDEX TO ADVERTISERS

Abrams Aerial Survey Corp..	Cover 3-355
ABC's of Photogrammetry	482
Aero Service Corporation	Cover 2
American Paulin System	338
Bausch & Lomb Optical Co.	346
Chicago Aerial Survey Co.	429
Eastman Kodak Co.	Cover 4
Fairchild Aerial Surveys, Inc.	340
Fairchild Camera & Instrument Corp.	390
Gordon Enterprises	344
Harrison C. Ryker, Inc.	348
Jack Ammann Photogrammetric Engineers	496
Philip B. Kail Associates	382
Henry Wild Surveying Instruments Supply Co. of America, Inc.	355
Wallace & Tiernan Products, Inc.	343
Williamson Co. of Canada, Ltd..	347
Zeiss—Aerotopograph.	337