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fluid and this reviewer is seriously considering using the book for a such a course.

Although Carafoli assumes no prior knowledge of compressible fluid flow, the mathematical nature of the book and its lack of emphasis upon the physical development and meaning would make a first reading based upon texts such as Shapiro or Liepmann and Roshko seem desirable before reading this book. However, the mature reader who enjoys detailed mathematical development and can furnish his own physical interpretation will find this book a very thorough introduction.

Due to the richness of material on certain topics, others are inadequately treated. The material on transonic flow and unsteady flow is too brief and incomplete while hypersonic flow is left out entirely. On the other hand, as one would expect, since Carafoli has for many years been one of the world's authorities on wing theory, the chapters on wing theory in both subsonic and supersonic flow are more complete and contain material which has apparently been the product of his own school and published in the Roumanian or Russian literature. As a sourcebook of information on these publications which have been made behind the Iron Curtain, this book is invaluable. Neither does any other book in English give so complete a treatment of the finite wing in supersonic flow, in particular, conical flow as applied to wings. This takes up about 200 pages of the book.

After an introductory chapter on vector analysis and thermodynamics the author derives the fundamental equations of flow in all their variations in the next chapter. Chapter 3 considers the usual material on steady one-dimensional flow, Chapter 4 is devoted to the subsonic two- and three-dimensional flows, Chapter 5 is a brief introduction to linearized supersonic flow, Chapter 6 considers the more exact type of solution (Prandtl-Meyer expansion, Busemann's second-order approximation, theory of characteristics), seven is the exact treatment of supersonic flow around bodies of revolution while eight and nine are devoted to that thorough treatment of wings of finite span referred to above.

This book can be warmly recommended as an excellent single volume treatise on those aspects of compressible inviscid flow which have become classical by now, in particular for its complete treatment of wing theory.

Books Received

AN INTRODUCTION TO COMBINATORIAL ANALYSIS. By John Riordan. 244 pp. John Wiley & Sons, Inc., New York, 1958. \$8.50.

MATHEMATICS FOR THE LAYMAN. By T. H. Ward Hill. 343 pp. Philosophical Library, Inc., New York, 1958. \$4.75.

PHYSICS AND MATHEMATICS, Vol. 2. Series I of Progress in Nuclear Energy. Edited by D. J. Hughes, J. E. Sanders, J. Horowitz. 375 pp. Pergamon Press, London & New York, 1958. \$14.00.

MATHEMATICAL TABLES AND FORMULAE (6th Revised Edition). By F. J. Camm. 144 pp. Philosophical Library, Inc., New York, 1958. \$2.75.

PHYSICS FOR ENGINEERS AND SCIENTISTS. By Richard G. Fowler and Donald I. Meyer. 546 pp. Allyn and Bacon, Inc., Boston, Mass., 1958. \$8.00.

TECHNOLOGY OF INSTRUMENTATION. By Eric B. Pearson. 202 pp. D. Van Nostrand Co., Inc., Princeton, N. J., 1958. \$4.75.

CIRCUIT ANALYSIS OF TRANSMISSION LINES. By John L. Stewart. 186 pp. John Wiley & Sons, Inc., New York, 1958. \$5.50.

NUCLEAR INSTRUMENTATION II. Vol. 45 of Handbuch der Physik. Edited by S. Flügge and E. Creutz. 544 pp. Springer-Verlag, Berlin, Germany, 1958. DM 128.00 (subscription price DM 102.40).

STRUCTURE AND EVOLUTION OF THE STARS. By Martin Schwarzschild. 296 pp. Princeton U. Press, Princeton, N. J., 1958. \$6.00.

INTERNATIONAL SCIENTIFIC RADIO UNION: Proceedings of 12th General Assembly (Boulder, Colo., Aug.-Sept. 1957). Vol. 11, Part 5, Commission V on Radioastronomy. 148 pp. URSI, Brussels, Belgium, 1958. Paperbound \$4.00.

FRONTIERS IN SCIENCE: A Survey. Edited by Edward Hutchings, Jr. 362 pp. Basic Books, Inc., New York, 1958. \$6.00.

EXPERIMENTS IN PHYSICAL SCIENCE. By Allen D. Weaver and James F. Glenn. 196 pp. Wm. C. Brown Co., Dubuque, Iowa, 1958. Paperbound \$3.00.

MISSILE CONTRACTS GUIDE. Edited by Vincent F. Callahan, Jr. 179 pp. Washington Missile Contracts Reports, 1420 New York Ave., N. W., Washington 5, D. C., 1958. Paperbound \$15.00.

FOUNDATIONS OF INFORMATION THEORY. By Amiel Feinstein. 137 pp. McGraw-Hill Book Co., Inc., New York, 1958. \$6.50.

ESP AND PERSONALITY PATTERNS. By Gertrude Raffel Schmeidler and R. A. McConnell. 136 pp. Yale U. Press, New Haven, Conn., 1958. \$4.00.

NUCLEAR QUADRUPOLE RESONANCE SPECTROSCOPY. Supplement 1 of the Solid State Physics, Advances in Research and Application. By T. P. Das and E. L. Hahn. 223 pp. Academic Press Inc., New York, 1958. \$7.00.

PRINCIPLES OF GEOCHEMISTRY (2nd Edition). By Brian Mason. 310 pp. John Wiley & Sons, Inc., New York, 1958. \$8.50.

MAN AND HIS PHYSICAL WORLD (3rd Revised Edition). By Dwight E. Gray and John W. Coutts. 672 pp. D. Van Nostrand Co., Inc., Princeton, N. J., 1958. \$6.50.

A HISTORY OF TECHNOLOGY. Vol. 4, The Industrial Revolution, 1750-1850. Edited by C. Singer, E. J. Holmyard, A. R. Hall, T. I. Williams. 728 pp. Oxford U. Press, New York, 1958. \$26.90.

LECTURES ON ORDINARY DIFFERENTIAL EQUATIONS. By Witold Hurewicz. 122 pp. The Technology Press of MIT and John Wiley & Sons, Inc., New York, 1958. \$5.00.

THERMODYNAMICS OF FLUID FLOW AND APPLICATION TO PROPULSION ENGINES. Vol. 1 of Aircraft and Missile Propulsion. By M. J. Zucrow. 538 pp. John Wiley & Sons, Inc., New York, 1958. \$11.50.

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