example of ingenuity that can be brought to bear in the analysis of energy systems.

Archie A. Harms is a professor of physics and engineering physics at McMaster University. He obtained his PhD in nuclear engineering at the University of Washington on a Ford Foundation Fellowship in 1969 and joined McMaster University thereafter.

Prior to his graduate studies, Professor Harms was engaged in computer simulation of hydroelectric power systems for a consulting engineering firm. His present research/teaching interests are in the general area of nuclear energy systems analysis. He has published and lectured widely on his research in Europe (East and West) and in North America, has served as a consultant to the U.N. International Atomic Energy Agency on several occasions, and was visiting scholar at the International Institute for Applied Systems Analysis in Austria.

Isotopes and Radiation in Research on Soil-Plant Relationships

Editor International Atomic Energy Agency, Vienna

Publisher Unipub, New York (1979)

Pages 660

Price $76.50

Reviewer Alexander Van Hook

This volume comprises the proceedings of an international symposium held in Columbo in December 1978 that was organized by the International Atomic Energy Agency and the United Nations Food and Agriculture Organization. The 45 papers contained in the volume (26 in English and the rest in French) were presented to approximately 70 attendees. Topical sessions included those on fertilizer use and efficiency (10 papers, mainly on ^{15}N studies of the nitrogen cycle), water relationships and ion movement (8 papers), organic residues in soil management (5 papers), micronutrients and nutrient availability (5 and 7 papers, respectively, mainly on studies of trace element uptake and utilization using radiotracer techniques), techniques and analytical methods (6 papers), and flooded (2 papers), and upland rice (2 papers). The larger sessions began with review papers giving a brief overview of the particular field. These are brief introductions, not comprehensive reviews, but are useful to a nonspecialist such as the present reviewer. The rest of the papers are short descriptions of specific applications of stable or radiotracer techniques to agricultural problems. As such, the volume should find its principal rest in the libraries of agricultural experiment stations. Wider circulation is unlikely, not only because of the specialized topical nature, but also because of the outrageous price.

W. Alexander Van Hook is professor of physical chemistry at the University of Tennessee–Knoxville. His research interests have focused mainly on the effect of isotopic substitution on the physicochemical properties of liquids and solutions.

Gravitation, Quanta and the Universe

(Proceedings of the Einstein Centenary Symposium held in Ahmedabad, India)

Editors A. R. Prasanna, J. V. Narlikar, and C. V. Vishveshwara

Publisher John Wiley & Sons, Inc., Somerset, New Jersey (1980)

Pages 326

Price $34.95

Reviewer Paul Zweifel

In 1979 a symposium was held at the Physical Research Laboratory at Ahmedabad, India, to celebrate the hundredth anniversary of the birth of Albert Einstein. The symposium, sponsored by the Indian Association for General Relativity and Gravitation, was attended by over 200 participants, some 15 from abroad.

To quote the Editorial Preface: "The symposium reflected the true spirit of Einstein's own concept of the unity of nature by bringing together scholars in different aspects of physics like relativity, astrophysics, field theory and foundations of quantum mechanics and statistical mechanics."

The proceedings are divided into four basic parts: Foundations and the Mathematical and Observational Aspects of Relativity; Cosmology and Astrophysics; Quantized Fields, Gauge Theories, and Foundations of Quantum Mechanics; Statistical Physics and Photoelectric Effect. In all, 22 papers are published in these different fields along with the discussion following the paper. There are a few general review-type papers such as "Einstein and the Unity of Nature" by V. V. Narlikar, "Cosmology in the Post-Einstein Era" by J. V. Narlikar, and talks on "Supergravity" by M. F. Sohnius, "Gauge Theories" by G. Rajasekaran, and the "Foundations of Quantum Mechanics" by V. Singh. But the majority of the papers are quite technical, representing recent research results with some connection to Einstein's work (come to think of it, it would be hard to think of an area of physics in which such a connection did *not* exist).

Because of the technical nature of the material, I would guess that few readers of this journal would be terribly interested in this book. However, those who would like to delve into the Einsteinian foundations of the latest developments in physics might find the book interesting.

Paul F. Zweifel is a University Distinguished Professor at Virginia Tech, where he is director of the Laboratory for Transport Theory and Mathematical Physics. His research interests include many areas of mathematical physics such as transport theory, the Boltzmann equation, and foundations of quantum mechanics. In 1972 he won the E. O. Lawrence medal.