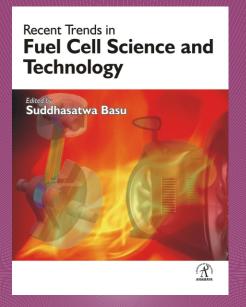
Recent Trends in Fuel Cell Science and Technology

Edited by **Suddhasatwa Basu**

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81-88342-59-9/© 2007/Hardback/7.25" × 9.5"/xii + 376 pp./Rs. 1400.00

Co-published, Sold and Distributed Worldwide (Excluding India) by Springer Science+Business Media



This book containing state-of-the-art knowledge contributed by world experts in different areas of fuel cell (FC) technology provides sufficient information so that new researchers from similar areas and readers working in FC technology would be able to solve the problems of industry needs.

The main topics covered in the most logical sequence are electro-analytical techniques in fuel cell research and development; polymer electrolyte membrane fuel cell (PEMFC); gas diffusion layer in proton exchange membrane (PEM) cells; water problem in PEMFC; micro fuel cells; direct alcohol and borohydride alkaline fuel cells; phosphoric acid fuel cell (PAFC); carbonate fuel cells; coal derived carbon in fuel cells; solid oxide fuel cells (SOFC) along with the materials for SOFC; fuel cell power-conditioning systems; and future directions and challenges of fuel cell science and technology.

Graduate and postgraduate students, researchers and all those working in similar areas will find this book to be of immense use.

Introduction to Fuel Cells

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Electro-analytical Techniques in Fuel Cell Research and Development

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Polymer Electrolyte Membrane Fuel Cell

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Fundamentals of Gas Diffusion Layers in PEM Fuel Cells

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Water Problem in PEMFC

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Micro Fuel Cells

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Direct Alcohol and Borohydride Alkaline Fuel Cells

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Phosphoric Acid Fuel Cell Technology

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Carbonate Fuel Cell: Principles and Applications

Hossein Ghezel-Ayagh, Mohammad Farooque and Hansraj C. Maru FuelCell Energy, Inc., 3 Great Pasture Road, Danbury, CT 06813 USA

Direct Conversion of Coal Derived Carbon in Fuel/Cells

John F. Cooper

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Solid Oxide Fuel Cells: Principles, Designs and State-of-the-Art in Industries

Roberto Bove

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Materials for Solid Oxide Fuel Cells

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Fuel Cell Power-Conditioning Systems

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Future Directions of Fuel Cell Science and Technology

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