NUGLEAR SCIENCE AND ENGINEERING®

VOLUME 104, NUMBER 1, JANUARY 1990 CONTENTS

TECHNICAL PAPERS

Spatial Homogenization Methods

1	A Split-Matrix Method for the Numerical Solution of Two-Phase Flow Equations	Peter Romstedt
10	Fast Three-Dimensional Core Model for Digital Con- trol in Boiling Water Reactors	O. Lupas, D. Beraha
26	Optimized Two-Dimensional S _n Transport (BISTRO)	G. Palmiotti, J. M. Rieunier, C. Gho, M. Salvatores
34	Thermal Disadvantage Factor: An Efficient Calculation	K. MS. Abdullah, S. K. Loyalka
40	Energy Dependence of Neutron Self-Shielding Factors in an Isolated Resonance	Maria Do Carmo Lopes, Jorge Molina Avila
46	Iron and Cadmium Capture Gamma-Ray Photofission Measurements	T. G. Williamson, G. P. Lamaze, D. M. Gilliam, C. M. Eisenhauer
53	Measurement of Prompt Neutron Decay Constant and Large Subcriticality by the Feynman- α Method	Tsuyoshi Misawa, Seiji Shiroya, Keiji Kanda
66	Feasibility and Incentives for Burnup Credit in Spent- Fuel Transport Casks	Thomas L. Sanders, R. Michael Westfall
78	Global Optimization and Sensitivity Analysis	Dan G. Cacuci
	CORRIGENDUM	
89	Boundary Condition Perturbation Theory for Use in	F. Rahnema

Publisher's Note: In an effort to minimize page charges, the American Nuclear Society will reduce the page charge to \$145 per composed page for authors who submit their manuscript on diskette. Complete instructions for submittal of papers on diskette are available from the *Nuclear Science and Engineering* editorial office or from ANS head-quarters.