



# CALL FOR PAPERS

ADVANCES IN NUCLEAR FUEL MANAGEMENT III  
HILTON OCEANFRONT RESORT  
HILTON HEAD ISLAND, SOUTH CAROLINA, USA  
OCTOBER 5 – 8, 2003



*Theme: To address the breadth of front-end nuclear fuel management activities, within the context of reactor physics and fuel cycle economics. Topics range from methods development and verification to design and implementation of new in-core fuel products and strategies.*

## Conference Chairs

### *Honorary*

Paul Turinsky  
NCSU

### *General*

Dave Kropaczek  
Global Nuclear Fuel

### *Technical*

Youssef Shatilla

Bojan Petrovic

Westinghouse

### *Publications*

Atul Karve  
Global Nuclear Fuel

### *Finance*

Chad Boyer  
Progress Energy

### *Arrangements*

Bill Russell  
Global Nuclear Fuel

### *Registration*

Mourad Aissa  
Progress Energy

### *Publicity*

Sandy Blackburn  
Global Nuclear Fuel

## ANS Sponsoring Divisions

Reactor Physics and Fuel Cycle and Waste Management

## ANS Local Chapter Host

Eastern Carolinas Section

## International Co-Sponsors

ENS, AESJ, KNS, CNS, SNM, OECD/NEA

## Technical Session Topics

- Innovative Core Loading Strategies and Methods
- Advanced Burnable Poison and Lattice Designs
- Addressing Practical Design Constraints On Fuel Management
  - Utilities Experience in Reload Design and Licensing
  - Very Long Life Core Design and Straight-Burn Cycles
    - Extended Fuel Cycle and Economics Analysis
      - On-Power Refueling Fuel Management
      - Nodal and Lattice Physics Methods
- Developing and Benchmarking of Cross-Section Libraries for LWR Fuel
  - Whole Core Transport Calculations
- Automated and Interactive Fuel Management Design and Optimization Tools
  - Best Estimate Analysis Tools for Improving Fuel Cycle Performance
  - Validation of Core Analysis Tools for Fuel Management
  - Model Comparisons Against Measured Power Reactor Data
- Fuel Temperature Feedback Modeling for Steady-State and Transients
  - Advances in Reactor Stability Analysis
  - Generation-III Fuel Cycle Design Concepts
  - Generation-IV Fuel Cycle Design Concepts
    - MOX Utilization in Reactors
    - Reactor-Based Plutonium Disposition
  - Fuel and Core Design Based on Thorium Cycles
- Management, Design and Operational Issues of Advanced Reactor Fuels
  - Research and Isotope Reactors Fuel Management
  - Core Design and Reactor Training Simulators
- Experiences and Advances In On-Line Core Monitoring

## Panel Discussion Topics

- Adequacy of Nuclear Design Methods for Current Generation Core Designs
  - Contrasting Fuel Management Strategies World Wide

## Deadlines

Electronic Submission of Reduced Length Paper

**March 15, 2003**

Author Notification of Acceptance

**May 1, 2003**

Final Paper Submission (Full Length)

**July 1, 2003**

## Reduced Length Paper Instructions

- Describe work that is NEW, SIGNIFICANT, and RELEVANT to the nuclear industry
- Use around 1,000 words, including Figures & Tables
- Electronic Submission in Adobe Acrobat (PDF) or MS-Word Format
- Additional details at the conference Web Site:  
<http://meetingsandconferences.com/anfm2003/>

For more information please contact Dr. Bojan Petrovic, Westinghouse Electric Company  
1344 Beulah Road, Pittsburgh, PA 15235 Phone: (412) 256-1295 Fax: (412) 256-2444  
E-mail: [PetrovB@westinghouse.com](mailto:PetrovB@westinghouse.com)