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New York U Old Dominion U

Princeton U

Think Tank, Inc.

Purdue U

UC Davis

UC Irvine

U Colorado

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U Washington U Wisconsin

U Illinois

UCLA

UCSD

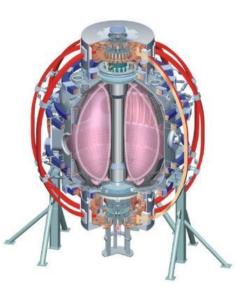
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NSTX Program Update

J. Menard, S. Kaye

NSTX Team Meeting B318, PPPL September 8, 2009





Culham Sci Ctr U St. Andrews York U Chubu U Fukui U Hiroshima U Hyogo U Kyoto U Kyushu U Kyushu Tokai U NIFS Niigata U **U** Tokyo JAEA Hebrew U loffe Inst **RRC Kurchatov Inst** TRINITI **KBSI** KAIST POSTECH ASIPP ENEA, Frascati CEA, Cadarache **IPP**, Jülich **IPP, Garching** ASCR, Czech Rep **U** Quebec

NSTX Program Update Topics

- Laboratory collaboration solicitation
- ReNeW report completed
- Upcoming meetings
- New NSTX website being tested



ReNeW report has been completed

- Posted on the ReNeW web site:
 - http://burningplasma.org/renew.html
 - https://burningplasma.org/forum/index.php?

+ ReNeW			
Forum	Topics	Replies	Last Post Info
Final Report	14	0	Jul 13 2009, 11:38 AM In: <u>Table of Contents</u> By: <u>Emily Hooks</u>
DRAFT Thrusts and Chits (only)	21	1	Jun 19 2009, 07:00 PM In: Complete list of Chits for The By: Emily Hooks
General Interest Topics (all Themes) Subforums: Documents of general interest to ReNeW	17	0	Jul 14 2009, 04:19 PM In: <u>ReNeW Report Chapters in Final</u> By: <u>Hutch Neilson</u>
Achieving and Understanding the Burning Plasma State (Theme 1) Subforums: ReNew BP chapter, and Chit summary, Extending Confinement Panel, Alpha Particle Effects Panel, Creating a Self-Heated Plasma Panel, Controlling and Sustaining a Self-Heated Plasma Panel, Mitigating Transient Events in a Self-Heated Plasma Panel, Diagnosing a Self-Heated Plasma Panel	17	0	Jun 8 2009, 12:03 PM In: <u>Theme I Chit Summary</u> By: <u>Emily Hooks</u>
Creating Predictable High-Performance Steady-State Plasmas (Theme 2) Subforums: ReNew Performance chapter, and Chit summary, Measurement panel, Integration panel, Validated predictive modeling panel, Control panel, Off-normal events panel, Auxiliary systems panel, Magnets panel	40	0	Jul 29 2009, 10:29 AM In: Latest version of Chapter By: Emily Hooks
Taming the Plasma Material Interface (Theme 3) Subforums: ReNew Interface chapter, and Chit summary	7	0	Jun 8 2009, 12:06 PM In: <u>Theme III Chit Summary</u> By: <u>Emily Hooks</u>
Harnessing Fusion Power (Theme 4) Subforums: ReNeW Power chapter, and Chit summary	3	0	In: 8 2009, 02:07 PM In: Theme IV Chit Summary By: Emily Hooks
Optimizing the Magnetic Configuration (Theme 5) Subforums: ReNew Configuration chapter, and Chit summary, Stellarator, ST, RFP, CT, MAG Central, Cross-Configuration, Theme 5 Calendar of Events	50	29	Jul 15 2009, 10:26 AM In: <u>Theme Chapter</u> By: <u>Emily Hooks</u>
ReNew Calendar of Events			Redirected Hits: 94
IPB Testing Area Feel free to test the operation of this Bulletin Board.	2	0	Oct 17 2008, 10:53 AM In: Welcome to the Testing Area fo By: Jim Dekock



Collaboration Solicitation for National Labs

- PAC teleconference reviewed program letter on July 20, 2009
- Program letter, and "Record of Discussion" to include with proposal are at: – http://nstx.pppl.gov/DragNDrop/Program_PAC/Program_Letters/
- Information for submitting proposals covering FY2010-12 is located at:
 - http://www.sc.doe.gov/grants/LAB09_29.html
 - Deadline for letter of intent: September 8, 2009 (TODAY!)
 - Records of discussion due to Jon/Masa by COB on Friday, October 2, 2009
 - Deadline for formal proposals: Thursday, 8:00pm EST, October 8, 2009
 - Scientific/Technical Program Contacts:
 - Nirmol Podder, Program Manager
 - Phone: 301-903-9536
 - Fax: 301-903-4716
 - E-Mail: Nirmol.Podder@science.doe.gov
 - or
 - Stephen Eckstrand, Program Manager
 - Phone: 301-903-5546
 - Fax: 301-903-4716
 - E-Mail: Steve.Eckstrand@science.doe.gov
 - Communications related to the formal proposal should use: "Program Announcement LAB09-29" in the subject line.

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Records of discussion due to Jon/Masa by COB Friday October 2, 2009

- High priority research areas in letter intro (partial list):
 - Understanding the impact and operation of the LLD
 - H-mode pedestal structure, SOL transport, divertor power exhaust
 - Utilization of the upgraded HHFW system
 - Supporting R&D for long-pulse pumping, power-handling, and control capabilities needed for the proposed NSTX Upgrade

Research contacts for Records of Discussion:

- 1. Macroscopic Plasma Physics:
- 2. Multi-Scale Physics (Transport):
- 3. Plasma Boundary Interfaces:
- 4. Waves and Energetic Particles:
- 5. Start-up/Ramp-up w/o Solenoid:
- 6. Physics Integration:

Stefan Gerhardt (sgerhardt@pppl.gov) Stan Kaye (skaye@pppl.gov) Bob Kaita (rkaita@pppl.gov) Gary Taylor (gtaylor@pppl.gov) Mike Bell (mbell@pppl.gov) Jon Menard (jmenard@pppl.gov)

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Upcoming meetings / events

- MAST Results Review/Research Forum: September 14-15 – Contact Joanne Savino for remote participation information
- NSTX Results Review:

September 15-16

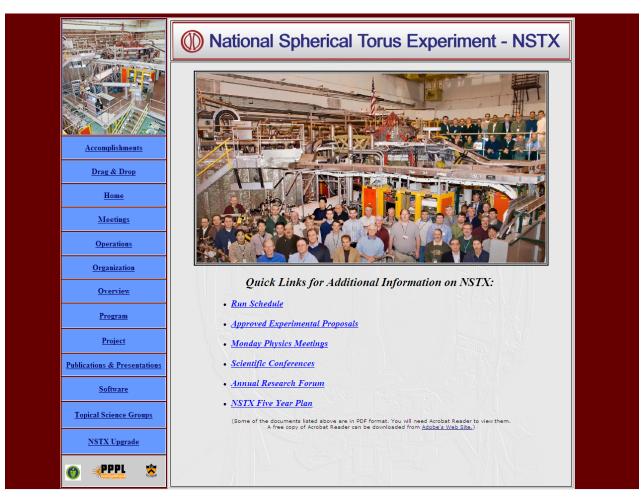
• NSTX Run Assessment:

. September 17

- A few others...
 - Fusion-Fission Research Workshop
 - September 30 October 2, Gaithersburg, MD
 - http://web.mit.edu/fusion-fission/
 - 12th International Workshop on "H-mode Physics and Transport Barriers"
 - September 30 October 2, 2009 at PPPL
 - http://www.pppl.gov/conferences/2009/Hmode3dayworkshop/
 - ITPA Transport & Confinement/Pedestal
 - October 5-7, 2009 at PPPL
 - http://itpa09.pppl.gov/
 - ITPA Pedestal & Edge Physics Topical Group Meeting
 - October 6-8, 2009 at PPPL
 - http://itpa09.pppl.gov/
- NSTX Research Forum dates TBD: likely week of Nov. 16 or Dec. 14
- NSTX PAC-27 working on dates likely in Feb. 2010

New NSTX web-site undergoing beta testing

- Solicited comments from TSG leaders → several helpful suggestions
- Please send your comments to: jsavino@pppl.gov and jmenard@pppl.gov



http://nstx.pppl.gov/nstxweb_2009/index.html