

PRINCETON PLASMA

PHYSICS LABORATORY

**MONDAY, DECEMBER 12, 2011** 

WEEKLY

## At PPPL This week

#### WEDNESDAY, DECEMBER 14

#### GFDL Events and Seminars 12 p.m. - 1 p.m. ◆ GFDL Smagorinsky Seminar Room

The Leading, Interdecadal Eigenmode of the Amoc in a Hierarchy of Ocean and Climate Models

Alexey Fedorov (Yale University) www.gfdl.noaa.gov/events (Gov't, Univ. or 2 other forms of I.D. needed)

PPPL Colloquium 4:15 p.m. ◆ MBG Auditorium

Web 3.0 Emerging

James Hendler (Rensselaer Polytechnic Institute) CLICK HERE FOR ABSTRACT

#### THURSDAY, DECEMBER 15

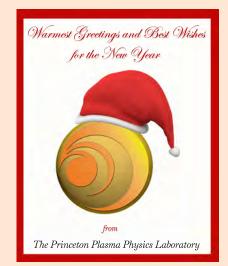
GFDL Events and Seminars 2 p.m. - 3 p.m. ♦ GFDL Smagorinsky Seminar Room

Madden-Julian Oscillation: Some Modeling, Theory, & New Observations

Adam Sobel (Columbia)

#### FRIDAY, DECEMBER 16

DIII-D Science Meeting 1 p.m. - 2:30 p.m. + B-233



## <u>Guest Corner</u>

## Science on Saturday Kicks Off in January



By Andrew Zwicker - Head, Science Education Program

Since 1984, PPPL has hosted a winter lecture series for students and the general public. Originally called the "World of Science Seminars," what started as four lectures with 150 people has exploded into nine lectures with more than 350 people each lecture. Last year, more than 3,000 people attended what is now called "Science on Saturday," and more than 500 people came out for the last lecture by IBM Fellow David Ferrucci titled "How Watson Could Play Jeopardy." Our own Congressman, Rush Holt, introduced Dr. Ferrucci to the audience and I had the pleasure of introducing the only member of Congress who beat Watson in a round of Jeopardy to the scientist who helped create it. In fact, every year we set an attendance record over the previous year and this year we expect the same. So what has happened over the past 28 years? Why is Science on Saturday so popular?

One likely answer is that we have little competition in an area full of people who are naturally curious about the world around them. Sure there are a variety of lectures on campus and elsewhere that are open to the public, but our entire lecture series is geared toward high school students, open to all, and our lecturers are

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**PPPL's Science**on-Saturday (SOS) team is gearing up for the 2012 lectures, which will begin January 7 with "Out of Africa: **Genetics and Human** Migrations" by Gyan Bhanot, a professor in the Department of Molecular Biology, **Biochemistry and Physics at Rutgers** University in Piscataway. (See the full schedule on page 3). The SOS team includes. from left: (seated) Deedee **Ortiz and Ronnie** Hatcher; (standing) Carl Scimeca, Kathleen Lukazik, and John DeLooper.



## Science on Saturday

#### continued from page 1

some of the most dynamic and respected leaders in their fields. Besides Watson, last year's topics included evolution, microscopy, neuroscience, robotics, computer science, and, yes, fusion.

Another possibility, at least for the students in the audience, is that they not only learn about cutting-edge research, but they can also start to think about becoming a scientist just like the person on the stage. We have plenty of anecdotal stories of students nurturing their love of science on cold Saturday mornings at the Lab and majoring in a scientific field in college before heading to graduate school. Lastly, and perhaps most importantly, with so much of science and science funding under attack and being questioned, giving our community an opportunity to learn about the latest discoveries, the latest innovations, and the latest inventions is one of the most important things we can do as an institution.

None of this could happen without a remarkable group of volunteers — beginning nearly three decades ago with a few PPPL researchers — and continuing this year with a speaker selection committee of Ronnie Hatcher and Deedee Ortiz, and supported by John DeLooper, Kathleen Lukazik, Carl Scimeca and our custodial staff. The first lecture will be on January 7, 2012. Hope to see you there. The full schedule of lectures is located on page 3.

## Setting the SOS Slate

ome Labor Day each year, PPPL's Ronnie Hatcher begins culling eight or nine names from a list of scientists conducting cutting-edge research. Hatcher — along with other members of a Lab team — then develops a diverse collection of scientific talks for Science on Saturday (SOS), the Lab's annual wintertime series. Throughout the year, the SOS team identifies potential candidates, in particular, those with experience delivering colloquia in specialized scientific areas. The team peruses scientific journals and magazines for current topics and "in-the-news" researchers, surveys university web sites for candidates in specific areas of interest, asks for recommendations from past speakers, and accepts and evaluates recommendations from PPPL employees and SOS attendees.

"Sometimes we look for experts on topics that are current, but we've also had a few lectures that are historical in nature, and we place high value on candidates who show potential for being able to present at the appropriate level, which is high school," said Hatcher, who has served as a volunteer with the program since 2000. The team invites speakers in the fall, and by late November the schedule for the upcoming year is generally solid. "This year we were done by Halloween," said Hatcher, an engineer at PPPL.

He often introduces the speakers and conducts mini-interviews with the speakers prior to the talk. "Many times the after-lecture Q&A is dominated by adults. I ask questions before the talks to let the audience know a bit more about the speakers, not just about their work. I think it helps students to relate."

Organizing the series is challenging, especially keeping the lectures fresh and with wide-ranging subjects, Hatcher said, but the payoff is large in terms of inspiring students and increasing the scientific literacy of the public at all levels and ages. And, for Hatcher, there's an added bonus. "It's fun," he said. "When I was in high school I attended lectures similar to these, but they weren't open to the public. The lecture program was only for seniors selected via an application process. Our program at PPPL is far superior. We get 'kids' from 8 to 80!" by Patti Wieser

## Welcome! PPPL New Hires



Svetlana Drapkin Accountant



Ilya Yevgenyevich Dodin **Research Physicist** 



**Helene Murphy** Accounting Clerk

## Science on Saturday Series Begins January 7

The 2012 Science-on-Saturday (SOS) wintertime lecture series at PPPL will begin January 7th with "Out of Africa: Genetics and Human Migrations," by Professor Gyan Bhanot from Rutgers University. The SOS talks will be featured on several January through March Saturdays at 9:30 a.m. in the Lab's MBG Auditorium. The free lectures are geared toward high school students, but open to everyone. Students, teachers, parents, community members, and PPPL'ers and their families are welcome to attend any or all of them. The series is co-organized by PPPL's Ronnie Hatcher, Kathleen Lukazik, Deedee Ortiz, John DeLooper and Andrew Zwicker. Below is the schedule for 2012.

January 7	<b>Out of Africa: Genetics and Human Migrations</b> by Gyan Bhanot, Dept. of Molecular Biology, Biochemistry & Physics, Rutgers Univ., Piscataway, N			
January 14	<b>The Dark Side of the Universe</b> by David Goldberg, Department of Physics, Drexel University, Philadelphia			
January 21	<b>Visualizing the Atomic World</b> by Udo Schwarz, Yale University, New Haven, Conn.			
January 28	<b>To be announced</b> by Nergis Mavalvala, Dept. of Physics, Massachussetts Institue of Technology, Cambridge, Mass.			
February 4	<b>Cooperation and Conflict in The Natural World</b> by Suzanne Alonzo, Dept. of Ecology & Evolutionary Biology, Yale University, New Haven, Conn.			
February 11	<b>All Tied Up In Knots</b> by Lisa Traynor, Department of Mathematics, Bryn Mawr University, Bryn Mawr, Pa.			
February 18	<b>To be announced</b> by Adam Cohen, Harvard University, Cambridge, Mass.			
February 25	25 No Lecture — DOE's NJ High School Science Bowl®			
March 3	Why Are Computers So Stupid and What Can Be Done About It? by Ernest Davis, Computer Science Department, New York University, New York, N.Y.			
March 10	<b>A Hundred Years of Superconductivity</b> by Michael Norman, Materials Science Division, Argonne National Laboratory, Argonne, Ill.			

## **Calling All Astronaut Candidates From The National Labs!**

ith the end of the space shuttle program, NASA human spaceflight is now focused on utilization of the International Space Station. NASA astronauts have kept a permanent presence on the orbiting outpost since November 2000. With station assembly complete, the ISS continues to expand our knowledge in science and human space physiology.

NASA now seeks a new class of astronauts to further ISS science and operations. Additionally, NASA astronauts will be involved in the design of the Orion spacecraft which will enable the U.S. to send astronaut crews beyond low earth orbit. NASA is also developing a new heavy lift rocket which will lift the Orion and other space hardware that will be required for astronauts to operate and explore deeper into space. Applications are being accepted until January 27, 2012. Details for the application process and requirements can be found here.

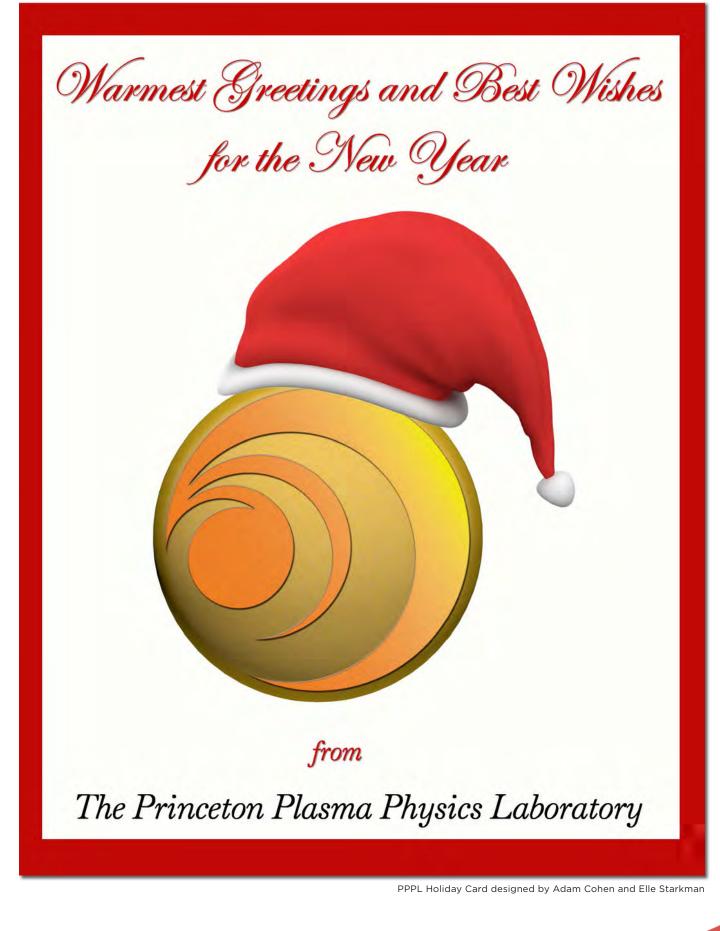
To apply, applicants need to submit their application at USAjobs.gov. Job announcement number: JS12A0001.

Here are several links for information regarding NASA's recruiting effort for the next astronaut class.

http://www.nasa.gov/home/hqnews/2011/nov/HQ\_11-385\_Astro\_Apps.html

http://www.nasa.gov/astronauts/flynasa.html

http://www.nasa.gov/astronauts/astronaut\_videos.html http://www.youtube.com/watch?v=hLblEzuX8Zo



### From the PPPL Site Protection Division

## **Emergency Information** Notifications

PPPL uses the Princeton Telephone and E-Mail Notification System (PTENS) for emergency information and notifications.

The Laboratory work schedule may differ from the University's schedule, and those differences will be clearly noted in all Laboratory announcements.

With the severe weather season approaching, all PPPL staff are reminded to validate and/or update your personal contact information for PTENS.

All PPPL Employees can do this through the University Human Resources Self-Service website: www. princeton.edu/selfservice.

PPPL Subcontractors and Visitors who possess a valid PPPL ID Badge and wish to receive emergency information or notices should supply contact information to Dolores Stevenson (dstevens@pppl.gov) as soon as possible.

Updates to the regular work schedule may also be found by calling the Laboratory Telephone Hotline at 609-243-2034 or by checking the current Lab Status on the PPPL Home Page (www.pppl.gov) under the link "Lab Status."

# <u>COLLOQUIUM</u>

#### WEB 3.0 EMERGING

JAMES HENDLER (Rensselaer Polytechnic Institute)

#### Wednesday, December 14

4:15 p.m. (Coffee/Tea at 4 p.m.) M.B. Gottlieb Auditorium, Lyman Spitzer Building



# 2 **Brock PPPL CAFÉ MENU** TUESDAY, DEC. 13 WEDNESDAY, DEC. 14 THURSDAY, DEC. 15

#### MONDAY, DEC. 12

	MONDAY, DEC. 12	<b>IUESDAY,</b> DEC. 13	WEDNESDAY, DEC. 14	IMURSDAY, DEC. 15	FRIDAY, DEC. 16		
COMMAND PERFORMANCE CHEF'S FEATURE	States and a states of the sta						
COMMAI CHEF'S F	Chicken Marsala	Create Your Own Chicken Burrito	Baked Macaroni and Cheese	Shepherd's Pie	Roasted Pork Loin, Mash Potato, & Veg.		
EARLY RISER	Bacon, Cheddar and Mushroom Omelet	Pork Roll, Cheddar and Potato Quesadilla	Egg, Cheese and Sausage Bagel Melt	Pigs in a Blanket	Ham Benedict		
COUNTRY KETTLE	Vegetarian Lentil	Cream Of Broccoli	Turkey Chili	Cream of Squash	Pasta E Fagioli		
GRILLE SPECIAL	Bacon Double Cheeseburger	Two Chili Dogs With Fries	Open Faced Hot Roast Beef and Provolone	XXL Turkey Burger Quesadilla	Southwestern Chicken Club Sandwich		
DELI SPECIAL	Chicken Salad and Bacon Hoagie	Ranchero Roast Beef Roll-Up	Super BLT	Louisiana Shrimp Salad on a Multigrain Roll	Tex-Mex Turkey Wrap		
PANINI	Ham, Turkey, Provolone	3 Cheese and Tomato	Corned Beef Rueben	BBQ Chicken and Cheddar	Grilled Chicken Parmesan		

MENU SUBJECT TO CHANGE WITHOUT NOTICE

CLICK HERE FOR A PRINTABLE WEEKLY MENU

EDIDAY DEC 16

Editor: Patti Wieser 
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**PPPL WEEKLY** is published by the **PPPL Office of Communications** on Mondays throughout the year except for holidays.

Deadline for calendar item submissions is noon on Thursday. Other stories should be submitted no later than noon on Wednesday.

PPPL WEEKLY is archived on the web at: http://www.pppl.gov/ppplweekly.cfm