

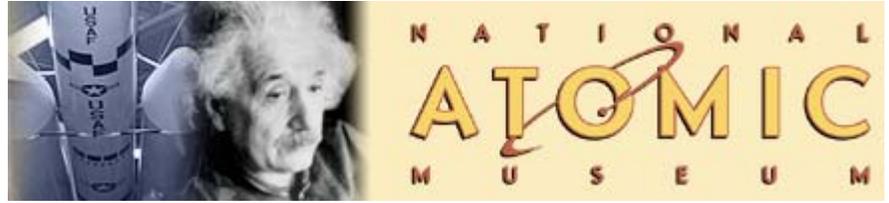
The Hispanic Physicist

The Newsletter of the National Society of Hispanic Physicists

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Hispanic Physicists Honored at the National Atomic Museum



A recent exhibit at the National Atomic Museum (soon to be renamed the National Museum of Nuclear Science and History) examined the contributions of Hispanic leaders in Science and Technology. The museum, located in Albuquerque, New Mexico, included in the exhibit Dr. Ellen Ochoa, who became the first Hispanic female astronaut and is responsible for investigations in optical object recognition; Dr. Tamara Ulibarri, a principal member of Sandia National Laboratories' technical staff where she leads projects on materials aging; and Dr. Richard G. Castro, a world expert in the plasma spraying of beryllium alloys from the Materials Technology Group at Los Alamos National Laboratory, where he established one of the only facilities in the world capable of performing beryllium plasma spray research. This exhibit also saluted many other future Hispanic leaders in Science and Technology, from several universities and high schools.



Dr. Ellen Ochoa

Dr. Richard G. Castro



Dr. Tamara Ulibarri



Ainissa Ramirez Named Among World's Top Young Innovators by MIT's Technology Review Magazine

Ainissa Ramirez, one Yale's newest faculty, has been named to the 2003 list of the world's 100 Top Young Innovators: The Technology Review 100 (TR100). The TR100, chosen by the editors of Technology Review, MIT's Magazine of Innovation, and a panel of judges, consists of 100 individuals under age 35 whose innovative work in technology has a profound impact on today's world.



Ainissa Ramirez, a materials scientist at Yale, has developed novel materials for microelectromechanical systems by exploring how materials thinner than a human hair behave mechanically. She discovered what Technology Review called a "holy grail" of metallurgy: a universal solder that can bond metals to ceramics, glass, diamonds, and particularly the oxide materials used in semiconductor fabrication. Researchers have been seeking this kind of compound for decades because existing solders have failed in electronic and optical devices. "I think I've brought excitement to unsexy materials like solder," said Ramirez. For more information see <http://www.eng.yale.edu/news/MIT-100-2003.htm>

Research Profile: René Sánchez and David Loiza

A full-controlled criticality of the element neptunium was achieved in late September at Los Alamos National Laboratory's Technical Area 18. René Sánchez and David Loiza, both of Advanced Nuclear Technology, were primarily responsible for the successful criticality. Loiza and Sanchez credit the hard work and tenacity of the whole NIS-6 team involved in the neptunium criticality experiment with its ultimate success. The work was done to support the DOE's Criticality Safety Program and the National Nuclear Security Administration's Nonproliferation Program and Emergency Response Program. Los Alamos enhances global security by ensuring the safety and reliability of the U.S. nuclear stockpile, developing technologies to reduce threats from weapons of mass destruction, and solving problems related to energy, environment, infrastructure, health and national security concerns.



The lower half of the neptunium critical assembly is flanked by David Loiza, left, and Rene Sanchez

News you can use

NAFEO/MSI/NASA-Ames Research Academy-Faculty Program



The National Association for Equal Opportunity in Higher Education (NAFEO) in collaboration with Minority Serving Institutions (MSI) and the National Aeronautics and Space Administration (NASA), are pleased to offer an opportunity for faculty at Historically Black Colleges and Universities (HBCU), Hispanic Serving Institutions (HSI) or Tribal Colleges and Universities to participate in a Research Academy at NASA-Ames Research Center, a world-class, shared use, educational facility located in the Silicon Valley Region. The Research Academy will help faculty prepare their students for careers in the research fields of interest, and help faculty foster their own scientific and professional development. The research fields of interest are: Astrobiology, Biotechnology, Nanotechnology, and Information Technology. Interested faculty can apply for either the ten-week program during summer 2004 or the ten-month program (September 2004 - June 2005). Both programs provide a stipend. The application deadline is February 1, 2004, and the deadline for all materials is March 1, 2004. For more information and an application, please contact Dr. Keith Jackson, Director, NAFEO/MSI/NASA-Ames Research Academy, NASA-Ames Research Center, Building 19, Room 2015, Moffett Field, CA 94035-1000, 650-604-4227, or visit the website at <http://nafeoamesacademy.org>. To apply online go to <http://www.nafeoamesacademy.org/facultyapp.htm>

VII International Meeting of Physics Education to be held in Trinidad – Flores – Uruguay on Sept. 14 – 18

The topics to be addressed in the meeting are: current trends in Physics education, teaching strategies and learning, theoretical physics, experimental equipment and laboratory, research and development from different Learning theories, Physics history, and Physics role in teaching. There is going to be poster presentations, talks, courses, panels, and round tables. More information can be found at

<http://www.fisica.edu.uy/apfu/encuentro/indexencuentro.htm>

American Association of Physics Teachers- Job Fair: Jan.04

The American Association of Physics Teachers will host a Job Fair to be held in conjunction with the 128th National Meeting in Miami. The Job Fair is for Physicists, Astronomers, Physics



Educators, and College Students/Grads. The Job Fair will not only be for educational careers, but for all facets of physics. Interviews on-site, career seminars, job listings and resumes. Employers can submit at no charge, unlimited job announcements for display at the meeting. For a minimal charge employers can conduct interviews on-site, or participate for no charge by registering for the full meeting. Member and Nonmember employers may participate.

For more information/to submit jobs, visit: <http://www.aapt.org/CareerCenter/JobFair/jobfairOpts.cfm>

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