

Around the World

From *Les Actualités du LAL*: KEK and France Strengthen Particle and Accelerator Physics Collaboration



LAL director Guy Wormser and Fumihiko Takasaki, director of the Institute of Particle and Nuclear Studies at KEK, discuss potential areas of collaboration between the two laboratories.

At the occasion of the annual Japan-France directorate meeting, a KEK delegation visited French laboratories on 13 and 14 November to further promote research collaborations between France and Japan. KEK Director General Atsuto Suzuki, together with Fumihiko Takasaki and Osamu Shimomura, directors of the two KEK Institutes and Takahiko Kondo, Junji Haba and Koichiro Nishikawa met the first day the management of CEA/DSM and CNRS/ IN2P3, the two French funding agencies for particle physics. The day after, they visited two IN2P3 laboratories in Orsay, IPNO (Orsay Institute of Nuclear Physics) and LAL (Linear Accelerator Laboratory). Here, visitors and hosts discussed areas of collaboration between LAL and KEK in detail. The French/KEK common programmes are endorsed by the newly created France-Japan Particle Physics International Associated Laboratory. The new laboratory's "French office" was opened at KEK on 1 November. Read more...

Feature Story

From *Jefferson Lab News*: Reaching New Heights in Accelerator Technology



ILC cavities (on top) and the five-cell cavities of Jefferson Lab's own CEBAF accelerator (bottom).

The International Linear Collider (ILC) is designed to collide high-energy electrons with high-energy positrons (electrons' antimatter counterparts). Once built, the ILC will serve as a powerful tool for scientists to address many of the most compelling questions of the 21st century - regarding the fundamental nature of matter, energy, space and time, dark matter, dark energy, and extra dimensions.

A cadre of scientists and accelerator professionals have come together to plan and design the ILC as a truly international scientific project. Known as the <u>ILC Global Design Effort</u> (GDE), the collaboration is tapping Jefferson Lab's more than two decades of experience building, processing and installing superconducting radiofrequency (SRF) technology in some of the world's largest accelerators. Read more...

-- Kandice Carter, Courtesy of Jefferson Lab News

In the News

Director's Corner

Parameters for the Linear Collider – An Update

As we explore the possible trade-offs to make the ILC Reference Design as cost effective as possible, we have needed sharper definitions for some of the stated parameters, making us consider alternatives. With this in mind, the International Linear Collider Steering Committee (ILCSC) reconvened their parameters

subcommittee who wrote the original parameters report that dictates the scientific requirements and hence the design for the ILC. In August, I wrote about this ILCSC action, gave the motivation and charge to the committee, and



Rolf-Dieter Heuer, chair of the ILCSC Linear Collider Parameters Subcommittee

anticipated that a parameters update would be the result. The parameters subcommittee has now issued its update. This <u>revised document</u> is very timely for us as we take the final decisions before freezing the Reference Design Report. <u>Read more...</u>

-- Barry Barish

Director's Corner Archive

Image of the Week

- View photos of the visit
- <u>Read the related article in Japanese</u> on KEK website

Calendar

Upcoming meetings, conferences, workshops

ILC Perfume Mountain Meeting-What is the role of China and the International Linear Collider (ILC), a large scientific international project 5-7 December 2006 Beijing, China

Third symposium on large TPC for low

<u>energy rare event detection</u> 11-12 December 2006 Carré des Sciences, Paris, France

International Workshop on Silicon

Sensors for High Energy Physics and Astrophysics

14-16 December 2006 Ewha Womans University, Seoul, Korea

European LC WS Meeting

8-9 January 2007 Daresbury Laboratory, UK

MAC meeting 10-12 January 2007 Daresbury Laboratory, UK

<u>USPAS</u>

Texas A&M University 15-26 January 2007

ILC Detector Test Beam Workshop

Fermilab, Batavia, Illinois 17-19 January 2007

View Full Calendar...

GDE Meetings Calendar

China Pursues Major Role in Particle Physics

"...More important, Chinese particle physicists are poised to make a major contribution to one of the grandest collaborations of all, a proposed giant accelerator called the International Linear Collider, or I.L.C. ..." <u>Read more...</u>

From Interactions.org 5 December 2006 **TRIUMF Announces Next Director** "...the TRIUMF Board of Management unanimously approved the appointment of Dr. Nigel Lockyer as the next Director of TRIUMF..." <u>Read more...</u>

From *The Daily Herald* 4 December 2006 Fermilab works to gain residents' support

Proposed 20-mile tunnel would make U.S. a leader in high-energy physics research.

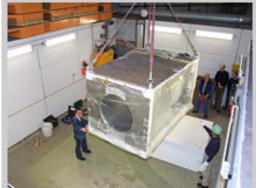
Read more...

From *Le Journal de CNRS* December 2006 **A laboratory that defies the laws** of physics

"Discoveries with particles do not cease to baffle the theories of traditional physics. Among the persons in charge are the physicists of LAL, who rival in ingenuity tracking, measuring and understanding the world of infinitely small particles, where the future of physics is profiled..." <u>Read more (in French)...</u>

From *wired.com* 30 November 2006

Physics Frontier Goes Euro "...This complicated mix of international scientific goals and national ambition is now helping drive particle physics' next multibilliondollar proposal, a cross-border collaboration dubbed the International Linear Collider, or ILC. ..." Read more...



After an impressive trip into the stratosphere, a self-sustained 1.2 Tesla magnet has now also made longitudinal headway: last week, it arrived at DESY from KEK. <u>Read</u>

more about the magnet or watch it arrive in the test hall.

Announcements

ILC-Related Preprints

ILC-Asia-Notes 2006-07 4 December 2006 "Change of Periphery Shape Characteristics of SUS Nozzle Holes for HPR at KEK and Nomura"

physics/0611299

30 Nov 2006 A proposed DAQ system for a calorimeter at the International Linear Collider

hep-ph/0611374

29 Nov 2006 The Road Towards the ILC: Higgs, Top/QCD, Loops

hep-ph/0611372

29 Nov 2006 Electroweak Precision Data and Gravitino Dark Matter

hep-ph/0611368

29 Nov 2006 Leptogenesis and Gravitino Dark Matter