

# Feature Story

# A close shave

A team from the

Max Planck Institute for Physics in Munich just found scientific evidence for the old saying that less is more. By shaving off a piece of scintillating tile, they achieved test results that were considerably Blue light emitted better than tests with a tile that was complete. The trick: stick a silicon



by a piece of plastic scintillator. Image: Frank Simon

photomultiplier into the shaved-off groove, rather than just on the outside of the tile. "After quite a few iterations, we came up with a shape for the plastic tile that works extremely well. It also now includes a SiPM that is embedded into the tile, which is important for a realistic calorimeter since then the individual cells can be placed edge on edge, without any gaps between them," explains the team leader Frank Simon. Frank Simon is also an active blogger on <u>Quantum Diaries</u>, and one of his most recent entries features an explanation of tiles, fibres and photomultipliers and how they came up with the idea of reshaping the tile. Read more...

-- Barbara Warmbein / Frank Simon

# Calendar

### Upcoming meetings, conferences, workshops

CALICE Week at UT Arlington Arlington, Texas, US 10-12 March 2010

International Linear Collider Workshop 2010 (LCWS10 and ILC10) Institute of High Energy Physics, Beijing, China 26-30 March 2010

XIV International Conference On Calorimetry In High Energy Physics (CALOR2010) IHEP, Beijing, China 10-14 May 2010

The 1st International Particle Accelerator Conference (IPAC'10)

# Around the World

Quantum-beam symposium communicating the significance of the research



The conference room for the quantumbeam symposium packed with about 100 attendees. Image: Nobuko Kobayashi

The word quantum beam, or Ryo-shi beam in Japanese, defined as highquality beams produced with accelerated leptons or hadrons applying quantum mechanics, isn't really an academic word, but rather a key word for advanced technology. But it is gradually getting its recognition in Japan as a technology that will achieve breakthroughs in many fields, such as new materials developments, nanofabrication, or medical applications. Read more...

-- Rika Takahashi

## In the News

From The Beacon-news 8 March 2010 From energy to intensity Read more...

From The Associated Press 8 March 2010 Geneva Atom Smasher Seeks Dark Matter Discoveries Read more ....

From CERN 4 March 2010 **CERN** to celebrate International Women's day Read more...

From The Chronicle 4 March 2010 Canada's New Budget Holds Small Gains for Research Read more ...

From Brookhaven National Laboratory 4 March 2010

Exotic Antimatter Detected at **Relativistic Heavy Ion Collider** (RHIC)

#### **Director's Corner**

FALC meets in Mumbai



magnet test facility. Image: CERN

The most recent meeting of the Funding Agencies for Large Colliders (FALC) was held at the Tata Institute for Fundamental Research (TIFR) in Mumbai, India from 17 to 18 January. FALC reviewed the major high-energy programmes worldwide during this meeting, as well as hearing reports on the status and plans for the International Linear Collider, the only project presently considered to be "global" and therefore under the special purview of FALC. Highlights from the meeting also included a report from our host Atul Gurtu of TIFR on "Current HEP Activities in India."

Read more...

-- Barry Barish

**Director's Corner Archive** 

# BlogLine

8 March 2010 - Frank Simon Travel Madness - Reloaded

Read also Frank Simon's earlier post on calorimeters for the ILC in this week's Feature Story and don't miss part-II of Flip Tanedo's post on US LHC Blogs: "More Feynman Diagrams"

Follow all Quantum Diaries

# Announcements

# arXiv preprints

1003.1394 CALICE Report to the Calorimeter **R&D** Review Panel

1003.1333 Precision measurement of Higgs decay branching ratios to bottom Kyoto, Japan 23-28 May 2010

e Collaboration-wide Meetings

GDE Meetings calendar

View complete ILC calendar

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Read more...

From *Nature Blog* 4 March 2010 **Could radical surgery save UK physics funding agency?** <u>Read more...</u> quarks and gluons at the ILC

# <u>1001.4665</u>

Uniformity Studies of Scintillator Tiles directly coupled to SiPMs for Imaging Calorimetry