

Calendar

Tuesday, October 12

3:30 p.m. DIRECTOR'S COFFEE
BREAK - 2nd Flr X-Over
THERE WILL BE NO ACCELERATOR
PHYSICS AND TECHNOLOGY
SEMINAR TODAY

Wednesday, October 13

3:30 p.m. DIRECTOR'S COFFEE
BREAK - 2nd Flr X-Over
4:00 p.m. Fermilab Colloquium - 1 West
Speaker: J. Shaevitz, University of
California, Berkeley
Title: Nature's Nanomachines: The
Physics of Biomolecular Motors

Wilson Hall Cafe

Tuesday, October 12

Tomato Bisque
Pesto Marinated Chicken Breast \$4.75
Burgundy Beef Tips \$4.25
Baked Fish Creole over Rice \$3.75
Grilled Chicken Caesar Wrap \$4.25
Pepperoni Lover's Calzones \$3.25
Rio Grande Taco Salads \$4.75

[Wilson Hall Cafe Menu](#)

[Chez Leon](#)

Weather



Partly Cloudy **64°/49°**

[Extended Forecast](#)

[Weather at Fermilab](#)

Current Security Status

[Secou Level 3](#)

Search

Fermilab and SLAC to Launch *symmetry* Magazine



A few members of the *symmetry* editorial team (left to right): Neil Calder (SLAC), Elizabeth Clements (FNAL), Mike Perricone (FNAL), David Harris (Fermilab and SLAC), and Judy Jackson (FNAL). Not pictured: Kurt Riesselmann (FNAL) ([Click on image for larger version.](#))

On October 28, employees at SLAC and Fermilab will receive the first issue of *symmetry* magazine, a joint publication of the two laboratories for the particle physics community. The new publication replaces Fermilab's *FERMINEWS* and SLAC's *Beam Line* with a monthly full-color magazine and a corresponding online version. This is the first time that two DOE national laboratories have joined forces to produce a periodical such as *symmetry*.

Over the past four months staff writers at Fermilab and SLAC have worked with a design company to produce the layout of the new magazine. Each issue will feature articles, commentaries, essays, profiles, reviews and outside perspectives on particle and astrophysics at Fermilab, SLAC and across the world. *symmetry* will explore the collaborative aspects of research through stories that focus on the

Director's Corner

Good Morning!

Last week the Nobel Prize in physics was awarded to David Gross, David Politzer, and Frank Wilczek "for the discovery of asymptotic freedom in the theory of the strong interaction." In



Mike Witherell

the early 1970s physicists were faced with the apparent paradox that the quarks inside the proton could behave like free particles when probed with high-energy scattering, but yet could never be found as isolated particles. The papers by Gross, Politzer, and Wilczek that led to the Nobel Prize explained how this could occur and led to quantum chromodynamics (QCD), the theory describing the interactions of quarks and gluons.

In 1973, it was not clear that these new ideas could ever be tested. One senior colleague of David Gross at Princeton told him, "David, this is great stuff.. But it will never be confirmed experimentally." The predicted effects were so small and difficult to measure that it took years of experimentation to find the effects that definitively proved the theory.

Today physicists use QCD to calculate backgrounds at the Tevatron and, with the techniques of lattice QCD, to calculate accurately the masses of particles and the couplings of quarks. By developing new theoretical ideas and doing more

Search the Fermilab Today Archive

Info

Fermilab Today is online at:

<http://www.fnal.gov/today/>

Send comments and suggestions to

today@fnal.gov

[Fermilab Today archive](#)

[Fermilab Today PDF Version](#)

[Fermilab Result of the Week archive](#)

[Fermilab Safety Tip of the Week archive](#)

[Linear Collider News archive](#)

[Fermilab Today classifieds](#)

[Subscribe/Unsubscribe to Fermilab Today](#)

science as well as people, policy and culture.

Hard copies of the magazine will be delivered to all Fermilab mail stations. Additional copies will be available at the Office of Public Affairs, WH1E. About 11,000 copies will be sent to people outside the two laboratories. To receive an email notification every time a new online version is available, please register your email address at www.symmetrymagazine.org. A new "button" in the bottom right corner of the Fermilab homepage will take you to the *symmetry* Web site as well.

Computing Division Holds Annual Safety Picnic



More than 200 people attended the Computing Division picnic last week: (Left to Right) Marc Mengel, David Mengel, Vicky White and Laura Mengel (Click on image for larger version.)

More than 200 members of the Computing Division held a picnic at Kuhn Barn on Friday, October 8, to celebrate an outstanding year of working safely in the division. CD employees have worked 1,321,562 person hours without a lost-time injury. It has been nearly three years since the last serious accident. "We have reached a record number of accident-free work days by integrating safety into all that we do," said Vicky White, CD head. "I am very proud of what we have achieved.

intricate experiments, we are still learning new things about QCD, the theory of gluons and quarks.

Announcements

Power Outage News

Tevatron Tunnel, Service Buildings, Sumps, and Computer Links

October 16 – Power will be off to all of Tevatron for 10 hours starting at 7 AM on Saturday. This outage is for Feeder 45 work.

Kautz Road Substation

October 18 – The power will be off to all of the Main Injector service buildings and tunnel, including MI-12a, MI-12b, MI-13, and MI-65, for one half hour starting at 7 AM.

1900 Productions Presents

"Copenhagen" at Elmhurst College

1900 Productions presents "Copenhagen" by Michael Frayn at Elmhurst College, running October 8 through November 14. Performances are Friday and Saturday at 8:00 p.m., Sunday at 2:00 p.m. at the Accelerator Art Space, 200 W. Park Ave. Elmhurst, IL. Tickets purchased by Fermilab employees are \$10.00 for all performances (regular price is \$20.00). Reservations can be made by calling the 1900 Productions box office at 630-251-7525.

[more information](#)

Fermilab Singers

Come join the Fermilab Singers! The group rehearses in the auditorium at noon on Wednesdays. You bring the voice...they provide the music. If you have any questions, call or email Anne Heavey (x8039, aheavey@fnal.gov).

Fermilab Barnstormers Meeting

At the same time, this celebration gives us an opportunity to remind ourselves to redouble our efforts to make sure that everyone goes home from work safe and sound at the end of every day."

In the News

From *The Register*, October 8, 2004

£147.5m boost for British particle accelerators

By Robin Lettice

Science and innovation minister Lord Sainsbury today announced £147.5m funding for two particle accelerators. They will be used to aid research in areas including medical and computer research, and clean energy technology.

The two devices - ISIS and Diamond Light source - produce high-energy light beams and particles which allow scientists to study the structure of different materials in detail.

[Read more](#)

Wednesday

The Fermilab Barnstormers, Model Aeronautic Club, will have its next meeting on Wednesday, Oct. 13 at 5:30 p.m., at the Frelø Flying Field. Meetings are held on the second Wednesday of each month. The club will meet in the Users Center if it rains. New members welcome! Current members fly control line, R/C gas and electric planes. The club also has members who fly helicopters! Try out the trainer club plane, bring something to fly, or come and watch.

[more information](#)