

## Not for the faint of heart

Winter in northern Vermont is not for wimps. This past winter, the first one in Irasburg for my husband and me, was a record breaker: frigid, snowy, and endless. On March 7, with the vernal equinox in sight, 32 inches of snow fell in six hours. Even on snowshoes, we sank to our waists on a trip to the post office. After that, it snowed every day, or so it seemed, all through March—five inches on the first official day of spring—and into April. Even the natives, stalwart weather stoics, began to grumble. Spring would never come.

It has been an equally tough season for basic science, including particle physics. As the budget battles raged in Washington and one continuing resolution followed another, national laboratory directors wondered if the final appropriations would let them keep the lab doors open, the particle accelerators running, and the staff employed. It was hard to imagine, in these times, why any young American with a grain of sense would ever choose a career in particle physics.

Then, just as it seemed as if the long, bleak budget season would never end, came a surprise. Fermilab's CDF experiment announced a bump in the data that might—might—jolt particle physics right out of the Standard Model and into a whole new view of the laws of physics. If it holds up, CDF's bump might be the herald of a brand new force of nature.

All at once we remembered why a person with a grain of sense—and a passion for discovering nature's secrets—would choose a life in particle physics. Yes, the budget process grinds on, yes the beloved Tevatron will soon shut down, but that bump got us through the winter. Even if it goes away, as bumps often do, it reminded us of the point of it all, of the thrill of the unexpected and the extraordinary possibilities of scientific discovery.

Like winter in Vermont, particle physics is not for the faint of heart, but we recognize anew that it's worth it. The weather forecast calls

for possible snow in Irasburg tomorrow, but the daffodil shoots are up, and I don't think they plan on going back.

Judy Jackson

Editor-in-chief



Symmetry
PO Box 500
MS 206
Batavia Illinois 60510
USA
630 840 3351 telephone
630 840 8780 fax
mail@symmetrymagazine.org

For subscription services go to www.symmetrymagazine.org

symmetry (ISSN 1931-8367) is published six times per year by Fermi National Accelerator Laboratory and SLAC National Accelerator Laboratory, funded by the US Department of Energy Office of Science.

(c) 2011 symmetry All rights reserved

Editor-in-Chief Judy Jackson 802 754 9968

Deputy Editor Glennda Chui

Managing Editor Kurt Riesselmann

Senior Editor Tona Kunz

Staff Writers Elizabeth Clements Calla Cofield Lori Ann White Rhianna Wisniewski

Interns Cynthia Horwitz Sara Reardon Publishers Katie Yurkewicz, FNAL Farnaz Khadem, SLAC

Contributing Editors Roberta Antolini, LNGS Peter Barratt, STFC Romeo Bassoli, INFN Stefano Bianco, LNF Kandice Carter, JLab Lynn Yarris, LBNL James Gillies, CERN Silvia Giromini, LNF Youhei Morita, KEK Tim Meyer, TRIUMF Perrine Royole-Degieux, IN2P3 Yuri Ryabov, IHEP Protvino Yves Sacquin, CEA-Saclay Kendra Snyder, BNL Boris Starchenko, JINR Maury Tigner, LEPP Ute Wilhelmsen, DESY Tongzhou Xu, IHEP Beijing Vanessa Mexner, NIKHEF

Print Design and Production Sandbox Studio Chicago, Illinois

Art Director Michael Branigan

Designers/Illustrators Aaron Grant Brad Nagle Andrea Stember

Web Design and Production Xeno Media Oakbrook Terrace, Illinois

Web Architect Kevin Munday

Web Design Karen Acklin Alex Tarasiewicz

Web Programmer Mike Acklin

Photographic Services Fermilab Visual Media Services

## symmetry