2014 SORCE Science Meeting -- Program Speakers
(as of Nov. 14, 2013)
Speakers are listed alphabetically within each session.

Session 1.  Role of the Sun in Climate Change during the SORCE Mission

William Ball, Imperial College London, UK
SSI and Stratospheric Ozone: A new assessment of the relationship using Bayesian Inference

Cassandra Bolduc, Université de Montréal, Canada
Modelling Stratospheric Ozone Variability with the MOnteCARlo SSI Model (MOCASSIM)

Robert Cahalan, NASA GSFC, Greenbelt, Maryland
After 11 Years with SORCE – What’s New? What’s Next?

Josefino Comiso, NASA GSFC, Greenbelt, Maryland
Sea Ice Changes in Recent Decades

Joanna Haigh, Imperial College London, UK
Sun-Climate Solar Cycle Effects and Climate Change – A Review

Aimee Merkel, Laboratory for Atmospheric and Space Physics (LASP), University of Colorado, Boulder
Further Evidence of Solar Cycle Variability in Middle Atmospheric Ozone and the Importance of Incorporating SSI in Atmospheric Modeling

Martin Mlynczak, NASA Langley Research Center, Hampton, Virginia
Influence of Solar Variability on the Structure, Composition, and Energy Balance of the Atmosphere from 2002 to 2014

Anna Shapiro, Physikalisch-Meteorologisches Observatorium Davos, World Radiation Center (PMOD/WRC), Switzerland
The Stratospheric Response to a Discrepancy of the SSI Data

Tamas Varnai, NASA GSFC, Greenbelt, Maryland; and University of Maryland, Baltimore County
Advances in Understanding 3D Interactions between Sunlight and the Atmosphere during the SORCE Mission

Session 2.  SSI Measurements

David Bolsée, Belgium Institute for Space Aeronomy, Brussels
Accurate Determination of the TOA Solar Spectral NIR Irradiance Using a Primary Standard Source and Bouguer-Langley Technique

Gaël Cessateur, PMOD/WRC, Switzerland
THE PREMOS/PICARD Radiometer: An overview after 3 years of observations

Matthew DeLand, Science Systems and Applications, Inc. (SSAI), Lanham, Maryland
Solar Cycle 24 Variability Observed by Aura OMI

Jerry Harder, LASP, University of Colorado, Boulder
Observations of Solar Variability in the 240-2400 nm Range using SORCE SIM
Session 3. Decadal and Longer Sun-Climate Variations

Jürg Beer, Eawag: Swiss Federal Institute for Environmental Science and Technology, Dubendorf, Switzerland
Solar Variations and Climate Change: The view from ice cores

Roger-Maurice Bonnet, International Space Science Institute (ISSI), Bern, Switzerland
Review and Discussion of Past and Future Climates, of their Astronomical, Solar, and Anthropogenic Forcing. Strategies for Future Space and Modeling Research

Gerald North, Texas A&M University, College Station
Paleoclimatic Analysis of Solar Cycle Imprint on Greenland Surface Temperatures

Alexander Ruzmaiken, NASA Jet Propulsion Laboratory (JPL), California Institute of Technology, Pasadena
Sun-Climate Variations on Centennial Time Scales

Sami Solanki, Max Planck Institute for Solar System Research, Goettingen, Germany
Towards the Next Generation of Solar Irradiance Reconstruction Models

Guoyong Wen, NASA GSFC, Greenbelt, MD; GESTAR, Morgan State University, Baltimore, Maryland
Climate Responses to Spectral Solar Forcing in GISS GCMAM

Dong Wu, NASA GSFC, Greenbelt, Maryland
The s=0 Atmospheric Oscillations in 35-Year MERRA Zonal Wind and Temperature

Session 4. TSI Measurements and Composites

Jean-François Cossette, Université de Montreal, Canada
Cyclic Thermal Signature in a Global MHD Simulation of Solar Convection

Wolfgang Finsterle, PMOD/WRC, Switzerland
Of Straying Photons, Shiny Apertures, and an Inconstant Solar Constant – Advances in TSI Radiometry

Claus Fr hlich, PMOD/WRC, Switzerland
New and Improved Version of the VIRGO TSI and PMOD Composite
Session 5. **SSI Composites, Proxies, Models**

Serena Criscuoli, National Solar Observatory (NSO), Sacramento Peak, Sunspot, New Mexico
*Interpretation of SIM Measurements from Analysis of 3D MHD Simulations*

Thierry Dudok de Wit, LPC2E / Centre National de la Recherche Scientifique (CNRS) & University of Orléans, France
*Multi-Wavelength Solar Radio Observations and their use as Solar Proxies for Upper Atmospheric Modeling*

Juan Fontenla, NorthWest Research Associates, Boulder, Colorado
*The UV SSI of the Sun Compared to Cooler Stars, Similarities and Differences*

Margit Haberreiter, PMOD/WRC, Switzerland
*SOLID – a European Project towards a Comprehensive Solar Irradiance Data Exploitation*

Matthieu Kretzschmar, LPC2E, CNRS University of Orléans, France
*Assessment of Solar Irradiance Datasets for the SOLID Project*

Natalie Krivova, Max-Planck-Institut für Sonnensystemforschung, Katlenburg-Lindau, Germany
*Modelling Solar Irradiance with SATIRE*

Micha Schöll, LPC2E, CNRS University of Orléans, France
*First Steps Towards a Homogeneous Solar Spectral Irradiance Data Set: Selection, merging and quality assessment*

Alexander Shapiro, PMOD/WRC, Switzerland
*How to Constrain the Spectral Profile of the Solar Irradiance Variability?*

Martin Snow, LASP, University of Colorado, Boulder
*The Magnesium II Index: 35 Years and Counting*

Rich Stolarski, Johns Hopkins University, Baltimore, Maryland
*The Impact of Solar Spectral Irradiance Variations on Stratospheric Composition: Theory and observations*

Ken Tapping, National Research Council, D.R.A.O., Penticton, BC, Canada
*The Continuing Deviation between the Sunspot Number and F10.7 Activity Indices*

Anatoliy Vuiets, LPC2E, CNRS University of Orléans, France
*What Can We Learn from SORCE about the Contribution of Different Magnetic Structures to the Solar Spectral Irradiance?*
Session 6. **Legacy of SORCE and Future Directions after SORCE**

Pål Brekke, Norwegian Space Centre, Oslo, Norway
*NORSAT-1: Total Solar Irradiance, Space Weather, and Ship Detection*

Peter Pilewskie, Dept. of Atmospheric and Oceanic Sciences and LASP, University of Colorado, Boulder
*TSIS Status*

Mark Rast, Dept. of Astrophysical and Planetary Sciences and LASP, University of Colorado, Boulder
*The Case for a Radiometric Imager, and How to Build One*

Gary Rottman, LASP, University of Colorado, Boulder
*The Historical Development of SORCE*

Brian Soden, Rosenstiel School for Marine and Atmospheric Science (RSMAS), University of Miami, Florida
*Climate Feedbacks*

Graeme Stephens, NASA Jet Propulsion Laboratory (JPL) and California Institute of Technology, Pasadena
*Future of Total Solar Irradiance Measurements*

Yukihiro Takahashi, Hokkaido University, Sapporo, Japan
*Micro-Satellite as an Alternative Vehicle*

**Poster Session**

Stéphane Beland, LASP, University of Colorado, Boulder
*SORCE SIM Data Version 19*

Gary Chapman, San Fernando Observatory, California State University, Northridge
*The Declining Strength of Recent Sunspot Cycles*

Angela Cookson, San Fernando Observatory, California State University, Northridge
*Using Ground-Based Ca II K Images as a Proxy for Shorter UV*

Thierry Dudok de Wit, LPC2E, CNRS University of Orléans, France
*How to Make Composites out of Multiple Observations*

Thierry Dudok de Wit, LPC2E, CNRS University of Orléans, France
*The Impulse Response of the Solar Spectral Irradiance: What does it tell us about the solar spectral variability?*

Wolfgang Finsterle, PMOD/WRC
*CLARA – A Compact and Light-Weight Absolute Radiometer*

Claus Fröhlich, PMOD/WRC, Switzerland
*Understanding Long-term Changes of the VIRGO Radiometer and Sunphotometer in Space*

Shashi K. Gupta, Science Systems and Applications Inc. (SSAI), Lanham, Maryland
*Projection of SORCE Total Solar Irradiance Measurements 5-10 Days Forward for Near Real-Time Applications*

Doug Lindholm, LASP, University of Colorado, Boulder
*SORCE Solar Irradiance Data Products and the LASP Interactive Solar Irradiance Data Center (LISIRD)*
Courtney Peck, Dept. of Physics and LASP, University of Colorado, Boulder
*The Role of the Solar Center-to-Limb Variation in Deduced Photometric Trends*

Erik Richardson, LASP, University of Colorado, Boulder
*A Compact Solar Spectral Irradiance Monitor for Future Small Satellite and CubeSat Science Opportunities*

Nicola Scafetta, ACRIM team
*Empirical Evidences for a Planetary Gravitational/Electromagnetic Modulation of Total Solar Irradiance Satellite Measurements*

Nicola Scafetta, ACRIM team
*Discussion on Climate Oscillations: CMIP5 general circulation models versus vs. a semi-empirical harmonic model based on astronomical cycles*

Martin Snow, LASP, University of Colorado, Boulder
*SORCE Undergraduate Research Program*