

Dear colleagues,

We are pleased to announce the following session at the 42nd COSPAR Scientific Assembly, Pasadena, California, July 14–22, 2018:

Session E2.1: “Formation, destabilization, and ejection of magnetic structures in solar and stellar coronae”

Magnetic structures ejected from the Sun and solar-like stars are typically associated with prominences, which may play critical roles in the initiation of coronal mass ejections (CMEs). In this two-part session, we focus on different aspects of prominences. In the first part, we consider issues regarding the formation and destabilization of prominences. For example, is mass loading important for CME initiation, or for pre-conditioning the CME? In the second part of the session, we focus on the role of the ejected prominence material, particularly its cool component, in the CME evolution: How does the environment of the corona through which the ejected material travels affect the kinematics and deformation of the CME? What is the nature of the energy balance? What is the role of the overlying and CME (flux rope) magnetic topology?

Thanks to the wealth of observational data from multiple viewpoints, over a wide range of wavelengths and heliocentric distances, as well as recent progress in simulations, many of these issues can now be addressed. The three half-day session invites observational studies, as well as simulations of how prominences, and CMEs erupt and interact with their environment in solar and stellar coronae, on a wide range of topics, including:

1. Filament formation and structure: channels, mass
2. Prominence/filament dynamics
3. Eruptions and CMEs
4. CMEs and stellar coronae

A complete description of the event referred to above and abstract submission instructions are available on the Assembly web page at: <http://www.cospar-assembly.org>.

The deadline for abstract submission is February 09, 2018.

Confirmed Invited Speakers: Alicia Aarnio (University of Colorado, USA), Sergio Dasso (IAFE, Argentina), Petr Heinzel (Astronomical Institute, Czech Republic), Manuel Luna (IAC, Spain), Duncan Mackay (University of St Andrew, UK), Alexander Nindos (University of Ioannina, Greece), Rachel Osten (STScI, USA), Nour-Eddine Raouafi (JHUAPL, USA), Tibor Toeroek (Predictive Science Inc, USA), Chun Xia (University of Leuven, Belgium)

MSO: Brigitte Schmieder (Observatoire de Paris, LESIA, France)

DO: Yuhong Fan (NCAR, USA)

SOC: Nicolas Labrosse (University of Glasgow, Scotland), Jun Lin (Yunnan Astronomical Observatory, China), Gaiete Hussain (ESO, Germany), P.F. Chen (Nanjing University, China), Angelos Vourlidas (JHUAPL, USA)