Manuela TEMMER

Institute of Physics, University of Graz
Universitätsplatz 5, 8010 Graz, Austria
http://physik.uni-graz.at/en/astrophysics/temmer/
manuela.temmer@uni-graz.at

PROFESSIONAL EXPERIENCE:

Since **10/2016 Associate Professor** of Astrophysics at the Institute of Physics of the University of Graz in Austria and lead of the Heliospheric Physics Research Group (http://swe.uni-graz.at).

02/2015 Habilitation (postdoctoral lecture qualification)

04-09/2014 Senior Research Fellow
Lockheed Martin Solar and Astrophysics Laboratory, Palo Alto, USA

04-09/2010 Post-Doc Scientist
Space Research Institute of the Austrian Academy of Sciences, Graz, Austria

2008-2010 Post-Doc Scientist
Institute of Physics, University of Graz, Austria

2007-2008 Post-Doc Scientist
Space Research Institute of the Austrian Academy of Sciences, Graz, Austria

2005-2007 Post-Doc Scientist
Hvar Observatory, Faculty of Geodesy, University of Zagreb, Croatia

2001-2004 PhD student and research assistant
Institute of Physics, University of Graz, Austria

PUBLICATIONS:

- 140 peer-reviewed scientific papers in international journals (23 as first author) and more than 100 articles and abstracts in conference proceedings
- h-index: 41 (NASA ADS, July 2019)

RESEARCH TOPICS:

- CMEs & solar flares (early CME acceleration phase and relation to energy release in flares, 3D CME geometry, CME propagation in IP space/background solar wind interaction/CME-CME interaction)
- Coronal holes and solar wind high speed streams
- Solar-Terrestrial coupling (Space Weather)
- Solar activity and cycle relation
- Global coronal wave phenomena (Moreton, EUV waves)
- Science Co-I Solar Orbiter/STIX (Spectrometer/Telescope for Imaging X-rays)

SCIENTIFIC ACHIEVEMENTS and AWARDS:

- 2019: Reserve candidate for the *Stanford University Distinguished Visiting Austrian Chair Professorship*
- 2014: *NASA Group Achievement Award to RHESSI Science and Data Analysis Team* (in recognition of sustained outstanding science achievements over a full 11-year cycle of solar activity)
- 2010: *Elise Richter fellowship (Career Development Programme for Women)* from the Austrian Science Fund
- 2008: *APART* (Austrian Programme for Advanced Research and Technology) fellowship from the Austrian Academy of Sciences
- 2005: *Erwin Schrödinger Scholarship* from the Austrian Science Fund

SCIENTIFIC PROJECTS as Principal Investigator:

- 2019-2020 ISSI Bern International Team lead on “Magnetic open flux and solar wind structuring of interplanetary space”
- 2017-2021 “Constraining CMEs and Shocks by Observations and Modelling throughout the inner heliosphere" (local PI; BELSPO)
- 2017-2019 “Solar wind evolution - assessment for multi-viewpoint instruments" (FFG-ASAP13)
- 2017-2019 “ESA-SSA Expert Service Group for Heliospheric Weather – P3” (ESA)
- 2016-2017 “Early Evolution of CMEs and associated dimming regions" (ÖAD/WTZ)
- 2015-2017 “ESA-SSA Expert Service Group for Heliospheric Weather – P2” (ESA)
- 2013-2016 “Quiet solar wind flow and interacting disturbances” (NAWI-Graz)
- 2012-2015 “eHEROES: Environment for Human Exploration and RObotic Experimentation in Space” (local PI; EU FP7-SPACE)
- 2011–2015 “CMEs – dynamic evolution in the heliosphere” (FWF)
- 2011–2012 “3D properties of coronal mass ejections” (FFG-ASAP7)
- 2008–2010 “Forces governing CMEs and forecasting of CME arrival times” (Austrian Academy of Sciences)
- 2005–2007 “On the feed-back relation between flares and CMEs” (FWF)

TEACHING at the UNIVERSITY of GRAZ:

- Supervision of Bachelor, Master and PhD students at the Institute of Physics
- Since 2002 Lectures/Seminars/Exercises/Laboratories on the subject of Solar- and Astrophysics on Master student’s level
  - Data Analyses of ground-based and space-borne instruments (remote/in-situ)
  - Physics of stellar atmospheres
  - MHD and solar-terrestrial modeling
  - Introduction to Solar Physics (Exercises)
  - Astronomical Laboratory 1+2
  - Instruments and Observational Techniques
  - Introduction to Planetology

COMMUNITY SERVICE:

- Editorial Board member for the international journal ‘Solar Physics’
- Topical Editor for ‘Annales Geophysicae’ (open access journal of EGU)
- EGU-ST Science Officer and Liaison Officer
- Co-Leader of the VarSITI Project ISEST (International Study of Earth-affecting Solar Transients) and MiniMax24, an initiative by SCOSTEP (duration: 2014-2018)
- National Coordinator for the International Space Weather Initiative (ISWI)

- National Contact for the International Space Environment Services (ISES)
- Contact of the *e-CALLISTO* radio-station AUSTRIA-UNIGRAZ
- Referee for international journals: Solar Physics, Astronomy and Astrophysics, Astrophysical Journal, Geophysical Research Letters, Journal of Geophysical Research, Advances in Space Research, Monthly Notices of the Royal Astronomical Society, New Astronomy

- SOC Member VarSITI Completion Symposium, June 10-14, 2019 in Bulgaria
- SOC Member 14th Solar Terrestrial Physics Symposium to be held in Toronto, Canada, during July 9-13, 2018
- SOC Member VarSITI Meetings in Hvar (2018), Korea (2017), Irkutsk (2017) and 1st VarSITI Workshop Bulgaria (2016)
- SOC Member ILWS 2016 (International Living with a Star Workshop) in Goa, January 25-29, 2016
- SOC Member ISEST Workshop (International Study of Earth-Affecting Solar Transients) México City, México, October 26 - 30, 2015
- SOC Member CSPM 2015 (Coimbra Solar Physics Meeting on Ground based Solar Observations in the Space Instrumentation Era) in Coimbra, October 5-9, 2015
- SOC Member UN/Japan Workshop for Space Weather in Fukuoka, March 2-6, 2015

ORGANIZATION of SCIENTIFIC WORKSHOPS and MEETINGS:

- Organizer of the „Österreichischer Weltraumwetterworkshop 2015“ at the Kanzelhöhe Observatory, held March 19-20, 2015
- Co-Organizer of the Kanzelhöhe Colloquium 2013
- Co-Organizer of the EU-FP7 project HESPE 2nd year meeting held at the University of Graz in 2012
- Organizer of the Scientific Workshop "On the solar eruptions of August 1-4, 2010“ held at the University of Graz in 2011
- Co-Organizer of the Jahrestagung der OEGAA (Society for Astronomy and Astrophysics in Austria) held at the Unversity of Graz in 2005
- Co-Organizer of International Summerschool at Kanzelhöhe Observatory 2003

RESEARCH COLLABORATIONS (international):

- Denmark Technical University, Denmark (Vennerstroem)
- EOS, Univ. of New Hampshire, Durham, NC, USA (Lugaz, Farrugia)
- Hvar Observatory, Univ. of Zagreb, Croatia (Vršnak, Brajša, Dumbovic)
- Institute for Astrophysics, University of Göttingen, Germany (Bothmer)
- Johns Hopkins University, Applied Physics Lab, MD, USA (Vourlidas)
- KU Leuven, Belgium (Poedts, Verbeke)
- Lockheed Martin Solar and Astrophysics Laboratory (Nitta, Aschwanden)
- NASA Goddard Space Flight Center, Greenbelt, MD, USA (Gopalswamy, Mays, Kay, Kuznetsova)
- Royal Observatory of Belgium, Brussels, Belgium (Magdalenic, Rodriguez)
- University of Kiel, Germany (Heber)
- University of Science and Technology, China (Guo)