

The Space Research Institute of the Austrian Academy of Sciences, Austria's leading non-university research and science institution, is offering a

PHD STUDENT POSITION (F/M)
(part time / 30h per week)

in modeling and prediction of 3D solar storm magnetic fields.

Solar storms or coronal mass ejections are the most important drivers of solar wind disturbances at Earth and other planets. A major unsolved problem concerns how their internal magnetic field configuration can be predicted in order to accurately forecast geomagnetic storms. To make progress we will further develop a new model and verify it with data from many space missions, including **Parker Solar Probe**, STEREO, MESSENGER, MAVEN, Venus Express, Wind, and DISCOVER.

A paper on first steps for the future project work is available here as open access:

<https://agupubs.onlinelibrary.wiley.com/doi/epdf/10.1002/2017SW001735>

We search for:

- graduates in **astro-, space-, or computational physics**. A master degree is mandatory, but candidates shortly before graduating are encouraged to apply.
- **strong English** skills, in particular scientific writing and giving presentations.
- **programming** skills: python (mandatory), experience in C++, Matlab, IDL or other scientific programming languages is of advantage.
- general experience with **numerical simulations and/or data processing**.
- persons with a **creative and self-initiated working style** interested in a space science career.

We offer:

- a **PhD student position for a period of 3 years** financed by the Austrian Science Fund (FWF) project P31521-N27 „Modeling the magnetic cores of solar storms“ starting 1 February 2019 (date is negotiable).
- the possibility to present results at **international conferences**.
- the opportunity to work on **cutting-edge research** relevant for new space missions such as Parker Solar Probe, BepiColombo, and Solar Orbiter.
- an annual gross salary of € **29.573,60** according to the salary scale of the Austrian Science Fund (FWF)

The Austrian Academy of Sciences values diversity and is committed to equality of opportunity.

Please send applications without notes on gender/age if possible, consisting of a cover letter, CV, a publication list and the PDFs of the bachelor and master theses to christian.moestl@oeaw.ac.at.

Contact the PI: **Mag. Dr. Christian Möstl**

PI homepage: <http://www.iwf.oeaw.ac.at/user-site/christian-moestl/>

github: <https://github.com/cmoestl>

twitter: <https://twitter.com/chrisoutofspace/>