

**Current position**

Project Leader “Theory and Modelling” at Institute of Energy and Climate Research – Plasma Physics (IEK-4), FZJ (since 2017)

**Previous position**

Research Scientist at Institute of Energy and Climate Research – Plasma Physics (IEK-4), FZJ (1998 - 2017)

**Scientific degree**

Dr. rer. nat. (PhD) in Plasma Physics, University Düsseldorf (1998)

**Awards, honors, memberships**

Price for the best PhD thesis, University Düsseldorf (1998)

Associate Editor Contributions to Plasma Physics (since 2019)

**Recent research topics**

Plasma Physics, Surface Physics, Computational Physics, Fluid Dynamics, Turbulence, Plasma Catalysis

**Publications (5 most important)**

- S. Togo, T. Takizuka, **D. Reiser**, M. Sakamoto, Y. Ogawa, et al., Characteristics of plasma flow profiles in a super-X-divertor-like configuration, *Nucl. Materials and Energy* 19, 149 (2019) [doi:10.1016/j.nme.2019.02.016](https://doi.org/10.1016/j.nme.2019.02.016)
- **D. Reiser**, **J. Romazanov**, **Ch. Linsmeier**, On the possibility of track length based Monte-Carlo algorithms for stationary drift-diffusion systems with sources and sinks, *Journal of Computational Physics* 377, 219 (2019) [doi:10.1016/j.jcp.2018.07.051](https://doi.org/10.1016/j.jcp.2018.07.051)
- **D. Reiser** and T. Eich, Drift-based scrape-off particle width in X-point geometry, *Nucl. Fusion*, 57, 046011 (2017), [doi:10.1088/1741-4326/AA5AB7](https://doi.org/10.1088/1741-4326/AA5AB7)
- O. Schmitz, M. Becoulet, P. Cahyna, T.E. Evans, ..., **D. Reiser**, et al., Three-dimensional modeling of plasma edge transport and divertor fluxes during application of resonant magnetic perturbations on ITER, *Nucl. Fusion* 56, 066008 (2016) [doi:10.1088/0029-5515/56/6/066008](https://doi.org/10.1088/0029-5515/56/6/066008)
- **D. Reiser**, N. Ohno, H. Tanaka, and L. Vela, A plasma source driven predator-prey like mechanism as a potential cause of spiraling intermittencies in linear plasma devices, *Phys. of Plasmas* 21, 032302 (2014) [doi:10.1063/1.4867492](https://doi.org/10.1063/1.4867492)