Dr. Carolin Klinger

Postdoctoral Researcher

carolin.klinger@noaa.gov

Personal Profile

Name: Carolin Klinger
Date of Birth: 13th October 1986

Place of Birth: Augsburg, Bavaria, Germany

Marital Status: single Nationality: German

Languages: German (native)

English (fluent) French (basic)

Education and Academic Qualification

Dr. rer. nat (Atmospheric Physics)

12/2015

Faculty of Physics, Ludwig-Maximilians-Universität München

Dissertation Title: "Effects of 3D Thermal Radiation on Cloud Development"

Supervisor: Prof. Dr. Bernhard Mayer Grade: 1.0 (magna cum laude)

Master of Science (Meteorology)

12/2011

Faculty of Physics, Ludwig-Maximilians-Universität München

Thesis Title: "Evaluation of ozone and selected climate parameters in

the chemistry-climate model EMAC"

Supervisor: Dr. Veronika Eyring, Prof. Dr. Bernhard Mayer

Grade: Very Good

Bachelor of Science (Physics Plus Meteorology)

07/2009

Faculty of Physics, Ludwig-Maximilians-Universität München

Thesis Title: "CO₂ Climate Effect and Reduction Potential of Alternative

Fuels in Shipping" (in German)

Supervisor: Dr. Veronika Eyring

Grade: Good

Work Experience

Postdoc 09/2016-present

NOAA, Earth System Research Laboratory, Chemical Science Division, Boulder, CO, USA

Investigating the effects of 3D thermal radiation on cloud droplet growth and on cloud dynamics

01/2016 - 08/2016 **Postdoc**

Chair of Experimental Meteorology, Faculty of Physics, Ludwig-Maximilians Universität München

Investigating the effects of 3D thermal radiation on cloud dynamics

PhD Student 04/2012 - 12/2015

Chair of Experimental Meteorology, Faculty of Physics, Ludwig-Maximilians Universität München

Supervisor: Prof. Dr. Bernhard Mayer

Radiative transfer model and parametrization development;

Investigating the effects of 3D thermal radiation on cloud development

4-week Internship 04/2009

German Aerospace Center (DLR), Oberpfaffenhofen

Supervisor: Dr. Veronika Eyring

Shipping emissions and their climate impact: Calculation of shipping routes and shipping emissions

Student Research Assistant

01/2009 - 02/2009

Meteorological Institute, Ludwig-Maximilians Universität München

Supervisor: Dr. Andreas Pfeiffer

Impact of change in climate, population and land use on the water resources of the Upper Danube: Data processing

Teaching

Teaching Assistant

04/2012 - 08/2014

Faculty of Physics, Ludwig-Maximilians-Universität München

Lecture: Meteorology 1 & 2

Lecturer: Prof. Dr. Bernhard Mayer

Teaching Assistant

04/2009 - 02/2012

Faculty of Physics, Ludwig-Maximilians-Universität München

Lecture: Synoptic 1 & 2

Lecturer: Dr. Robert Goler / Prof. Dr. Bernadett Weinzierl

Teaching Assistant

08/2010

Faculty of Physics, Ludwig-Maximilians-Universität München Field Training of the Meteorological Institute Munich, LMU

Supervised Theses

- Schütt, A., Parametrization of subgrid-scale thermal heating and cooling in clouds, Bachelor thesis, Faculty of Physics, LMU, 2015..
- Gödde, F., The effect of thermal radiation on cloud droplet growth, Bachelor thesis, Faculty of Physics, LMU, 2015.
- Akansu, E., The effect of cloud geometry on cloud-radiation-interactions in the thermal spectral range, Bachelor thesis, Faculty of Physics, LMU, 2014.

Professional Activities and University Services

Session Chair 04/2016

International Radiation Symposion, Auckland, New Zealand "Weather, Climate and Environmental Applications"

Session Chair 02/2016

Understanding Clouds and Precipitation, Berlin, Germany "Advances in Parametrizing Clouds and Precipitation"

Student Representative Speaker

09/2007 - 12/2011

Faculty of Physics, Ludwig-Maximilians-Universität München

Student Representative in various committees

09/2007 - 12/2011

Faculty of Physics, Ludwig-Maximilians-Universität München