

Dr. Merten Dahlkemper

Science Educator · Information Seeker · Physicist

My passion is the finding of connections. I love to learn new things and share it with others.

1 mertensworld.ch

Nyon

in/merten-dahlkemper

Malberten

B GOALS

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I like to play with data and discover new things.



I have been working in astrophysics and particle physics education and am always excited to learn new things.



I enjoy connecting seemingly unrelated ideas, and share the fascination of deep connections.

WORK EXPERIENCE

July 2024 Oct 2020

Doctoral Student

CERN · Meyrin, GE, Switzerland 9



PhD project in physics education research: Developing learning material to teach a particle physics subject to high-school students. Included an educational reconstruction of multiple particle physics topics as well as conducting teaching experiments with students and multiple eye-tracking studies to obtain in-depth knowledge about students' thought processes.

Sep 2020 Jul 2020

Research Assistant

UNIVERSITY OF GÖTTINGEN · GÖttingen, Germany **Q**



Included literature research for multiple topics in physics education as well as setting up an eye-tracking lab at the Physics faculty of the University of Göttingen.

SKILLS



Science Communication

Hands-on workshops

Questionnaire

development



Interview





Research Methodologies

> Data analysis

Jul 2020 Apr 2020



Intern

Council for Information Infrastructures \cdot Göttingen, Germany $\ensuremath{\mathbf{Q}}$



Internship in the secretariat of a science policy advisory council. Included literature research about aspects of information infrastructure policies in European countries.

Mar 2020 Dec 2019



Research assistant

UNIVERSITY LIBRARY GÖTTINGEN · GÖttingen, Germany 🗣

Included a variety of tasks behind the scenes of a large research library.

Sep 2019 Jan 2019



Research assistant

UNIVERSITY OF GÖTTINGEN · GÖTTINGEN, Germany **9**

Included research in astrophysical databases as well as data cleaning.

Dec 2018 Jan 2018

Research assistant

UNIVERSITY OF GÖTTINGEN · GÖttingen, Germany **?**



Working in the collection of historical astrophysical instruments. Taking photos and doing literature research.

Mar 2020 Oct 2016

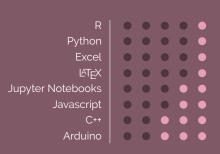
Teaching assistant

University of Göttingen · Göttingen, Germany ♥



Working as teaching assistant for multiple lectures (physics lab course, preparatory mathematics course, introduction to astrophysics). Mentoring physics students, correcting lab reports and worksheets, explaining mathematical and physical concepts. In the last six months I organised and facilitated a seminar on various topics related to the climate crisis named "Scientific Literacy".





LANGUAGES

German French Fluently Mother tongue Good Knowledge

HOBBIES

Running Climbing History Photography Programming Travelling

FORMAL EDUCATION

2024 2020

PhD

UNIVERSITY OF GÖTTINGEN · GÖTTINGEN, Germany **?**



PhD in Physics Education Research.

Thesis Title: The Use of Feynman Diagrams in Physics Education: Opportunities, Challenges, Practices. Supervisors: Prof. Dr. Pascal Klein, Prof. Dr. Andreas Müller

2020 2016

Master of Science

UNIVERSITY OF GÖTTINGEN · GÖTTINGEN, Germany **?**



Master of Science with a focus in astrophysics.

Thesis title: Metallicity Trends in Globular Clusters. Supervisor: Prof. Dr. Stefan DREIZLER

2016 2013

Bachelor of Science

University of Göttingen Göttingen, Germany 9



Bachelor of Science with a Bachelor thesis in astrophysics.

Thesis title: A scaling law for magnetic fields of rapidly rotating stars. Supervisor: Prof. Dr. **Ansgar REINERS**

VOLUNTARY ACTIVITIES

Today 2020

Science communicator

CERN · Meyrin, Switzerland ♥



I give guided tours, lab workshops, and science shows for the interested public, students and teachers to communicate the science done at CERN.

2018 2016

Member of the federal board

JUNGE DEUTSCHE PHYSIKALISCHE GESELLSCHAFT · Germany 💡



I was member for university politics and society, which included being the liaison between the jDPG (youth section of the German Physical Society) and the association of physics student bodies.

2019 2014

Member of the student council

FACULTY OF PHYSICS, UNIVERSITY OF GÖTTINGEN · GÖttingen, Germany ♥



Included the representation of the students of the faculty, as well as the organisation of various events such as the orientation week, summer parties etc. From 2015 to 2016 I was spokesperson.

2019 2014 Member of various commissions including the faculty board

FACULTY OF PHYSICS, UNIVERSITY OF GÖTTINGEN · GÖttingen, Germany ?



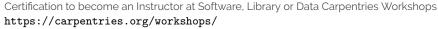
I represented the physics students on the board and in the commissions. During the time, one major and several minor changes of the course of study took place.

SELF-EDUCATION

June 2023 THE CARPENTRIES

Carpentries Instructor Training

CARPENTRIES -



September 2022

Manim Course

University of Göttingen 🖵



One week course using Jupyter Notebooks on the Python library Manim to create mathematical animations.

Fast Forward: project management and productivity training for researchers

https://flyingframes.readthedocs.io/en/latest/

2021



MIND MATTERS 🖵

https://mindmatters.pro/fastforward/

2021

MIND 🎆

Resilience Course for Researchers

MIND MATTERS 🖵

https://mindmatters.pro/personal-resilience-indicator/