

PHILIPP FRIEDRICH

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Education

2019 - 2022

Technische Universität München

Master of Science "Robotics, Cognition and Intelligence"

2015 - 2019

University of Tübingen

Bachelor of Science "Medieninformatik"

Thesis: "Camera-Based Vehicle Detection and Optical Flow Estimation for Real-Time Lane-Change Decisions using Deep Learning", Grade 1.0

Average Grade: 2.6

2007 - 2015

Gymnasium Ottobrunn

Abitur with W-Seminar "Applied Computer Science"



Practical Experience

November 21 - April 22 Master thesis at BMW Group

Location: Unterschleißheim, Germany

Department Autonomous Driving

Topic: "Multi-Task Active Learning for Autonomous Driving"

May 20 - September 21 Working student at BMW Group

Location: Unterschleißheim, Germany

Department Autonomous Driving

Topics: Data preparation, Development of machine learning models for perception tasks

April - August 19 Internship at BMW Group

Location: Shanghai, China

Department Autonomous Driving

Topics: Published Paper at IEEE IV2020 – "Real-time long-range road estimation in unknown environments", Development of a tool for an automated start of the AD-Vehicle

October 18 - March 19 Bachelor thesis at BMW Group

Location: Unterschleißheim, Germany

Department Roadmap, Methodic Artificial Intelligence

Topic: "Camera-Based Vehicle Detection and Optical Flow Estimation for Real-Time Lane-Change Decisions using Deep Learning"

Summer semester 18 - Working student at AVAT Automation GmbH

Location: Tübingen, Germany

Department Test and Automation

Topics: Further Development and maintenance of automation framework

Winter semester 16/17 - Tutor at Universität Tübingen

Location: Tübingen, Germany

Course: "User Interface Design" by Jun. Prof. Dr. Alexandra Kirsch

September 14 - Student internship at BMW Group

Location: München, Germany

Department IT Drive

Topics: Development of an Android smartwatch application for vehicle localization

Skills

Language

- German – Mother tongue
- English – Business fluent
- Chinese – Beginner

Programming & Software

Python, C/C++, Java, Bash, PyTorch, TensorFlow, OpenCV, OpenGL, Matlab, ROS, Swift, GO, HTML, CSS, PHP, JavaScript, Adobe, Gimp, Microsoft-Office, Unix/Linux

Hobbies

Road Cycling, Running, Ice Hockey