Education

10/14 - 08/15 M.Sc. in Electrical Engineering and Information Technology,

10/16 - 04/18 TU München, Munich, Germany,

GPA: 1.3 (on a scale from 1 to 5, with 1 being the highest score)

Master's Thesis Title: "A Simple But Universal Factorization Model for Knowledge Graph Completion". Re-

sults submitted to CIKM 2018.

Honours Degree in Technology Management, 02/15 - 07/17

Center for Digital Technology and Management, Munich, Germany,

GPA: 1.3 (on a scale from 1 to 5, with 1 being the highest score)

Add-on study program, with a focus on trend research and ideation of business ideas, new product development and prototyping, and consulting on strategic endeavors. 25 students selected per semester

(<8% acceptance rate).

B.Sc. in Electrical Engineering and Information Technology, 10/10 - 11/13

TU München, Munich, Germany,

GPA: 1.9 (on a scale from 1 to 5, with 1 being the highest score)

Bachelor's Thesis Title: "Development of a Depth-Augmented Dynamic Vision Sensor for 3D SLAM". Contri-

bution to 2014 ICRA paper.

Work and Research Experience (selection)

Master's Thesis Student, Mercateo GmbH, Munich, Germany 11/17 - 04/18

Research on representation learning of knowledge graphs.

03/17 - 08/17 Roboticist Freelancer, Robotise, Munich, Germany

Consulting, perception algorithm development, managing code integration and continuous testing,

managing ROS package release process.

Research Intern, NTT Communication Science Laboratories, Honatsugi, Japan 01/16 - 08/16

Research on human-curated cross-modal feature learning. Contribution to 2018 AAAI paper.

Research Assistant, NavVis, Munich, Germany 10/14 - 07/15

Development of algorithms for the removal of artifacts in point clouds.

Research Intern, Siemens AG, Siemens Corporate Research, Princeton, USA 01/14 - 06/14

> Implementation of 3D reconstruction workflow (key feature-based graph-SLAM); Implementation and evaluation of depth camera calibration techniques; Porting and refactoring of C code to C++.

Research Assistant, TU München, Neuroscientific System Theory, Munich, Germany 10/13 - 12/13

Extension of an event-based SLAM framework to work in real-time on embedded, low-power ARM hardware (e.g., Rockchip devices), streaming of data via UDP, and visualization on a client device.

Teaching Assistant for the C Programming Course, TU München, Munich, Germany 10/12 - 03/13,

04/15 - 07/15 Tutoring of around 30-50 students in the programming language C.

Intern, Siemens AG, I DT MC MF-M COC LMS LP, Munich 09/11 - 11/11

> Design and implementation of a test series evaluation tool in MATLAB (>20x speed improvement over existing solution); Implementation of a wrapper library for Siemens Starter in C# and integration with LabVIEW.

Private First Class (OR-3), 3. FüUstgBtl 293, Murnau am Staffelsee, Germany 07/09 - 03/10 Mandatory military service. Trained for SATCOM and TETRAPOL.

Publications

David B. Adrian, Till Brychcy, and Martin Kleinsteuber. "A Simple But Universal Factorization Model [1] for Knowledge Graph Completion". In: International Conference on Information and Knowledge Management [submitted]. 2018.

- [2] Yusuke Mukuta et al. "Weakly supervised collective feature learning from curated media". In: *The Thirty-Second AAAI Conference on Artificial Intelligence (AAAI-18)*. 2018.
- [3] Irman Abdic et al. *The Future of Education: Trend Report 2015.* Center for Digital Technology and Management, 2015. ISBN: 978-3-9815538-7-1.
- [4] David Weikersdorfer et al. "Event-based 3D SLAM with a depth-augmented dynamic vision sensor". In: Robotics and Automation (ICRA), 2014 IEEE International Conference on. IEEE, 2014, pp. 359–364.

Competitions, Awards, and Scholarships

09/17 - 10/17 **1st Place in VW Data:Lab Deep Learning and Robotics Challenge**, *Volkswagen AG*, Munich

Team challenge entailed building a fully autonomous Lego brick sorting robot from scratch.

o6/16 **Abroad Scholarship**, *Heinrich und Lotte Mühlfenzl-Stiftung*, Munich Awarded to students with excellents grades and social engagement at/outside of university.

08/15 - 09/16 **Vulcanus in Japan**, *EU-Japan Centre for Industrial Cooperation*, Japan Accepted as 2015-16 fellow (4% acceptance rate, >1000 applicants EU-wide).

11/12 – 11/13 **Siemens-Mentoring-Program**, Siemens AG / TU München, Munich

The one-year program offers a Senior Manager as mentor, fireside chats, and a variety of events (\sim 15 students per year).

10/10 – 07/11 **2nd Place in 'AdvElsor' Competition**, *TU München*, Munich Managed IT sub-team during the final project of building an Autonomous Rubik's-Cube-solving robot.

Leadership activities

10/12 - 07/15 **Member**, Federal Agency for Technical Relief (THW), Munich Technical relief in Germany as part of national civil protection measures.

03/12 - 11/13 **Mentor**, *Mentoring for International eXchange Students*, TU München

Mentor and contact person for incoming foreign students of the faculty.

o1/12 - o1/13 **Member of the board**, Student association of the Department of Electrical Engineering and Information Technology, TU München

Management of the registered association, including our business branch. Organized the introduction of a new soft-skill program available to all students as part of the regular degree curriculum.

03/11 - 07/15 **Student representative**, Department of Electrical Engineering and Information Technology, TU München

Regular member of the *Studienkommission* (commission on study affairs) and member of the working comitee of the master reform.

Computer Literacy and Open-Source Contributions

Operating Systems Linux (x86 64/ARM), Windows Office LATEX, MS Office, OpenOffice

Programming C/C++, Python, MATLAB Libraries Tensorflow, Eigen, PCL, OpenCV, ROS

GitHub github.com/dbadrian

Languages

German Native English Proficient (C2)

Japanese Lower Intermediate (A2-B1)

Hobbies

Mountaineering (high alpine tours, multi-pitch climbing), nature photography, tinkering with hardware