Matthias **Wright**

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Experience

Fleek *Remote*
Software Engineer *Dec. 2022 - Present*

- Building Fleek Network, a decentralized edge platform in Rust
- Among other things, I worked on
  - the consensus engine, based on Narwhal & Bullshark [blog post]
  - a private and secure, decentralized compute service using Intel SGX TEEs [blog post]
  - a latency-based hierarchical clustering to form a network topology for fast and reliable message propagation [blog post]
  - a performance-based reputation system for nodes on Fleek Network, based on EigenTrust

Ludwig Maximilian University of Munich *Munich, Germany*
Ph.D. Student in Computer Science *Dec. 2019 - Present*

- Research Area: Computer Vision / Deep Learning
- On leave since November 2022

RWTH Aachen University *Aachen, Germany*
Software Developer *Sep. 2015 - Aug. 2018*

- Worked part-time during my bachelor's degree, mostly building simple web apps

Education

University of Bath *Bath, United Kingdom*
M.Sc. in Computer Science *Oct. 2018 - Sep. 2019*

- Grade: Distinction

Aachen University of Applied Sciences *Aachen, Germany*
B.Sc. in Applied Mathematics and Computer Science *Sep. 2015 - Aug. 2018*

Publications

* denotes equal contribution

[1] Matthias Wright and Björn Ommer. ArtFID: Quantitative Evaluation of Neural Style Transfer. **GCPR 2022 (Best Paper Honorable Mention)**. [Code]

[2] Dmytro Kotovenko*, Matthias Wright*, Arthur Heimbrecht, and Björn Ommer. Rethinking Style Transfer: From Pixels to Parameterized Brushstrokes. **CVPR 2021**. [Code]

Blog Posts

Leveraging Narwhal & Bullshark For Consensus To Meet The High Demands Of An Edge Network

- Using Narwhal & Bullshark for committee-based consensus [URL]

Latency-Optimized Topology

- Using latency measurements to build an optimized network topology [URL]

Bloom Filters and Cuckoo Filters for Cache Summarization

- Comparing and benchmarking Bloom filters and Cuckoo filters [URL]

Skills

Programming Languages Rust, Python, Java
Languages German (native), English (fluent), French (elementary)