# Elisa Nguyen

PhD student in Trustworthy Machine Learning

☑ elisa.nguyen@live.de | 🌴 http://elisanguyen.github.io | 🗘 ElisaNguyen

## Education \_

#### International Max Planck Research School for Intelligent Systems

Tübingen, DE

PhD student in STAI group led by Prof. Dr. Seong Joon Oh

May 2022 - present

- · Thesis (tentative): Towards human-centered data attribution
- · Advisor: Prof. Dr. Seong Joon Oh
- · Research interests: Explainable AI, HCI, data-centric AI, and model evaluation

University of Twente Enschede, NL

MSc in Interaction Technology, GPA: 8.6 (cum laude)

Sep. 2019 - Dec. 2021

- · Thesis: Temporal Spike Attribution A local feature-based explanation for spiking neural networks
- · Thesis advisors: Prof. Dr. Christin Seifert, Dr. Gwenn Englebienne and Dr. Meike Nauta

Nordakademie Elmshorn, DE

BSc in Computer Science and Management, GPA: 1.8

Oct. 2013 - Mar. 2017

- $\bullet \ \ \, \text{Thesis in collaboration with Airbus: Requirements development for a PLM system for specific processes in an Industry 4.0 context}$
- · Thesis advisors: Prof. Hinrich Schröder and Alcibiades Gonzalez, M.Sc. (Airbus).
- · Erasmus Semester at ebs Paris with courses in international management and marketing.

## Professional Experience \_\_\_\_\_

Microsoft Research Redmond, WA, USA

Research internship Jun 2025 - Sep 2025

Interning in the MSR's Deep Learning group under the supervision of Andrzej Bankurski and Jaron Lanier.

Vector Institute Toronto, CA

Research internship Jan 2025 - May 2025

Visiting Prof. Dr. Roger Grosse's group in the frame of Vector's research internship program.

University of Twente Enschede, NL

Literature survey on evaluation methods in explainable AI

May 2021 - Dec 2021

Student research assistant in a team across the University of Twente and the University of Duisburg-Essen led by Meike Nauta.

Airbus Hamburg, DE

IT Project Manager in Technical Data Management department

Mar 2017 - Sep 2019

Scrum Master for legacy retirement of CAD Software, Project support (Risk, Budget and Stakeholder Management) in PLM projects, Technical and financial management of bundle contracts with suppliers.

# Teaching experience \_\_\_\_\_

Supervision:

Philipp DavydovMaster Thesis, Apr. 2024 - ongoing, University of TübingenJakob SnelMaster Thesis, Apr. 2024 - ongoing, University of TübingenAnastasia AlekseevaMaster Thesis, Mar. 2024 - Sep. 2024, University of Tübingen

**Albert Catalan** Research project and Master Thesis, Nov. 2023 - Mar. 2025, University of Tübingen

Evgenii Kortukov Master Thesis, Jun. 2023 - Apr. 2024, University of Tübingen

Teaching:

Tutor Trustworthy ML WS 2022/2023, University of Tübingen

**TA Data Science** SS 2021, University of Twente

TA NLP WS 2020/2021, University of Twente

Tutor Discrete Mathematics 2 Q3 2016, Nordakademie
Tutor Discrete Mathematics 1 Q1 2015, Nordakademie

## **Publications**

\* Equal contribution

#### **Conference and Journal papers:**

- [1] Kortukov, E., Rubinstein, A., **Nguyen, E.**, Oh, S. J. (2024). Studying Large Language Model Behaviors Under Realistic Knowledge Conflicts. arXiv preprint arXiv: 2404.16032. *Accepted at COLM 2024*.
- [2] **Nguyen, E.**, Seo, M., & Oh, S. J. (2024). A Bayesian approach to analysing training data attribution in deep learning. Advances in Neural Information Processing Systems, 36.
- [3] **Nguyen, E.**, Nauta, M., Englebienne, G., & Seifert, C. (2023). Feature Attribution Explanations for Spiking Neural Networks. In 2023 IEEE 5th International Conference on Cognitive Machine Intelligence (CogMI) (pp. 59-68). IEEE.
- [4] Nauta, M., Trienes, J., Pathak, S., **Nguyen, E.**, Peters, M., Schmitt, Y., ... & Seifert, C. (2022). From anecdotal evidence to quantitative evaluation methods: A systematic review on evaluating explainable ai. ACM Computing Surveys.
- [5] **Nguyen, E.\***, Theodorakopoulos, D.\*, Pathak, S., Geerdink, J., Vijlbrief, O., Van Keulen, M., & Seifert, C. (2020, October). A hybrid text classification and language generation model for automated summarization of dutch breast cancer radiology reports. In 2020 IEEE second international conference on cognitive machine intelligence (CogMI) (pp. 72-81). IEEE.
- [6] Geissler, D.\*, Nguyen, E.\*, Theodorakopoulos, D.\*, & Gatti, L. (2020). Pokérator-Unveil your inner Pokémon. In ICCC (pp. 500-503).

#### Workshop papers:

- [1] **Nguyen, E.**, Kortukov, E., Song, J. & Oh, S. J. (2023). Exploring Practitioner Perspectives On Training Data Attribution Explanations. arXiv preprint arXiv:2310.20477. Accepted at NeurIPS XAI in Action workshop 2023.
- [2] Davies, A., **Nguyen, E.**, Simeone, M., Johnston, E., & Gubri, M. (2024). Social Science Is Necessary for Operationalizing Socially Responsible Foundation Models. arXiv preprint arXiv:2412.16355. *Accepted at ICLR HAIC workshop 2025*.

#### Textbook:

[1] Mucsányi, B., Kirchhof, M., **Nguyen, E.**, Rubinstein, A., Oh, S. J. (2023). Trustworthy Machine Learning. https://trustworthyml.io/.

#### **Preprints:**

- [1] **Nguyen, E.**, Bertram, J., Kortukov, E., Song, J. & Oh, S. J. (2024). Towards User-Focused Research in Training Data Attribution for Human-Centered Explainable AI. arXiv preprint arXiv:2409.16978.
- [2] Wang, A., **Nguyen, E.**, Yang, R., Bae, J., McIlraith, S. & Grosse, R. (2025). Better Training Data Attribution via Better Inverse Hessian-Vector Products. arXiv preprint arXiv:2507.14740.

## Academic Service

Reviewing
NeurIPS 2024 and 2025, CHI 2025, Workshops at ICCV, ECCV, CVPR, NeurIPS
Workshops
Co-organising ATTRIB@NeurIPS 2024, Volunteering at WiML@ICML 2024
PhD representative in the Tübingen AI Center Council from August 2024

#### Skills

Coding Python, Django, Version control with Git

Organization Classical project management, Agile project management (Scrum, SAFe)

Languages German (Mother tongue), English (C2), French (C1), Vietnamese (Mother tongue), Dutch (B2)

# **Outreach and Volunteering**

KI macht Schule Tübingen, DE

Active Member, Al outreach for high schools (students and teachers)

Nov. 2022 - Present

Viva con Agua

Active Member, FUNdraising Sep. 2022 - Present

Tübingen, DE