# Elisa Nguyen

PhD student in Trustworthy Machine Learning

✉ elisa.nguyen@live.de | ⌂ http://elisanguyen.github.io | ⌂ ElisaNguyen | in nguyen-elisa | ▾ @_elinguyen

## Education

**International Max Planck Research School for Intelligent Systems**                    *Tübingen, DE*
PhD student                                                                              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
- 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

**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.
This research resulted in a survey paper, published in the ACM CSUR journal.

**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.

**Airbus**                                                                               *Hamburg, DE*
Dual Student of Computer Science and Management                                          Aug. 2013 - Mar. 2017
- Internships in Airbus ICT in IT Governance, project- and service management.
- Member of Airbus' vocational training IT team in Hamburg.

## Teaching experience

**Supervision:**

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| **Anastasia Alekseeva** | Master Thesis, Mar. 2024 - Sep. 2024, University of Tübingen | |
| **Albert Catalan** | Research project and Master Thesis, Nov. 23 - Dec. 2024, University of Tübingen | |
| **Evgenii Kortukov** | Master Thesis, Jun. 2023 - Mar. 2024, University of Tübingen | |

**Teaching:**

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| **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*.

**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

# Academic Service

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| **Reviewing** | NeurIPS 2024, eXCV@ECCV 2024 |
| **Workshop organization** | Co-organising ATTRIB@NeurIPS 2024, Volunteering at WiML@ICML 2024 |

# Skills

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| **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

**Tübingen AI Center** *Tübingen, DE*
PhD Representative Sep. 2024 - Present

**KI macht Schule** *Tübingen, DE*
Active Member Nov. 2022 - Present

**Viva con Agua** *Tübingen, DE*
Active Member Sep. 2022 - Present

**Freiwilligenbörse Hamburg** *Hamburg, DE*
Tutor Jan. 2022 - Apr. 2022