

WHO AM I?

I am a final-year PhD student at ETH Zurich supervised by Roger Wattenhofer. Interested in human evaluation of AI-generated images and text, and human-aligned compression.

EDUCATION

2023 - pres.	PhD in Representation Learning Image compression, image quality assessment, and multimodal machine learning. Supervising 30 BSc and MSc Thesis. Hands on Deep Learning course coordinator	ETH Zürich
2021 - 2023	MSc in Mathematical Modelling and Computation Advanced Machine Learning, Deep Learning, Deep Learning in Image Analysis, Advanced Image Analysis, Bayesian Machine Learning, Signal Processing	Technical University of Denmark GPA:5.73/6
2022	Study abroad Computer Vision Lab: research project in open vocabulary object detection with multi modal machine learning, Seminar in Deep Neural Networks	ETH Zürich GPA:5.71/6
2016 - 2020	BSc in Finance Mathematics and Economics Calculus, Probability theory, Linear Algebra, Statistics, Finance, Modelling, Programming, Microeconomics, Macroeconomics, Game Theory, Negotiation Techniques, etc.	Corvinus University of Budapest GPA:5.57/6

EXPERIENCE

2020 - 2023	Computer vision research assistant part time	PufinID Applying contrastive metric learning models for pattern recognition. Building image capturing quality control system. Using latent-diffusion models for synthetic data generation.
2020	Quantitative model developer	Morgan Stanley Continuing the internship project, by exploring performance with market frictions, especially looking at model robustness of moving from synthetic training data to real testing data.
2019 - 2020	Quantitative modelling intern part time	Morgan Stanley Researching reinforcement learning models like Q-learning, DQN, A2C, PPO, DDPG for option hedging.

SELECTED PUBLICATIONS

Shakir Yousefi, Andreas Plesner, Till Aczel, Roger Wattenhofer (2025). "Mind the Gap: Removing the Discretization Gap in Differentiable Logic Gate Networks" NeurIPS 2025

Till Aczel, Roger Wattenhofer (2024). "Conditional Hallucinations for Image Compression" Data Compression Conference 2025

Till Aczel, Roger Wattenhofer (2025). "The Unwinnable Arms Race of AI Image Detection" Workshop on What Makes a Good Video: Next Practices in Video Generation and Evaluation (NextVid @ NeurIPS 2025)

Till Aczel, Roger Wattenhofer (2023). "Efficient Multimodal Alignment: To Freeze or Not to Freeze?" Workshop on Unifying Representations in Neural Models (UniReps @ NeurIPS 2023)

Samuel Räber, Andreas Plesner, Till Aczel, Roger Wattenhofer (2025). "Human Aligned Compression for Robust Models" Workshop on Adversarial Machine Learning on Computer Vision: Foundation Models + X (AdvML @ CVPR 2025)