

TETIANA STAROVOIT

MACHINE LEARNING SPECIALIST | RESEARCHER

OBJECTIVE

I aim to apply modern data analysis, machine learning, and artificial intelligence methods to solve pressing scientific and applied problems.

I have experience working with geographic information systems (GIS), hybrid neural networks, computer vision in real-world applications, and deep analysis of large datasets.

My research interests include realworld data studies in water resource conservation and environmental condition improvement using AI.

SKILLS

Machine Learning (ML, Deep Learning, Large Language Models, Topological Data Analysis)

Statistical Analysis (Python – pandas, NumPy, SciPy, statsmodels)

Big Data & SQL (BigQuery, ClickHouse)

NLP

Cloud Technologie (Google Cloud, AWS)

WORK EXPERIENCE

PhD RESEARCHER | KYIV POLYTECHNIC INSTITUTE (OCTOBER 2023 - PRESENT)

Development and implementation of innovative GIS- and remote sensing-based methods for environmental projects.

- Optimization of machine learning models for environmental monitoring.
- Research on hybrid neural network architectures for water resource condition forecasting.

PROJECT LEAD IN INTERNATIONAL COOPERATION | KYIVVODOKANAL (DECEMBER 2018 - PRESENT)

- Lead specialist in the development and implementation of GIS-based water supply and wastewater management systems.
- Development of intelligent models for liquid behavior modeling in pipes and accident prediction.

Exchange of experience in implementing computer vision to search for damage in the collectors of the Berlin Waterworks.

EDUCATION

- **★ MASTER'S DEGREE** HYDRAULIC ENGINEERING & WATER MANAGEMENT (2024, NUWM)
- **❖ BACHELOR'S DEGREE** ARTIFICIAL INTELLIGENCE & DATA ANALYTICS (2022, KPI)
- **★ MASTER'S DEGREE** GEOINFORMATION SYSTEMS & SPATIAL DATA ANALYSIS (2020, NULES)

PARTICIPATION IN INTERNATIONAL PROJECTS

Training course "Operation & Maintenance of Urban Water Supply Systems" (Japan International Cooperation Agency, Kobe, Japan).

SCIENTIFIC PUBLICATIONS: ORCID – list of publications.







