





CONTACT

-  +41 79 373 2903
-  karina.rojasolate@gmail.com
-  Dornacherstrasse 27,
CH-4500, Solothurn.
-  karina-rojas-olate
-  Resident permit B
valid until 17.05.2027

SKILLS

Programming

Python (Advance). SQL
(Intermediate).

Libraries

Pandas, Tensorflow, Pytorch, Numpy,
matplotlib, Sklearn, Scipy, Astropy,
Lenstronomy.

Platforms

Github, Jupyter Notebooks, VSCode,
Latex, Overleaf, Slack, Trello.

Communication

Project management, supervision, public
speaking.

Languages

Spanish (Native), English (C1),
German (B1), French (A2).

EDUCATION

Ph.D. in Astrophysics

2014-2018 | Universidad de Valparaíso, Chile.

Master in Astrophysics

2012-2014 | Universidad de Valparaíso, Chile.

Bachelor in Physics

2007-2011 | Universidad de Valparaíso, Chile.

Project Management (certification)

2024 | By Google in Coursera

AWARDS

2025 | Euclid Special Talent And
Recognition (STAR) prize.

2023 | Hack'n'Lead Best solution.

2018 | 100 young Chilean Leaders.

2015 | Graduate Student Prize Lecture.

Karina Thran-Rojas

Data Scientists | Researcher

Data Scientist with 8+ years of experience in data analysis, Python, SQL, and deep learning. LSST Data Science Fellowship alumni, Hack'n'Lead 2023 and STAR Prize 2025 winner. Analytical, structured, and curious team player with a passion for learning and solving complex problems.

WORK EXPERIENCE

Fachhochschule Nordwestschweiz (FHNW) | Researcher

Oct 2024 – Sep. 2025 | Institut für Data Science, Windisch, Switzerland.

- Led a project to create meaningful training sets critical to machine learning model success.
- Design of a validation project, including data preparation, and performance evaluation.
- Co-supervised student research on deep learning models, including Vision Transformers, CNNs, and generative approaches.

University of Portsmouth | Fellow Researcher

Oct 2021 – Sep. 2024 | Institute of Cosmology and Gravitation, PO, UK.

- Designed, analyzed, and visualized large-scale datasets from complex database queries.
- Led an experiment evaluating human and AI performance in image classification, including data management, visualization, and publication.
- Applied neural networks for advanced image processing tasks.

Ecole Polytechnique Fédérale de Lausanne (EPFL) | Postdoc

Oct 2018 – Sep. 2021 | Laussane, Switzerland.

- Developed image classification models using convolutional neural networks.
- Contributed to the creation of a visualization tool for model outputs.
- Supervised Master's thesis and student projects, and organized a weekly research colloquium.

LSSTC Data Science fellowship | Alumni 2nd cohort

2017-2019 | United States.

- This program consisted of six weeks with one-week schools over a two years period, covering the following topics: Statistics, Image processing, Time domain analysis, Machine learning and software engineering, Scalable software and data storage, time series analysis.

Star Tres | Co-founder

2013-To Date | Chile and Online

- Creation and organization of social media content for general public, with the purpose of education and women in science visualization.
- Formulation, resource management, content creation and implementation of workshops in low incomes schools in Chile.