Arturo J. Ossorio Arana
Ecohydrologist | Data Scientist

arturoa91@gmail.com | linkedin.com/in/ajossorioarana | +54 9 113 636 8323

ABOUT ME

I love building things, tinkering with new tools, and learning new concepts. I find the process of dissecting a problem, analyzing the different components and evaluate possible solutions (with its trade-offs) extremely stimulating, especially when tackling complex, cross-functional problems with tangible outcomes.

Looking for new challenges within the data spectrum. Particularly interested in the intersection between data science and ecohydrology or freshwater issues.

EDUCATION

MSc., Ecohydrology (Part-time)
Universidad Nacional de la Plata (UNLP)
Thesis pending
Expected Graduation Date: 2023

BEng. + MEng, Civil Engineer
Universidad de Buenos Aires (UBA)
Graduated 2018

SKILLS

Python
pandas, numpy, scikit-learn, geopandas, request, matplotlib, seaborn

Data-related tools
Git, SQL, PostgreSQL

GIS and Remote Sensing
QGIS, Vector & Raster Data, DEM, Watershed Delineation

Maths
Probability, Statistics, Combinatorics, Linear Algebra, Calculus

Ecohydrology & Freshwater Ecosystems
Water Balance, Hydrograms, Eutrophication, Nutrient Budgeting, Lake Management

OTHER ACTIVITIES

Fly Fishing, Amateur Radio, Reading, Cooking, Traditional Folk Music, Guitar, Soccer, Skiing

EXPERIENCE

Python Programmer | Data Analyst @ HK Analytics
Jun. 2022 - Present | Freelancer (through Upwork)

• Contributed to develop codebase for photovoltaic (solar) plant analisys project.

• Experience with data libraries (pandas, numpy), data visualization libraries (matplotlib, plotly), pipenv and git.

• Worked as a freelancer in an autonomous manner, with regular meetings to plan weekly development plan.

Limnologist | Data Analyst @ EcoAqua
Mar. 2021 - Present | Argentina (Remote)

• Consistently delivered limnological reports of client's water bodies, preventively identifying negative trends in key water quality parameters and evaluating possible solutions

• Revamped reporting process, decreasing total delivery time by 45% while decreasing errors.

• Performed analysis on water data, identifying regional and seasonal differences in key variables as well as potential correlation between lake, watershed and limnological parameters.

Biology Project Manager @ EcoAqua
Feb. 2020 - Feb. 2021 | Buenos Aires, Argentina

• Diagnosed and treated for algae, submersed, floating and shoreline weeds and any other unwanted vegetation and water quality issues.

• Implemented new budgeting process based on limnological and operational factors, increasing revenue by 27%.

• Developed new workflow for solving customer's complaints, improving client retention rate by 30%, ensuring response of every request on time.

Aquatic Specialist @ EcoAqua
Jun. 2017 - Jan. 2020 | Buenos Aires, Argentina

• Managed five 2-people teams guaranteeing all services were completed on schedule. Devised and executed monthly and weekly schedules.

• Maintained 500+ acres of customer's lakes, providing superior quality service, fullfilling of all customer needs leading to 42% complaint reduction.

• Formulated and standardized maintenance routine for vehicles, machinery and tools, decreasing workflow interruptions by 60%.

PROJECTS/PUBLICATIONS

Test Elaboration on Pandas to Evaluate Candidates for Different Roles

• Created 50 scenario-based questions on Pandas, designed to test the situational judgement of the candidates. Reviewed and corrected 50+ previous questions made by another expert.

EDA on Argentine Lakes and Reservoirs dataset

• Obtained Carlson's trophic state index (TSI) for waterbodies in dataset of Argentine lakes and reservoirs. Analyzed differences between natural and man-made waterbodies and the role of latitude and depth in eutrophication.

Python-Generated Resume

• Using FPDF library, created the present resume entirely with Python.