IGNACIO REQUENA

(805) 895-7757 | ignacio@astroconsultants.org | LinkedIn | GitHub | Santa Barbara, CA

EDUCATION

Master of Environmental Science and Management (June 2024)
Bren School of Environmental Science & Management – University of California, Santa Barbara (UCSB)
Specialization: Energy and Climate
Highlighted Coursework: Geographic Information Systems (GIS); Advanced Environmental Data Analysis; Renewable Energy Systems; Energy Demand Analysis; Energy, Technology and the Environment.

Licenciatura in Anthropology (Bachelor and Master of Science Equivalent) (April 2019)
School of Natural Sciences & Museum (FCNM) **– Universidad Nacional de La Plata**, Argentina
Specialization: Archaeology

ENVIRONMENTAL RESOURCE MANAGEMENT EXPERIENCE

Director of Spatial Analytics – **Collective Energy Company**, Part-Time Remote (6/23–Present)

- Assess the feasibility of implementing solar photovoltaic (PV) & battery storage microgrid systems across +16,000 U.S. and Puerto Rico community health centers to enhance resilience in disadvantaged communities.
- Develop, maintain, and coordinate the development of 6 interactive prefeasibility dashboard desktop and mobile maps to support project feasibility, stakeholder engagement, and data visualization.

Founder & Principal Investigator – **Astro Consultants**, Part-Time Remote & Project Based (4/19–Present)

- Authored and co-authored 30 Cultural Resource 40-page reports in compliance with California Environmental Quality Act (CEQA) requirements for infrastructure projects across Santa Barbara City and County.
- Led the design and management of +150 cultural resource projects across southern and central California overseeing field surveys, testing, monitoring, archival research, data management, and GIS mapping.
- Develop custom interactive dashboard maps, featuring energy infrastructure, solar PV power potential analysis, and automated project tracking.

Co-Founder & Chief Technology Officer – **Sunstone Energy Company**, Part-Time Remote (4/23–5/25)

- Assessed site feasibility for solar PV & battery microgrid systems aimed at providing clean, affordable, and resilient energy to +700,000 homes and businesses in rural, remote, and indigenous communities of USA.
- Developed 2 comprehensive and interactive solar power feasibility dashboard maps using LiDAR data and deep-learning models to support high-resolution solar radiation modeling.
- Secured a $10,000 research grant from the California NanoSystems Institute (CNSI) to advance deep-learning solar resource modeling and microgrid feasibility analysis.

ENERGY PROJECT EXPERIENCE

U.S. Energy & Emissions Monitor Project – Master's Advanced Data Analysis Course, UCSB (1/23–3/23)

- Codesigned an interactive ShinyApp for online users to explore and analyze energy usage and emissions data across 5 different industry sectors, 8 fuel types, and 50 U.S. states.
- Codeveloped an R code for 6 widgets, including an interactive map and line plot across 50 U.S. states.

SKILLS & ADDITIONAL EXPERIENCE

Technical: Python; RStudio; ESRI ArcGIS Suite; QGIS; Excel & Spreadsheets; LiDAR; API requests
Remote Collaboration: Zoom, Box, Slack, WhatsApp, MS Teams.
Other Software: Tableau, Google Suite, Microsoft Word & PowerPoint, Adobe Acrobat & Illustrator.
Languages: Fluent in Spanish; Translated 4 scientific papers (Spanish to English) – FCNM (12/17–1/19).