José R. Campos T.

Curriculum Vitæ

Available for internship



Date of Birth 10/15/90

Portfolio Github Enthusiast, kaggle Expert

Competence areas Geosciences, Data Science, Statistical Learning, Research And Development

Positions

JUN 2018 - APR 2019 Research & Development at Repsol Technology Lab, Móstoles

- **Petrophysics: Application** of **Machine Learning** (ML) models to mudlogging data for wireline series regression; Application of ML models to drill cuttings sections for image classification and segmentation, (incl.: use case definition, exploratory data analysis, outlier detection, feature generation and selection, model design and assessment, reporting).
- Geomechanics: Software Development with Java and Matlab for wellbore instability analysis (incl.: software debugging & documentation, algorithm engineering & implementation).

OCT 2015 - JUL 2017 Geophysical Engineer at Geo&Amb, Santiago de Chile

Electromagnetic Methods for near-surface geophysical prospection and geological characterization.

FEB 2015 - MAY 2015

Geophysical Engineer at FUNVISIS (Venezuela Foundation for Seismological Research) & GFZ Potsdam (German Research Centre for Geosciences).

JAN 2015 - FEB 2015

Exploration Geophysicist at **PDVSA** (Petroleum of Venezuela) — Venezuela.

GIAME project (Lithospheric scale modeling of the Merida Andes).

MAR 2014 - MAY 2014

Exploration Geophysicist at FUNVISIS & Rice University Venezuela Seismic data acquisition.

■ Academic Formation

SEP 2017 - JUL 2018 MSc. in Reservoir Geology and Geophysics at the Universitat de Barcelona (UB) & Autonomous University of Barcelona (UAB);

> **Dissertation**: Enhancing of magnetotelluric signals with machine learning (RNN) in Python. (9/10 - Honor Mention).

OCT 2008 - DEC 2013

B.Eng. Geophysical Engineer. Universidad Central De Venezuela (UCV);

Dissertation: Acquisition and processing of gravimetric and magnetic data across the Merida Andes. (10/10 - Honor Mention).

Competencies & Personal Skills

Competencies

Machine Learning (e.g., Boosted Trees, Deep Learning, Clustering, Dimensionality reduction, Anomaly Detection, Ensembling), Statistics (e.g., Frequentist Statistics, Exploratory Data Analysis, Bayesian inference, Regression analysis), Data Engineering (e.g., Feature extraction, Big Data Manipulation), Scaled Computing (e.g., Multiprocessing, Dask, Spark, Hadoop, Cloud computing), Mathematics and **Physics** (e.g., Signal Processing, Optimization, Inverse Problem, Numerical Methods, Physics), Geosciences (Potential-field Electromagnetism, Rock Electromagnetic Methods, 3D modelling, Reservoir Characterization, Seismology & Seismic, Geomechanics, Sedimentology, Structural Geology, Petrophysics).

Languages Spanish (Native), English (IELTS Band: 7/C1), French (Alliance Française: B2).

Programming Skills Python (4), R (3), Matlab (4), JavaScript (3), HTML5/CSS3 (3), Java(2).

Database Pandas (4), MySQL (2), MongoDB (1).

Frameworks Dash (3), React (2), TensorFlow (2), Django (1).

Ides PyCharm (4), IPython / Jupyter (4), IntelliJ (3), PhpStorm (3), R Studio (2).

Platforms Linux Desktop / Shell (3), Docker (1).

Relevant Coursework

MAR 2019 Advanced Machine Learning Specialization. Higher School of Economics (RU).

JAN 2018 Deep Learning Specialization. Stanford University.

JAN 2018 - MAR 2018 Machine Learning. Stanford University.

APR 2017 Full Stack Development. Codecamp Org.

MAY 2016 - JUL 2016 R Programming. Johns Hopkins University.

Activities And Societies

JAN 2019 Kaggle Days Madrid Member

JAN 2013 - DEC 2014 Student's spokesperson before the school council. (UCV).

JAN 2012 - DEC 2014 General secretary of the student's representation. (UCV).

JAN 2012 Student Member. Society of Exploration Geophysicists (SEG).

Publications

JAN 2018 Peña, Andrea & Cajas, Miguel & Campos, Jose (2018). Application of Machine Learning models in thin sections images of drill cuttings: lithology classification and quantification, EAGE (Conference Paper).

OCT 2014 Campos, Jose & Sanchez, Javier & Orihuela, Nuris & Schmitz, Michael. (2014). Gravimetry of northwestern Venezuela, JIFI - EAI - UCV (Conference Paper).