Carolina Rios-Trujillo

Bogota, Colombia | LinkedIn | GitHub | Website

Profile

Data Scientist with over 5 years of experience in developing machine learning models and conducting advanced data analysis within the banking sector. Passionate about leveraging data to drive actionable insights and strategic decision-making. Proficient in R, Python, SQL, and PySpark, with a proven track record of delivering solutions that increase efficiency and business value.

Education

MIT Professional Education, Applied Data Science Program

May 2024 - Aug 2024

Relevant Coursework: Machine Learning, Big Data Analytics, Recommendation Systems, Deep Learning E-portfolio

Pontificia Universidad Javeriana, Bachelor of Science in Economics

Jan 2015 – Sep 2019

Honors: Second-Best Teaching Assistant Award

Relevant Coursework: Econometrics, Probability, Statistical Analysis, Microeconomics

Experience

Senior Data Scientist, Customer Analytics, Banco Davivienda – Bogota, Colombia

May 2024 - Sep 2024

- Led development of advanced predictive models and data solutions that resulted in a 10% increase in savings account balances.
- Engineered a churn prediction model for corporate payroll agreements, enabling proactive interventions that reduced disengagement risk.

Semi-Senior Data Scientist, Customer Analytics, Banco Davivienda – Bogota,

Nov 2022 - May 2024

- Developed classification and clustering models that contributed to a 1-point increase in Net Promoter Score.
- Collaborated on building a Feature Store, optimizing modeling time from 4 weeks to 1 week, significantly improving data scientist's efficiency.

Semi-Senior Data Scientist, Transactional Analytics, Banco Davivienda – Bogota, Colombia

Jan 2022 – Nov 2022

- Led customer digitization strategies, utilizing machine learning models in R and Python to boost digital adoption by 2 percentage points.
- Optimized data pipelines and analytics processes, enhancing the accuracy of digital behavior insights.

Data Scientist, Transactional Analytics, Banco Davivienda – Bogota, Colombia

Oct 2020 - Jan 2022

- Redefined the customer digitization index, revealing a more accurate digitization rate of 65% vs. the previously estimated 80%, refocusing marketing efforts effectively.
- Analyzed large datasets to build predictive models that increased customer digitization by 1 percentage point.

Junior Data Scientist, Transactional Analytics, Banco Davivienda – Bogota, Colombia

Sep 2019 – Oct 2020

- Identified data trends and correlations using SQL and R, enhancing customer understanding for business units.
- Developed interactive dashboards in Google Data Studio and Microsoft Power BI, serving as control panel for the Transactional Analytics team and marketing teams.

Student Intern, Analytics Department, Banco de Bogota – Bogota, Colombia

Jan 2019 - Jul 2019

Reformulated credit card churn model using R Studio, achieving a reduction in the bank's costs as the previous model was developed by a third party company.

Technical Skills

Programming Languages: R (Advanced), Python (Intermediate), SQL (Advanced), PySpark (Advanced)

Data Technologies: BigQuery, Cloudera, Looker Studio, Dataiku, Microsoft Excel

Distinctions

10th Place Couple, National AI Hackaton Competition - Colombia

Aug 2020

Recognized for developing top forecasts of the exchange rate and employee churn predictions using R.

Second-Best Teaching Assistant, Pontificia Universidad Javeriana – Bogota, Colombia

Oct 2017

Awarded based on outstanding student performance and feedback in economics courses.

Courses and Certifications

Applied Data Science Program Certificate

Aug 2024

MIT Professional Education

Working with BigQuery

Jul 2023

Google - Coursera

Google Cloud Big Data and Machine Learning Fundamentals

Dec 2021

Google - Coursera

Skills

Languages: Spanish – Native, English – Proficient (TOEFL iBT 103)

Soft skills: Adaptability, critical thinking, teamwork, and problem-solving abilities.

Others: Intermediate-level tennis player; enjoy participating in sports that foster strategic thinking and perseverance.

Additionals

Integration Activities Coordinator, Analytics VP – Banco Davivienda, Colombia Organized year-end events for the Analytics Department, improving team communication and collaboration. Coordinated venues, activities, and schedules for over 60 team members.

Nov 2020 - Dec 2023

Volunteer Trainer - Fundacion Bolivar-Davivienda, Colombia

Feb 2022 - Nov 2022

- Delivered financial education workshops to construction workers, enhancing financial literacy and management skills.
- Facilitated conflict resolution activities for children aged 5 to 11, promoting non-violent communication and problem-solving.

Teaching Assistant – Universidad Javeriana, Colombia

Feb 2017 – Jun 2017

Courses: Advanced Microeconomics I and Economics Fundamentals Provided academic support through supplementary classes and evaluated weekly workshops. Recognized for exceptional student performance and positive feedback.

Economics Faculty Integration Mentor – Universidad Javeriana, Colombia Led integration activities for incoming economics students, facilitating smooth transitions into university life. Organized campus tours and introductory sessions with faculty members.

Jun 2016 – Jan 2018

Leadership Camp Facilitator – Universidad Javeriana, Colombia Planned and led camp activities focused on developing leadership skills among participants.

Aug 2017