Juan Camilo Díaz

PERSONAL DATA

PLACE AND DATE OF BIRTH: Bogotá, Colombia | 03 January 1990

HOME ADDRESS: Bogotá, Colombia juancadh@gmail.com

WORK EXPERIENCE

Current MAR 2020

Consultant at Inter-American Development Bank

Fiscal risks and macroeconomic sustainability

- 1. Full-stack design and development of a web-app solution using Django as back-end framework and AWS as cloud infrastructure. The tool provides an Early-warning system for fiscal sustainability in Latin American and the Caribbean countries and it is based on Machine learning approaches for the prediction of fiscal crises.
- 2. Designed, developed and implemented a Dashboard in Power BI that shows a descriptive analysis and results from a Machine Learning model that predicts the fiscal revenue using electronic invoicing data set.
- 3. Designed, developed, and implemented a windows-based software called SOFIS. It is used for fiscal sustainability and helps subnational governments in their analysis of public finances. It consists of two main modules: a Medium-Term Fiscal Framework (MTFF) and a Debt Sustainability (DS) approach. This software was created in VB.NET and is currently in the beta phase and being tested by different countries in the region.

Sep 2018 JAN 2017

Data Analyst at TransUnion, Bogotá FS Research and Consulting

- 1. Developed an automated reporting system providing financial sector insights about customers' credit behavior. This solution was created using Hadoop Distributed File System and Spark as compute engine. Further data analysis and data modeling were performed in python and R.
- 2. Supported and created different research studies for the financial sector using Spark and SAS as data processing engines. Some examples involved payment hierarchy study, credit-consumer life cycle study, and forecasting models for the credit market. These studies were published in national media such as specialized magazines, radio or TV, and were also presented in advisory boards organized by the company.

JAN 2017 AUG 2015

Data Analyst at Banco Davivienda, Bogotá

Research and Analysis of Strategy

- 1. Developed and implemented a financial engine providing information and analytics about the customer life cycle. This solution was created using Microsoft SQL Server stored procedures that were widely used by the Customer Analytics Direction in the decision-making process. This study resulted in other useful analyses like Next Best Offer (NBO) and welcoming strategies for payroll saving accounts campaigns.
- 2. Collaborated with the analytics team to design and develop a standalone application in VB allowing the research group to update the information of Customer Lifetime Value using Microsoft SQL Server stored procedures. I was responsible for the entire methodological creation, implementation, and support.

Jun 2015 Jun 2014

Intern at Central Bank Of Colombia, Colombia Principal Research Assistant

Responsable for literature reviewing, data searching and processing, and the implementation of econometric and statistical models in R and RATS for exchange rate forecasting.

EDUCATION

M.Sc. Data Science, Universidade Nova de Lisboa IMS, Lisbon **SEPT 2021.**

Major: Data Science

GPA: 18/20

SEPT 2015 B.Sc. Economics, Universidad Javeriana, Bogotá

Major with honors: Quantitative Methods

GPA: 4.2/5.0

SEPT 2014 B.Sc. Industrial Engineering, Universidad Javeriana, Bogotá

Major: Operations Research

GPA: 4.1/5.0

Highschool at Colegio Emilio Valenzuela, Bogotá DEC 2007

OTHER EDUCATION

Linear and Integer Programming OCT. 2014 On-line Course at Univertisty of Colorado Boulder | Certificate Here. Group Class Markov Switching Models **JULY 2014** Summer Class at Javeriana University | Professor: Martha Misas Panel Cointegration And Related Panel Time series Methods **JUNE 2013** Summer Class at Javeriana University | Professor: Peter Pedroni The Challenges of Global Poverty MAY 2013 edX course at MIT | Professor: Esther Duflo | Certificate Here. **JUNE 2010** 9 months Student Abroad at EF Institute.

Boston, Massachusetts US.

LANGUAGES

Mothertongue SPANISH:

Fluent - IELTS B2 (6.5 Overall Score) **ENGLISH:**

PORTUGUESE: Intermediate - B1

COMPUTER SKILLS

Intermediate Knowledge: HIVE, SPARK, VB.NET, AWS (Elastic Beanstalk), GCP

Advance Knowledge: PHYTON, R, MySQL, Postgres, Mongo, VBA, JavaScript, HTML, CSS

INTERESTS AND ACTIVITIES

Data Architecture, Analytics, Data Science, Research, Programming, Statistics, Machine Learning