# Ionita Alexandru Dumitru

0760868881 | linkedin.com/in/ionita-alex-5a0592221 | ionitaalex550@yahoo.com | https://github.com/IonitaA

#### **Education**

Alexandru Ioan Cuza University

Bachelor's Degree in Computer Science and Mathematics Sep.2018 - Jul. 2021

Vasile Sav Technological High School

Computer Science and Mathematics

Roman

Iasi

Sep. 2014 - Jul. 2018

## **Technical Skills**

Languages: Python, C++, SQL(Postgress), VBA, Kotlin, R, Matlab

Framework: Ktor, Apache Spark

<u>Developer Tools:</u> Microsoft Azure, PowerApps, Power Automate, Power BI, VS Code, Visual Studio, PyCharm, IntelliJ, Jupiter Notebook, GCP, Databrics, Dataproc

*Libraries*: pandas, tkinter, win32com.client, re, pyinstaller, sqlalchemy, psycopg2, pyspark, multiprocessing

**Soft Skills:** Time Management, Teamwork, Analytical thinking, Communication, Problem Solving

#### **Experience**

**EXPLEO**Mar. 2022 - Nov. 2023

## Automation of SAP Processes – Python

The development of an application aimed at streamlining the time required for certain processes through automation within SAP. The application was crafted in Python, leveraging libraries such as pandas for data manipulation, Tkinter for the graphical user interface, win32com.client for interaction with the Windows platform, and re for regular expression manipulation. The application was packaged as an executable, facilitating its use within the organization;

**<u>Responsibilities:</u>** Implementation of tasks in Python, Functionality testing, Discussions with the client, Clarification of requirements, Troubleshooting and debugging on Python.

## Resource Transfer App – Power Apps

Mar. 2023 - Sept. 2023

Sept. 2023 - Nov. 2023

This application was created to simplify and streamline the process of managing staff transfers between teams within our company. The application has the following roles: Team Leader Level 1 / Team Leader Level 2, Unit Delivery Leader, Human Resources (HR); In this application, users can view the staff under their supervision, initiate transfers, track their status, view/edit/validate/close transfers, manage information in the database, and manage users with HR roles.

**Responsibilities:** Implementation of tasks in PowerApps (design and functionality); Functionality testing; Discussions with the client; Clarification of requirements; Documentation; Troubleshooting and debugging on Power Automate, Microsoft Excel (Macro), Power Apps

### Project Code Management - Power Apps

Dec. 2022 - Mar.2023

I was working on a project code management, which will allow the management to simplify the transfer process. The client's need is to manage all project codes in one location, in a database, and send this information to the responsible staff. The application is structured with two roles:

- 1) The admin role, which focuses on managing the admin list and application lists.
- 2) The user role, which allows users to complete all fields required to complete a project code.

In defining the project flow, we have also implemented the functionality to send email, with the information filled by the user being exported in PDF format. For this project, we chose to use PowerApps because the flow described above is easy to integrate.

**Responsibilities:** Implementation of tasks in PowerApps (design and functionality); Functionality testing; Discussions with the client; Clarification of requirements; Documentation;

### Northern Trust - Cognos

May 2022 - Sept. 2022

Participated in Project Cognos where I Clear understanding of Cognos BI reporting, Cognos components such as Query, Analysis and Report.

**<u>Responsibilities:</u>** Clarification of requirements; Data analysis; Data modeling; Creating queries and reports; Designing and formatting reports; Testing the reports; Performance optimization; Updating and maintenance

# **Projects**

<u>Uber Data Analytics</u> December 2023

The primary objective of this project is to conduct data analytics on Uber datasets, employing a range of cutting-edge tools and technologies. The project's tech stack includes Google Cloud Platform (GCP) Storage, Python, Compute Instances, Mage Data Pipeline Tool, BigQuery, and Google Looker Studio.

## **Project Phases:**

- The project begins with the acquisition of the Uber dataset;
- To efficiently handle and prepare the data, a combination of Mage and Python is utilized for orchestration and ingestion;
- Following ingestion, the raw data is securely stored in two key locations: Google Cloud Storage and BigQuery. This strategic storage approach ensures data accessibility and scalability for future analytics;
- For presenting the results of the data analytics, Google Looker Studio is employed.

<u>Data distribution</u>

January 2024

The main goal of the project is to develop a dedicated Python code for the efficient transfer of large-scale data and simultaneous transmission to pgAdmin. This objective aims at optimizing processes and ensuring efficient information management within the project

#### **Project Phases:**

- Dividing the file into fixed-size fragments;
- Establishing and managing the connection with pgAdmin, including the destruction and creation of tables;
- Grouping data for addition to pgAdmin;
- Sending groups in parallel.

BVB Data Processing February 2024

The primary objective of this project is to collect historical trading data from the Bucharest Stock Exchange, utilizing a variety of tools and technologies. The project's tech stack includes Google Cloud Platform, Cloud Storage, PySpark, Bash, Python, Cloud Storage, BigQuery and Google Looker Studio.

#### **Project Phases:**

- The program begins by creating a Spark session and importing the necessary classes and libraries;
- Retrieving data from the Bucharest Stock Exchange (BVB), adding it to a DataLake, modeling and cleaning the data, and storing it in a DataWareHouse;
- Merging the data from the DataWareHouse, and then securely storing the combined dataset in two key locations: Google Cloud Storage and BigQuery. This strategic storage approach ensures accessibility and scalability of the data for future analyses;
- For presenting the results of the data analytics, Google Looker Studio is employed.