

**Data Glacier Project Report**  
**Project: Bank Marketing (Campaign)**  
**Group: Model Maestros**

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## **Problem Description**

ABC bank aims to launch a new term deposit scheme and wants to sell this product to customers. Prior to the launch, the bank plans to start a marketing campaign for the product through various marketing channels like Telephone, SMS, Emails, etc. To save time and to minimize the costs associated with this process, the bank wants to shortlist all the potential customers who have a greater possibility of buying the term deposit product.

This will help the marketing team to start a campaign on a set lot of customers without wasting their resources on any unlikely buyers. To achieve this outcome, we will need to develop a classification model with high accuracy to determine if a customer will subscribe to the term deposit or not based on the available marketing data.

### **Business Understanding**

A new ML model will be developed and deployed on the cloud server subjected to a rigorous evaluation process for selecting the best model to produce optimal results. Bank executives can pass the customer information such as age, income, education, marital status, etc., to predict if the customer would subscribe to the term deposit. The ML application returns the prediction as 'Yes' or 'No'. The team can then consider sending marketing communication to the potential clients based on the prediction made by the ML algorithm.

### **Project Lifecycle**

<b>Timeline</b>	<b>Deadline</b>	<b>Plan</b>
Week 7	Dec-19-2023	Teammember's details, Understanding requirement, Problem Statement, Data Intake Report, GitHub Repository creation
Week 8	Dec-26-2023	Thorough data analysis, identifying inconsistencies in data, approaches to clean and remove inconsistencies in the dataset
Week 9	Jan-02-2024	Applying Data Cleaning and Transformation techniques
Week 10	Jan-09-2024	EDA and Recommendations
Week 11	Jan-16-2024	EDA Presentation for business and technical users
Week 12	Jan-23-2024	Model building and Performance evaluation
Week 13	Jan-30-2024	Model Deployment and Solution presentation

# Data Intake Report

Name: Data Science - Bank Marketing (Campaign)

Report date: 19<sup>th</sup> December 2023

Internship Batch:LISUM27

Version:<1.0>

Data intake by: Purvesh Mehta – Group Project

Data intake reviewer:

Data storage location: <https://archive.ics.uci.edu/dataset/222/bank+marketing>

## Tabular data details:

<b>Total number of observations</b>	45211
<b>Total number of files</b>	3
<b>Total number of features</b>	16
<b>Base format of the file</b>	.csv
<b>Size of the data</b>	4.5 MB