Project Initialization and Planning Phase

Date	26 NOVEMBER 2024
Team ID	FACULTY
Project Title	Unemployed Insurance Beneficiary Forecasting
Maximum Marks	3 Marks

Project Proposal (Proposed Solution) template

This project proposal outlines a solution to address a specific problem. With a clear objective, defined scope, and a concise problem statement, the proposed solution details the approach, key features, and resource requirements, including hardware, software, and personnel.

Project Overview	
Objective	Unemployed Insurance Beneficiary Forecasting is to accurately predict the number of beneficiaries to optimize resource allocation, reduce delays, and improve the overall beneficiary experience.
Scope	Includes designing and implementing a predictive model to forecast the number of beneficiaries, utilizing historical data, economic indicators, and demographic trends.
Problem Statement	
Description	The Unemployed Insurance Beneficiary Forecasting problem statement involves developing an accurate predictive model to forecast the number of unemployed insurance beneficiaries, addressing the challenges of inaccurate forecasting, delayed payments, and inefficient resource allocation.
Impact	The accurate forecasting of unemployed insurance beneficiaries will have a significant impact on optimizing resource allocation, reducing payment delays, and improving the overall experience for beneficiaries, ultimately enhancing the efficiency and effectiveness of the unemployment insurance program.
Proposed Solution	
Approach	The proposed solution approach involves developing a predictive analytics model leveraging machine learning algorithms, historical data, and economic indicators to accurately forecast the number of unemployed insurance beneficiaries.

Key Features	Includes predictive analytics, machine learning algorithms, data integration, automated forecasting, and real-time reporting and visualization.

Resource Requirements

Resource Type	Description	Specification/Allocation
Hardware		
Computing Resources	CPU/GPU specifications, number of cores	2 x NVIDIA V100 GPUs
Memory	RAM specifications	8 GB
Storage	Disk space for data, models, and logs	1 TB SSD
Software		
Frameworks	Python frameworks	e.g., Flask
Libraries	Additional libraries	e.g., scikit-learn, pandas, numpy,tensorflow,keras,plotly,statsmodels,matplotlib
Development Environment	IDE, version control	e.g., COLAB Notebook, Git,VS Code
Data		
Data	Source, size, format	e.g., Kaggle dataset, 10,000 images