Project Proposal

Project Title: Credit Risk & Customer Retention Analysis – Predictive Modelling and Insights

Objective:

To build a predictive and analytical solution that helps banks and financial firms:

- Predict loan/credit card default risk using customer profile, credit score, utilization and transaction behaviour.
- Identify customer churn risk and take proactive retention measures.
- Provide actionable business insights through an interactive dashboard showing risk, churn and product penetration.

Scope of Work:

- Data Cleaning & Preprocessing.
- Exploratory Data Analysis to identify demographic & behavioural trends.
- Predictive Modelling (Default risk using Logistic Regression/ Decision Trees/ Random Forest).
- Customer Segmentation (churn risk, cross-sell opportunities)
- Dashboard Creation in Power BI.
- Recommendations for business strategy.

Expected Deliverables:

- Clean dataset with demographics, credit profile, transactions, product holding and engagement.
- Python notebooks with EDA + Predictive Models.
- Power BI dashboard with key insights:
    - Default risk distribution
    - Churn probability segmentation
    - Product penetration and cross-sell opportunities
- Final report with business recommendations