

Project Design Phase-I

PROBLEM SOLUTION FIT

TEAM ID : PNT2022TMID44312

PROJECT NAME : Developing a Flight Delay Prediction Model
Using Machine Learning

DATE : 1.10.2022

1. CUSTOMER SEGMENT Business peoples and regular flight users	6. CUSTOMER CONSTRAINTS Lack of transparency, no user-friendly models to work with	5. AVAILABLE SOLUTIONS Weather forecasting, creation of larger runways, effective air traffic control
2. JOBS-TO-BE-DONE/ PROBLEMS Predicting the flight delay due to the various reasons that may cause it, Intimate the flight delay to the passengers, Provide alternate flights, if the delay is prolonged	9. PROBLEM ROOT / CAUSE Adverse weather conditions, air traffic, bird strikes, less runways, waiting for connecting passengers and bags, flight malfunction	7. BEHAVIOUR Choose the right airlines, Choose different modes of transport , Wait patiently in the waiting hall until further notification, Search online for alternate flights, Dissatisfied and frustrated
3. TRIGGERS Seeing other airlines that give accurate departure and arrival time even with delay	10. YOUR SOLUTION By using machine learning algorithms we can try to predict if the flight will be delayed in many ways. If given the right set of input parameters (Flight no, departure and arrival time, origin and destination airport, scheduled arrival and departure time, etc.), the ML algorithms can predict the delay with high accuracy	8. CHANNELS OF BEHAVIOUR 8.1 ONLINE Check for reimbursements, Search for the right airlines, book alternate flights online, agree to a new connection, call the airline 8.2 OFFLINE Don't plan activities on the day of arrival, schedule flights for the middle of the week, fly non-stop routes, avoid travelling during holidays
4. EMOTIONS: before /after Frustration -> Satisfaction		