Literature Survey

S.NO	TITLE OF THEPAPER	Authors and Year	PROBLEMS ADDRESSED BY THE PAPER	METHODOLOGY USED	LIMITATION OFTHE SYSTEM	Dataset used and source of Dataset (ifany)	Accuracy (Ifany
1	Flight Delay Prediction Based on Aviation Big Data and Machine Learning	Guan Gui , Fan Liu(2020)	This paper explores a broader scope of factors which may potentially influence the flight delay, and compares several machine learning-based models in designed generalized flight delay prediction tasks.	This approach where the key ADS-BOUT subsystem,flight transmitters periodically send their own information to other flights and ground stations. The ADS-BIN subsystem, the flight receivers receive out-message from other flights and the ground stations. paper, random forest-based and LSTM-	It does not focus on collecting,generating more training data, integrating more information like airport traffic flow, airport visibility into our dataset, and designing more delicate networks.		

				based architec-tures have been implemented to predict individual flight delay.			
2	Flight delay prediction based on deep learning and Levenberg-Marquart algorithm.	Maryam Farshchian Yazdi1, Seyed Reza Kamel (2020)	This paper proposes a model for predicting fight delay based on Deep Learning (DL). DL is one of the newest methods employed in solving problems with high level of complexity and massive amount of data.	The approach of noisy data requires utility of stack denoising autoencoder (SDA) in designing the model and structure of the fight delayforecasting model with Levenberg-Marquart (LM) algorithm. In addition, in this paper by developing a deep learning-based model, the accuracy of fight delay predictions can be increased.	It does not contain enough data for recognize all the signs. Accuracy is very bad.		
3	Chained Predictions of Flight Delay Using Machine Learning	Jun Chen, Meng Li	This paper presented a	The combinations of Bureau of Transportation Statistics	The updation of the actual departure delay with the		

		(2019)	new machine learning based air traffic delay prediction model that combined multi-label random forest classification and approximated delay propagation model.	(BTS), the National Oceanic and Atmospheric Administration (NOAA) and Aviation System Performance Metrics (ASPM), we design an algorithm to select the optimal training features that predicts the departure delay and arrival delay with the highest accuracy.	iteration number along the itinerary, the models accuracy can be further improved.		
4	Probabilistic Flight Delay Predictions Using Machine Learning and Applications to the Flight-to-Gate Assignment Problem	Micha Zoutendijk, Mihaela Mitici(2021)	This paper is based on utility of the estimated delay distributions, we integrate these probabilistic predictions into a probabilistic flight-to-gate assignment problem.	Theprediction algorithms is employed, of which AdaBoost performs best.find that the features based on trajectory data contribute the greatest to the predictive accuracy, and the best result is found using LightGBM.The classification and regression results obtained in these studies generate an estimate for individual flight delay in the form of a class or a point estimate.	There is no varying assignment costs and airline gate usage, and, secondly, the integration of probabilistic flight delay predictions into models for other airport operations.		
5	Flight Delay Prediction	Bhuvan Bhatia(2016)	This project goal is to use	They discusses the Random Forest method and the	This project does not includes a larger dataset		

			exploratory analysis and to build machine learning models to predict airline departure and arrival delays.	SVM model.	where it has different ways to preprocess a larger dataset like running a Spark cluster over a server or using a cloud-based services like AWS and Azure to process the data.		