

## Initial Project Planning Template

Date	27 September2024
Team ID	739695
Project Name	Toxic Comment Classification for Social Media using NLP
Maximum Marks	4 Marks

### Product Backlog, Sprint Schedule, and Estimation (4 Marks)

Use the below template to create a product backlog and sprint schedule

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members	Sprint Start Date	Sprint End Date (Planned)
Sprint-1	Data collection	USN-1	As a user, I can collect a diverse dataset of social media comments, including both toxic and non-toxic comments from various social media platforms	5	High	ABBINENI BHUMIKA	20/10/2024	21/10/2024
Sprint-2	Data Preprocessing	USN-2	As a user, I can import libraries like numpy, pandas, matplotlib and seaborn. As a user I can read the datasets	3	High	DHARLA POOJITHA ABBINENI BHUMIKA	22/10/2024	23/10/2024
Sprint-2	Data Preprocessing	USN-4	As a user, I In data preprocessing for toxic comment classification, vectorizing involves transforming text data into numerical representations for machine learning models	3	Medium	ABBINENI BHUMIKA DADI ABHINAY	24/10/2024	26/10/2024

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members	Sprint Start Date	Sprint End Date (Planned)
Sprint-3	Model Building& Model Selection	USN-5	As a user, I can select Logistic regression is chosen for toxic comment classification on social media due to its simplicity, interpretability, and effectiveness in binary classification tasks.	3	High	DHARLA POOJITHA ABBINENI BHUMIKA	27/10/2024	28/10/2024
Sprint-4	Model Training	USN-6	As a user, I can Training a logistic regression model on the preprocessed data . Evaluating the model's performance by using relevant metrics like accuracy_score, precision etc. Building a multi-label classifier using Logistic Regression. For each target variable, the model is fitted and saved	3	Medium	DADI ABHINAY DIDDI AKSHAY	29/10/2024	1/11/2024
Sprint-5	Creating and Generating Submission file	USN-7	As a user, I can create and generate a submission file for toxic comment classification, you compile your model's predictions into the required CSV format and save the trained model using pickle.dump for future use	3	High	ABBINENI BHUMIKA DHARLA POOJITHA	2/11/2024	4/11/2024
Sprint-6	Application Building	USF-9	As a user, In building a Flask app for toxic comment classification, you create API endpoints to accept text input, process it through your trained	4	High	DADI ABHINAY	5/11/2024	7/11/2024

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members	Sprint Start Date	Sprint End Date (Planned)
			model, and return the prediction results					
Sprint-6	Model Development	USF-10	To build an HTML page for toxic comment classification on social media, as a user, you design a web interface to input comments, integrate the model for prediction, and display the results	4	Medium	DADI ABHINAY	8/11/2024	10/11/2024
Sprint-6	Model Development	USF-11	As a user ,I can Execute the python code and after the module is running, open the localhost page and give the text to be predicted or tested.	3	Medium	DADI ABHINAY	11/11/2024	13/11/2024
Sprint-6	Project Report	USN-12	Reporting the project	4	Medium	DADI ABHINAY ABBINENI BHUMIKA DHARLA POOJITHA DIDDI AKSHAY	14/11/2024	15/11/2024