

## Project Planning Phase

### Project Planning Template (Product Backlog, Sprint Planning, Stories, Story points)

Date	24 October 2022
Team ID	PNT2022TMID38776
Project Name	Emerging Methods for Early Detection of Forest Fires

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

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members
Sprint-1	DATA COLLECTION	USN-1	Data collected by sensors aboard orbiting satellites, carried aboard aircraft, or installed on the ground provide a wealth of data that can be used to assess conditions before a burn and track the movement of a wildfire in near real-time.	1	High	Vishwanadhani G Chitra S Preetha R Sowmiya M
Sprint-1	IMAGE PREPROCESSING	USN-2	Image processing-Image processing technique automatically detect forest fires around the world by using infrared(IR) images sourced from satellites and CNN used for image recognition and tasks that involve the processing of pixel data.	2	Medium	Vishwanadhani G Chitra S Preetha R Sowmiya M
Sprint-2	TRAINING AND TESTING	USN-3	The model is trained for detecting the fire by training with real time work and the testing is done according the accuracy of the model	2	High	Vishwanadhani G Chitra S Preetha R Sowmiya M

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members
Sprint-3	REVIEWING THE MODEL	USN-4	The main task is to check that the model is efficient to work in real time to ensure there is no error in the model	3	Medium	Vishwanadhani G Chitra S Preetha R Sowmiya M
Sprint-4	IMPLEMENTATION	USN-5	After completing every step the model is implemented on the forest and the quick responses is collected from forest organization	3	High	Vishwanadhani G Chitra S Preetha R Sowmiya M

#### Project Tracker, Velocity & Burndown Chart:

Sprint	Total Story Points	Duration	Sprint Start Date	Sprint End Date (Planned)	Story Points Completed (as on Planned End Date)	Sprint Release Date (Actual)
Sprint-1	20	6 Days	24 Oct 2022	29 Oct 2022	20	29 Oct 2022
Sprint-2	20	6 Days	31 Oct 2022	05 Nov 2022	20	05 Nov 2022
Sprint-3	20	6 Days	07 Nov 2022	12 Nov 2022	20	12 Nov 2022
Sprint-4	20	6 Days	14 Nov 2022	19 Nov 2022	20	19 Nov 2022

**Velocity:**

Imagine we have a 10-day sprint duration, and the velocity of the team is 20 (points per sprint). Let's calculate the team's average velocity (AV) per iteration unit (story points per day)

$$AV = \frac{\textit{sprint duration}}{\textit{velocity}} = 6/20 = 0.3$$

