

Project Planning Phase

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

Date	20 October 2022
Team ID	PNT2022TMID14814
Project Name	Signs with Smart connectivity for Better Road Safety
Maximum Marks	8 Marks

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

Use the below template to create product backlog and sprint schedule

Sprint	Functional Requirement (Epic)	User Story / Task	Story Points	Priority	Team Members
Sprint-1	Resources Initialization	Create and initialize accounts in various public APIs like OpenWeatherMap API.	1	LOW	Ajai Balaji P Dheepak Kumar A S Vamsi Krishna D Gowshik Ram S
Sprint-1	Local Server/Software Run	Write a python program that outputs results given the inputs like weather and location.	1	MEDIUM	Ajai Balaji P Dheepak Kumar A S Vamsi Krishna D Gowshik Ram S
Sprint-2	Push the server/software to cloud	Push the code from Sprint 1 to cloud so it can be accessed from anywhere.	2	MEDIUM	Ajai Balaji P Dheepak Kumar A S Vamsi Krishna D Gowshik Ram S
Sprint-3	Hardware Initialization	Integrate the hardware to be able to access the cloud functions and provide inputs to the same.	2	HIGH	Ajai Balaji P Dheepak Kumar A S Vamsi Krishna D Gowshik Ram S
Sprint-4	UI/UX Optimization & Debugging	Optimize all the shortcomings and provide better user experience.	2	LOW	Ajai Balaji P Dheepak Kumar A S Vamsi Krishna D Gowshik Ram S

Project Tracker, Velocity & Burndown Chart: (4 Marks)

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	15 Nov 2022
Sprint-2	20	6 Days	31 Oct 2022	05 Nov 2022	20	15 Nov 2022
Sprint-3	20	6 Days	07 Nov 2022	12 Nov 2022	20	15 Nov 2022
Sprint-4	20	6 Days	14 Nov 2022	19 Nov 2022	20	15 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)

$$AV = \frac{\text{sprint duration}}{\text{velocity}} = \frac{20}{10} = 2$$

Burndown Chart:

A burn down chart is a graphical representation of work left to do versus time. It is often used in agile software development methodologies such as Scrum. However, burn down charts can be applied to any project containing measurable progress over time.

Burndown Chart:

