

Project Planning Phase

Project Planning (Product Backlog, Sprint Planning, Stories, Storypoints)

Date	18October 2022
Team ID	PNT2022TMID46724
Project Name	SmartFarmer - IoT Enabled Smart Farming Application
Maximum Marks	8 Marks

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	Simulator	USN-1	Connect Sensors and Arduinio with Python code.	2	High	Abimaneu Jayakumar
Sprint-2	Software	USN-2	IBM Watson IoT platform, Workflows for IoT scenarios using Node-red.	2	High	Abimaneu Jayakumar Kabilan Karikalan Mathivanan
Sprint-3	MIT App inverter	USN-3	IBM Watson IoT platform, Workflows for IoT scenarios using Node-red.	2	High	Kabilan Karikalan
Sprint-3	Dashboard	USN-4	To design the modules to test the total circuit and the software configurations of IBM IoT Platform and the Node-Red service.	2	High	Abimaneu Jayakumar Kabilan Karikalan
Sprint-4	Web UI	USN-5	To allows the user to interact with content or software running on a remote server through a Web browser	2	High	Abimaneu Jayakumar Kabilan Karikalan

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

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

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.

