

PROJECT PLANNING PHASE

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

Date	2 November 2022
Team ID	PNT2022TMID34531
Project Name	IoT Based Smart Crop Protection System for Agriculture
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	Registration	USN-1	User can register for the application by entering email, password, and confirming password in mobile app.	8	High	Nivedha M.S, Dafni Leenel D.L
Sprint-1		USN-2	User will receive confirmation email once registered for the application.	13	Medium	Adalin V, Jina J.S
Sprint-2	Login	USN-3	User can access the mobile application by entering email and Password.	10	High	Divya V, Nivedha M.S.

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members
Sprint-2	Technical support team	USN-4	User can contact and get the support from technical assistant team whenever there is issue in IOT system.	2	Medium	Dafni Leenel N.L, Adalin V
Sprint-2	Security	USN-5	User data is secured and end-to-end encrypted with password-based system.	13	High	Jina J.S, Divya V
Sprint-3	Service assistant	USN-6	User can get service availability for the entire smart system periodically.	5	Medium	Nivedha M.S, Adalin V
Sprint-3	Service assistant	USN-7	User can get immediate response from the service assistant about functionality of the system.	5	Low	Dafni Leenel D.L, Jina J.S
Sprint-3	Dashboard	USN-8	User can detect whether any animal is in the field or not.	5	Medium	Adalin V, Divya V.
Sprint-3		USN-9	User can view the sensor output that is monitored in the field.	5	High	Nivedha M.S, Jina J.S
Sprint-4		USN-10	User can able to control and monitor the field manually depending upon the data report shown (sensor output value).	5	Medium	Divya V, Dafni Leenel D.L

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members
Sprint-4	Controls	USN-11	User can able to get alert notification when threat is detected.	5	Low	Nivedha M.S, Dafni Leenel N.L
Sprint-4	Controls	USN-12	User can able to turn on the motor pump / buzzer/Light system to overcome threats in field.	5	High	Adalin V, Jina J.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	1Nov 2022
Sprint-2	20	6 Days	31 Oct 2022	05 Nov 2022	20	7 Nov 2022
Sprint-3	20	6 Days	07 Nov 2022	12 Nov 2022	20	13 Nov 2022
Sprint-4	20	6 Days	14 Nov 2022	19 Nov 2022	20	19 Nov 2022

VELOCITY:

$$AV = \frac{\textit{sprint duration}}{\textit{velocity}} = \frac{20}{6} = 3.333$$

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.

