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

Date	16 October 2022
Team ID	PNT2022TMID53631
Project Name	Smart Farmer – IOT Enabled Smart Farming Application
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 Number	User Story / Task	Story Points	Priority	Team Members
Sprint-1	Configuration	USN-1	Creating account in – IBM Cloud, IBM Watson, Node-Red, MIT App Inventor	4	High	Mahalakshmi M M, Radha G, Rithikaa K, Pavithra S
Sprint-1	Simulation	USN-2	Connecting the circuit consisting of Node MCU and the sensors and simulating it in Wokwi.	3	High	Mahalakshmi M M, Radha G, Rithikaa K, Pavithra S
Sprint-2	Connect Wokwi and IBM Watson.	USN-3	Connection is established between IBM Watson and Wokwi through the Mqtt protocol.	5	Medium	Mahalakshmi M M, Radha G, Rithikaa K, Pavithra S
Sprint-2	Sending data from Wokwi to IBM Watson	USN-4	Sensor values are sent to IBM Watson	4	High	Mahalakshmi M M, Radha G, Rithikaa K, Pavithra S
Sprint-3	Sending data from IBM Watson to Node-Red	USN-6	Publish data from IBM Watson to Node-Red	3	High	Mahalakshmi M M, Radha G, Rithikaa K, Pavithra S
Sprint-4	Sending data from Node-Red to MIT App Inventor	USN-7	The user can monitor the field conditions.	3	High	Mahalakshmi M M, Radha G, Rithikaa K, Pavithra 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	7	6 Days	24 Oct 2022	29 Oct 2022	7	30 Oct 2022
Sprint-2	8	6 Days	31 Oct 2022	05 Nov 2022	8	08 Nov 2022
Sprint-3	2	6 Days	07 Nov 2022	12 Nov 2022		14 Nov 2022
Sprint-4	3	6 Days	14 Nov 2022	19 Nov 2022		18-19 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)

Total Sprint Points = 21

Total Sprint = 7

Average Velocity = 21/7 = 3

#### **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.

