Project Planning Phase

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

Date	18 October 2022
Team ID	PNT2022TMID35923
Project Name	Hazardous area monitoring for industrial plant powered by IOT
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	Registration	USN-1	As a user, I can register for the application by entering my email, and password, and confirming my password.	10	Medium	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha
Sprint-1	IBM Cloud	USN-2	As a developer we will create a database to store the sensor data	10	Medium	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha
Sprint-2	Development of python script	USN-3	As a user I can set the threshold values & parameters for the sensors	10	High	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha
Sprint-2		USN-4	Continuous monitoring of sensors parameters to detect hazardous	10	High	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha
Sprint-3	Monitoring & Responding	USN-5	As a user, I can track the sensor parameter and store it in created database.	10	Medium	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha

Sprint-3		USN-6	As a developer, assigning responses to emergency alerts	10	Medium	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha
Sprint-4	Web application using Node Red Service	USN-7	Sending the extracted sensor reading from database to web application for displaying	10	High	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha
Sprint-4		USN-8	Alerting the user and industrial site controller regarding accidents if any	10	High	Soumya S Mahalakshmi P Kaaviya Varshini E Kampalle Vineetha

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	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

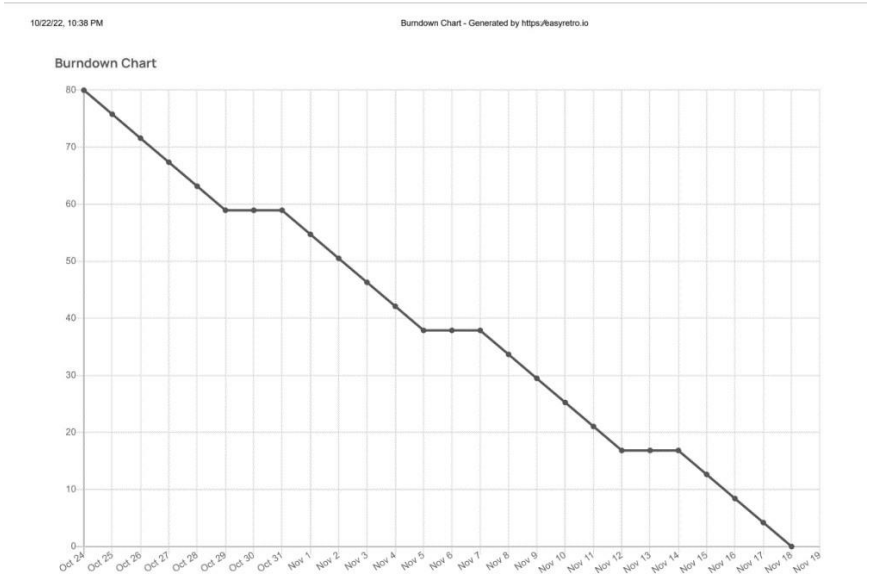
Velocity:

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)

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

AV=20/6=3.33points per day

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.

https://www.visual-paradigm.com/scrum/scrum-burndown-chart/

https://www.atlassian.com/agile/tutorials/burndown-charts

Reference:

https://www.atlassian.com/agile/project-management

https://www.atlassian.com/agile/tutorials/how-to-do-scrum-with-jira-software

https://www.atlassian.com/agile/tutorials/epics

https://www.atlassian.com/agile/tutorials/sprints

https://www.atlassian.com/agile/project-management/estimation

https://www.atlassian.com/agile/tutorials/burndown-charts