

Project Planning Phase

Date	18 October 2022
Team ID	PNT2022TMID35637
Project Name	Project - Detecting Parkinson's Disease Using Machine Learning
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	As a user, I can register for the application by entering my email, password, and confirming my password.	4	High	Vinayak Karthikeyan Sparsh Michael
Sprint-1	Registration Confirmation	USN-2	As a user, I will receive confirmation email once I have registered for the application	4	High	Vinayak Karthikeyan Sparsh Michael
Sprint-1	Login	USN-3	As a user, I can log into the application by entering email & password	4	High	Vinayak Karthikeyan Sparsh Michael
Sprint-1	Data Collection	USN-8	As an admin, I need to collect the data to train my machine learning model	4	High	Vinayak Karthikeyan Sparsh Michael
Sprint-2	User Input	USN-5	As a user, I can upload my files as input	2	High	Vinayak Karthikeyan Sparsh Michael

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members
Sprint-2	Data Preprocessing	USN-9	As an admin, I need to preprocess the data so that it is in a ready to use state for training and testing	8	Medium	Vinayak Karthikeyan Sparsh Michael
Sprint-2	Model Building	USN-10	As an admin, I need to use Machine Learning algorithms to train the model for the datasets previously collected	8	High	Vinayak Karthikeyan Sparsh Michael
Sprint-3	Model Evaluation	USN-11	As an admin, I need to test the model that I have developed	6	High	Vinayak Karthikeyan Sparsh Michael
Sprint-3	Deployment of Model and Web App	USN-12	As an admin, I need to integrate the Machine Learning model with the application and deploy the same	6	Medium	Vinayak Karthikeyan Sparsh Michael
Sprint-4	Information	USN-4	As a user, I can view information about Parkinson's Disease, its symptoms and treatment methods	3	Low	Vinayak Karthikeyan Sparsh Michael
Sprint-4	Results	USN-6	As a user, I can view my test results that are given after providing the input	6	Medium	Vinayak Karthikeyan Sparsh Michael
Sprint-4	Report Generation	USN-7	As a user, I can obtain my report	6	Low	Vinayak Karthikeyan Sparsh Michael

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	16	6 Days	24 Oct 2022	29 Oct 2022	16	29 Oct 2022
Sprint-2	18	6 Days	31 Oct 2022	05 Nov 2022	18	05 Nov 2022
Sprint-3	12	6 Days	07 Nov 2022	12 Nov 2022	12	12 Nov 2022
Sprint-4	15	6 Days	14 Nov 2022	19 Nov 2022	15	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)

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

Using the above formula. Calculating the AV for each sprint:

Sprint 1 - $16 / 6 = 2.667$

Sprint 2 - $18 / 6 = 3$

Sprint 3 - $12 / 6 = 2$

Sprint 4 - $15 / 6 = 2.5$

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.

