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

Date	6 JUNE 2025
Team ID	LTVIP2025TMID34696
Project Name	Enchanted Wings: Marvels Of Butterfly Species
Maximum Marks	5 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	Data Collection & Preprocessing	USN-1	As a developer, I want to collect butterfly images and labels from a dataset (CSV + image folders).	3	High	
Sprint-1	Data Collection & Preprocessing	USN-2	As a developer, I want to preprocess image data and load it efficiently using ImageDataGenerator.	3	High	
Sprint-2	Model Development	USN-3	As a data scientist, I want to build a butterfly classifier using VGG16 and Transfer Learning.	4	High	

Sprint	Functional Requirement (Epic)	User Story Number	User Story / Task	Story Points	Priority	Team Members
Sprint-2	Model Evaluation	USN-4	As a data scientist, I want to validate model accuracy using test data and classification metrics.	3	Medium	
Sprint-3	Web Deployment & API Integration	USN-5	As a user, I want to upload a butterfly image and view species prediction through a web interface.	4	High	
Sprint-3	Visualization & User Interface Integration	USN-6	As a developer, I want to display prediction results neatly on a Flask-based HTML page.	3	High	
Sprint-4	Visualization & Use Case Integration	USN-7	As a developer, I want to deploy the model, create APIs, and host the project for user access.	3	Medium	
Sprint-4	Visualization & Use Case Integration	USN-8	As a student, I want to provide biodiversity awareness through species information after prediction.	3	High	

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	6	5 Days	June 1,2025	June 5,2025	6	June 5,2025
Sprint-2	7	5 Days	June 1,2025	June 5,2025	7	June 5,2025
Sprint-3	7	5 Days	June 1,2025	June 5,2025	7	June 5,2025
Sprint-4	6	5 Days	June 1,2025	June 5,2025	6	June 5,2025

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)

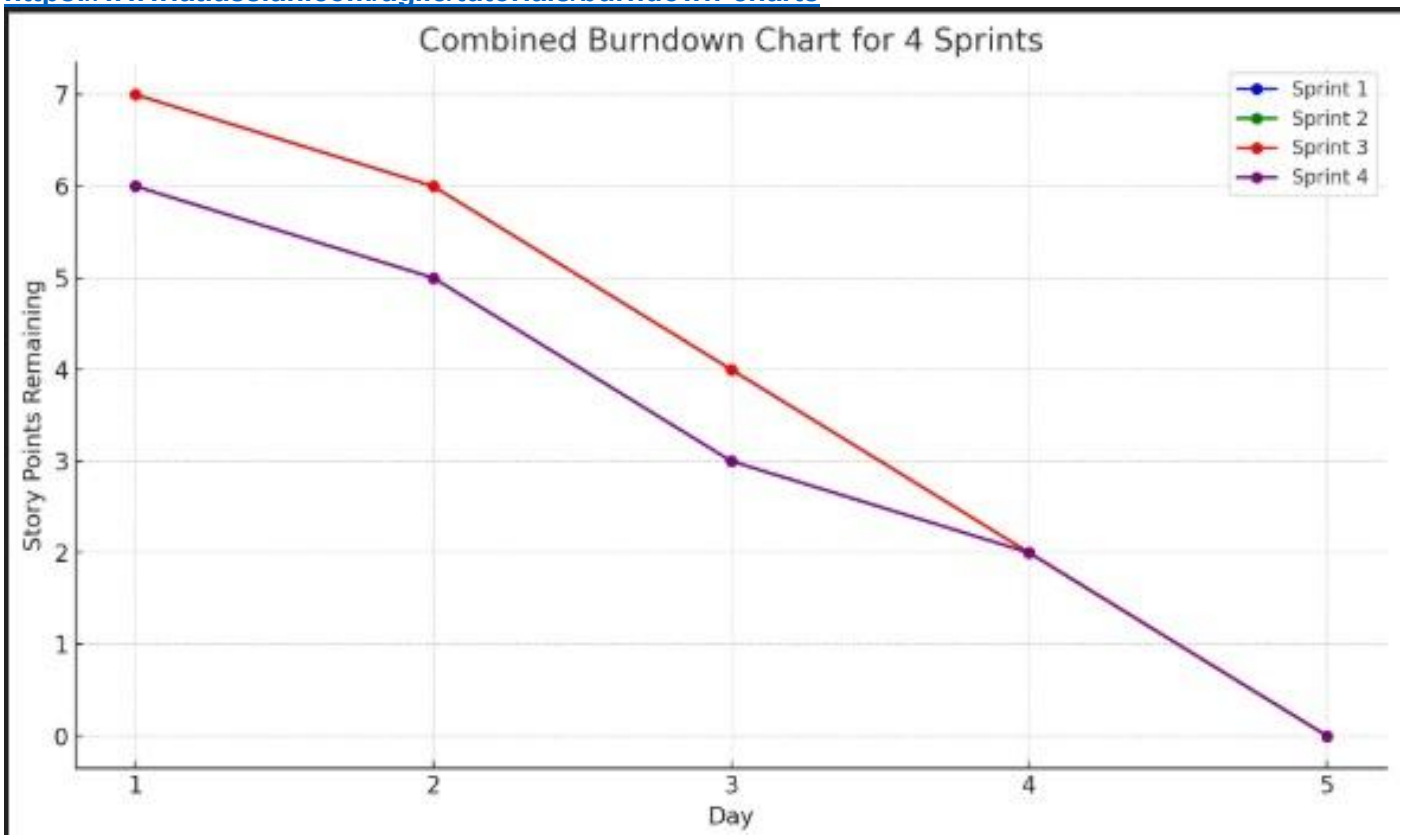
$$AV = \frac{sprint\ duration}{velocity} = \frac{20}{10} = 2$$

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:

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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