



# Agile Project Management

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How to deliver Projects successfully in Agile?

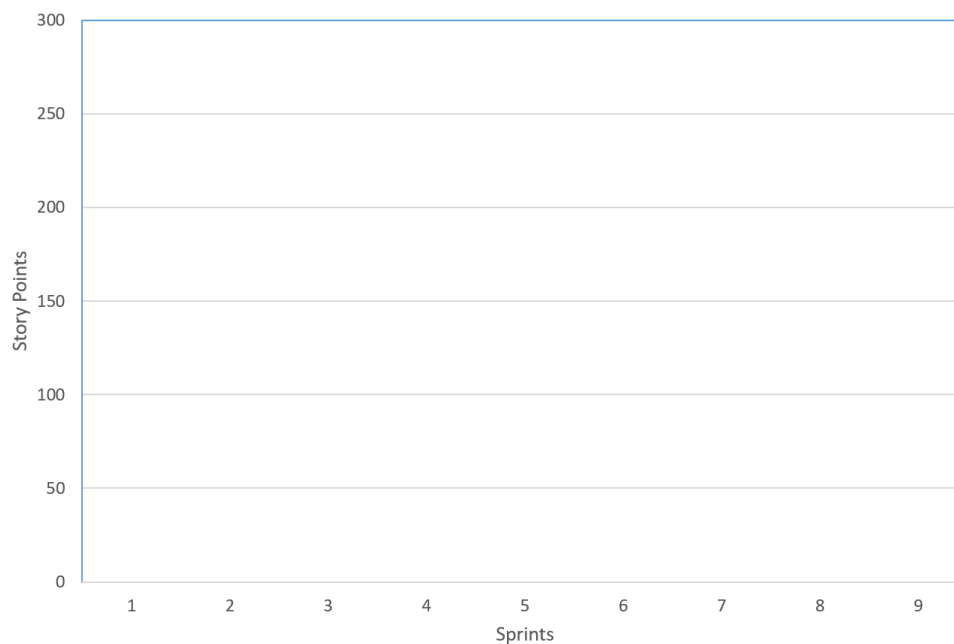
## Information Radiators

### Release Burndown Chart

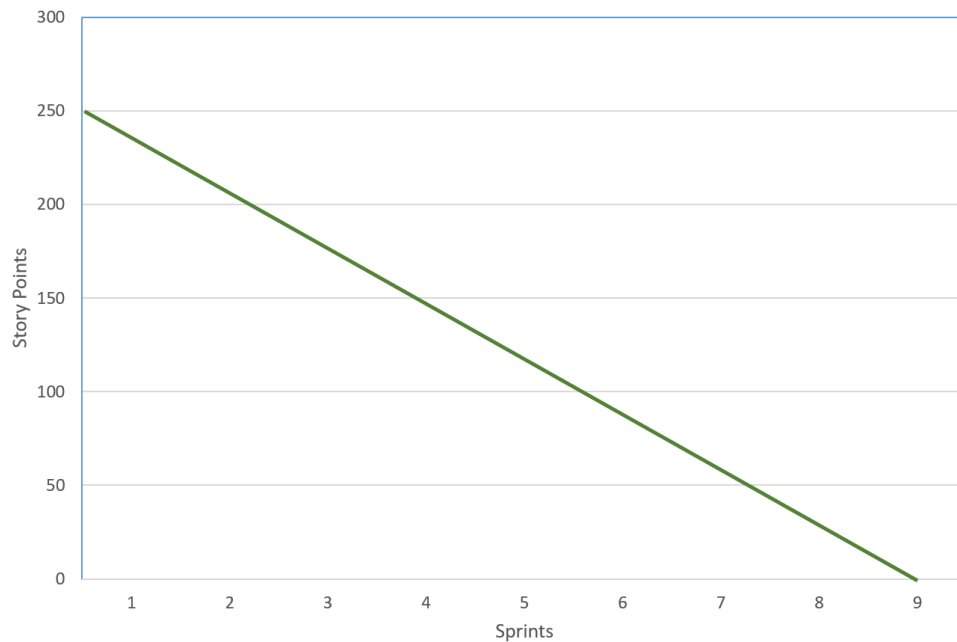
- Based on the velocity of the previously completed Sprints, the release burndown chart helps teams to anticipate the future.
- It is based on two factors: remaining effort concerning Product Backlog and time.

Let us see this with an illustrated example.

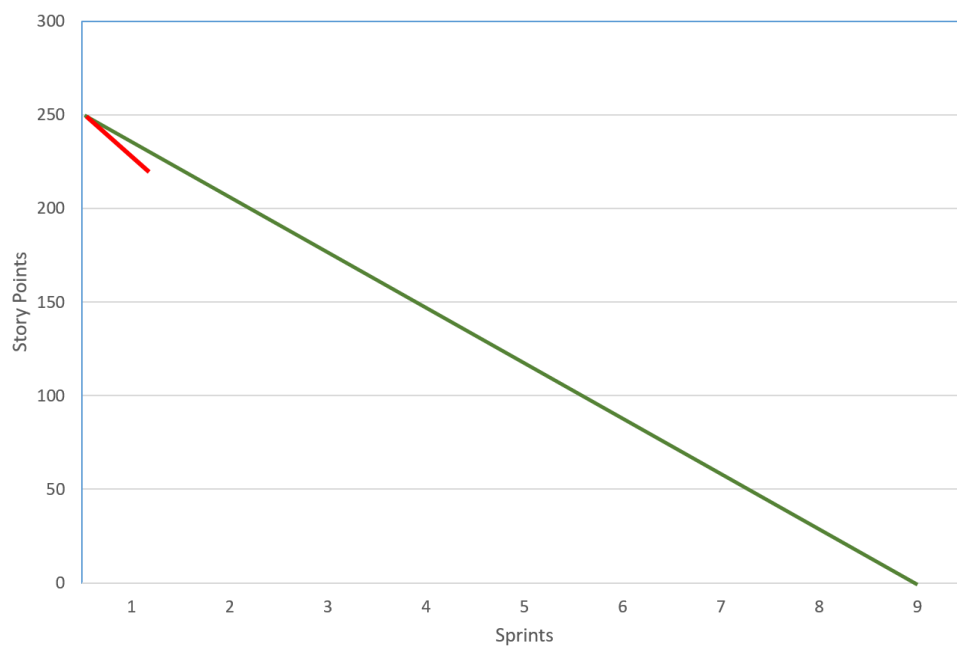
- It is planned that there would be about 9 Sprints.
- Product Backlog contains User Stories with a total of 250 Story Points.
- We put 9 Sprints on X Axis (horizontal) and 300 Story Points on Y Axis.



- In the illustration below, we **forecast** how the remaining effort or Story Points will be met across the 9 Sprints. This is indicated by the green line.

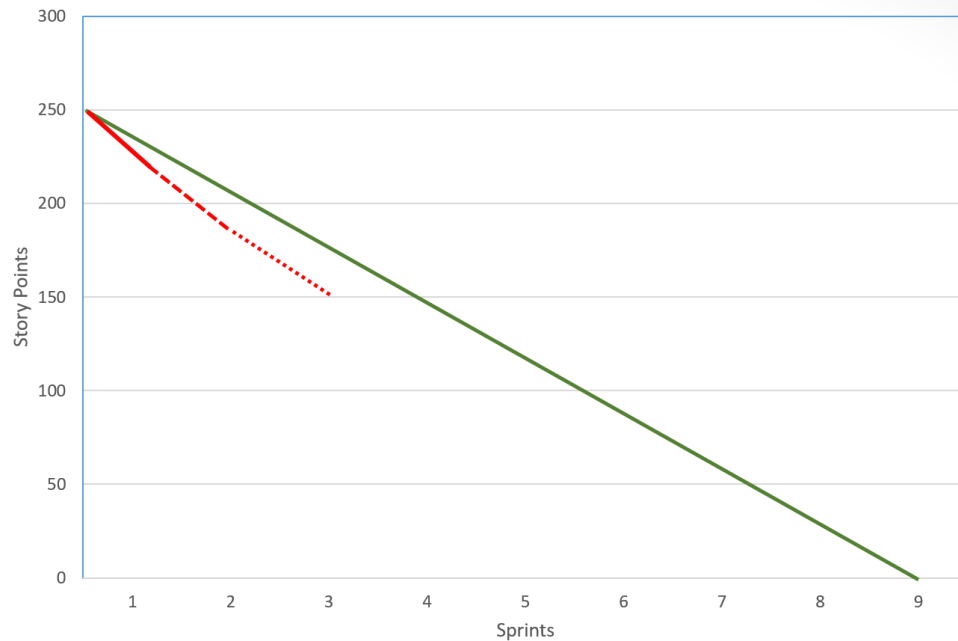


- Situation 1:** Let us say, the team gets a velocity of 30 for Sprint 1. This means the remaining effort or Story Points are  $250 - 30 = 220$ . This is illustrated below with the red line.

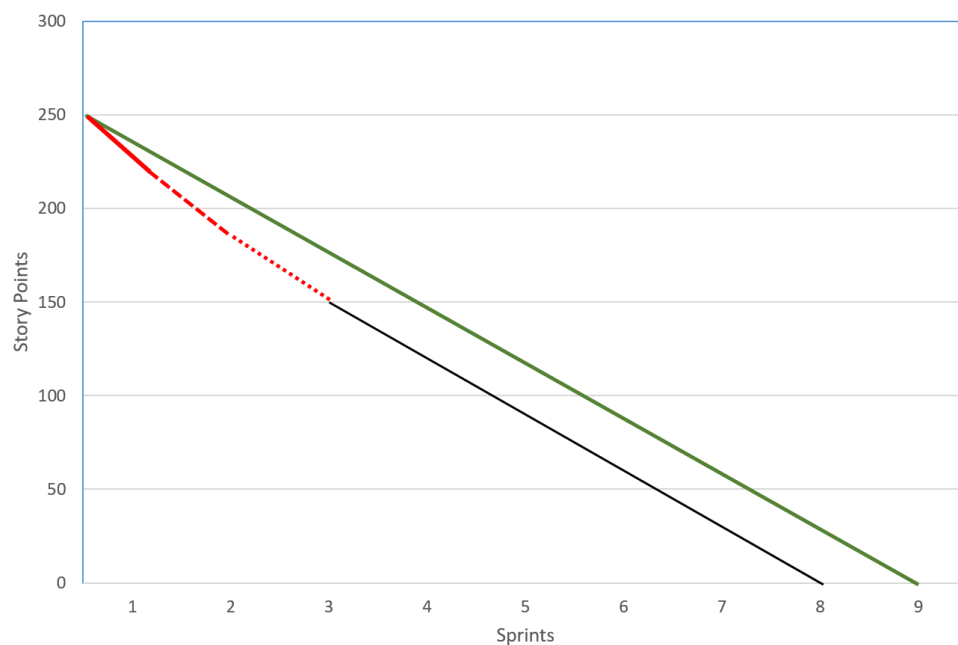


- In Sprint 2, the velocity is 40 (remaining Story Points are  $220 - 40 = 180$ ). In Sprint 3, the velocity is 30 (remaining Story Points are  $180 - 30 = 150$ ). This is illustrated

below with the red line. The red line is dotted to distinguish from the first one.

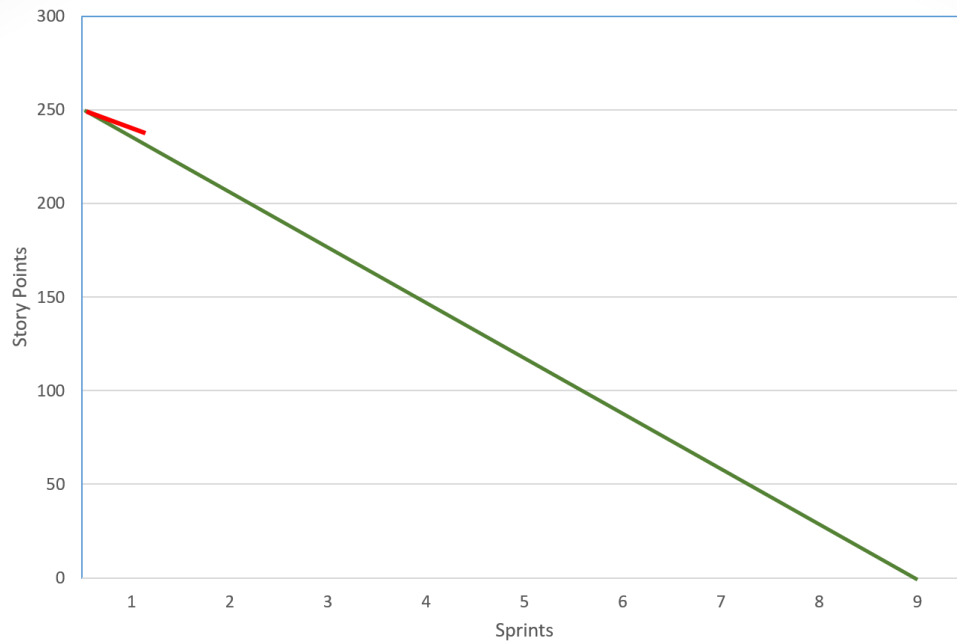


- ***It is evident from this trend that if we continue this way, we may complete the project before the ninth Sprint.*** This is illustrated below using the black line.

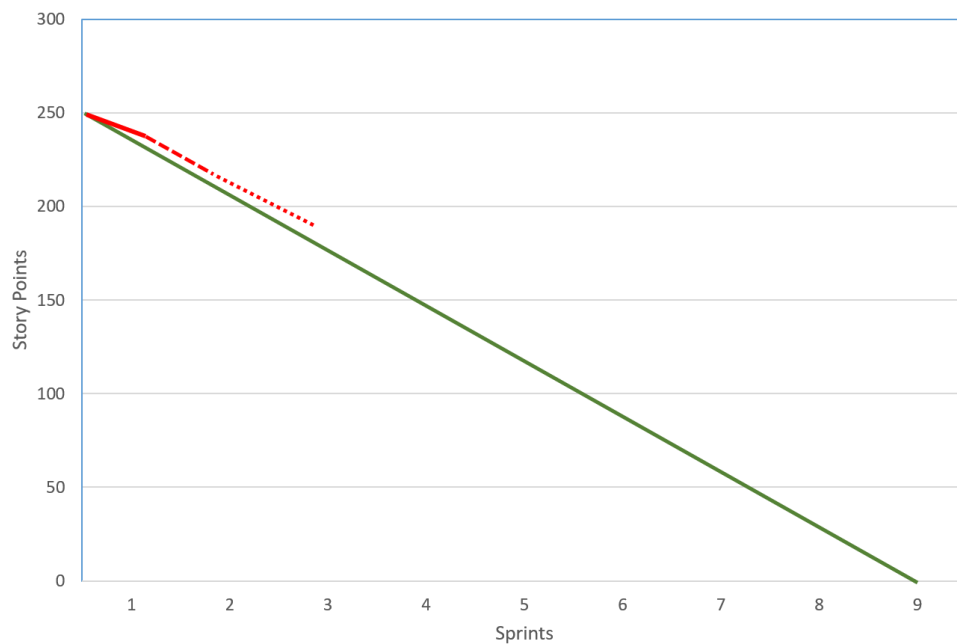


- **Situation 2:** Let us assume the team gets a velocity of 10 for Sprint 1. This means remaining effort or Story Points are  $250 - 10 = 240$ . This is illustrated below with

the red line.

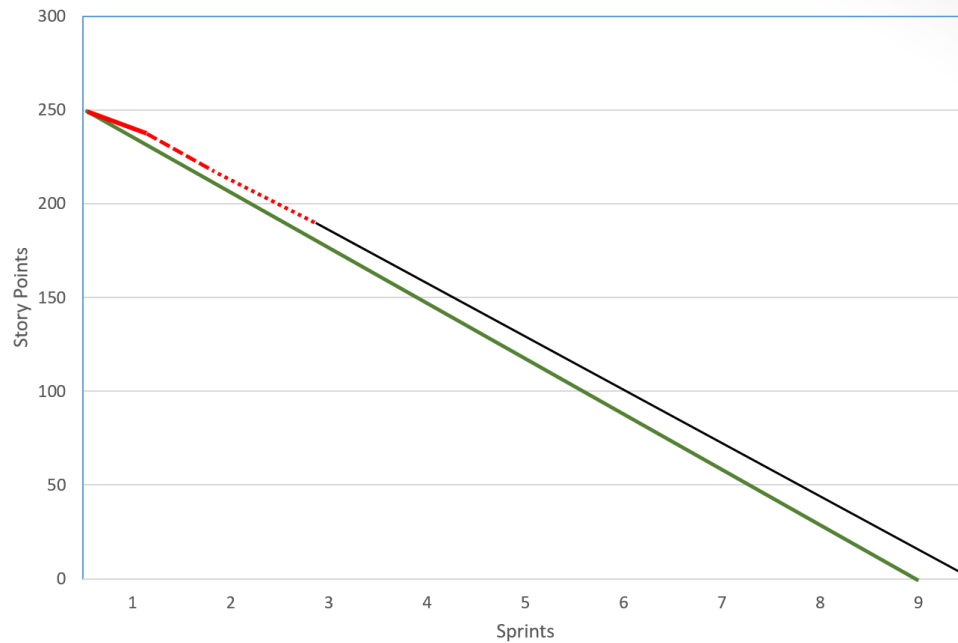


- Continuing here in Situation 2, let us assume the velocities for Sprint 2 is 20 (remaining Story Points are  $240 - 20 = 220$ ) and Sprint 3 is 30 (remaining Story Points are  $220 - 30 = 190$ ). This is illustrated below with the red line. The red line is dotted to distinguish from the first one.



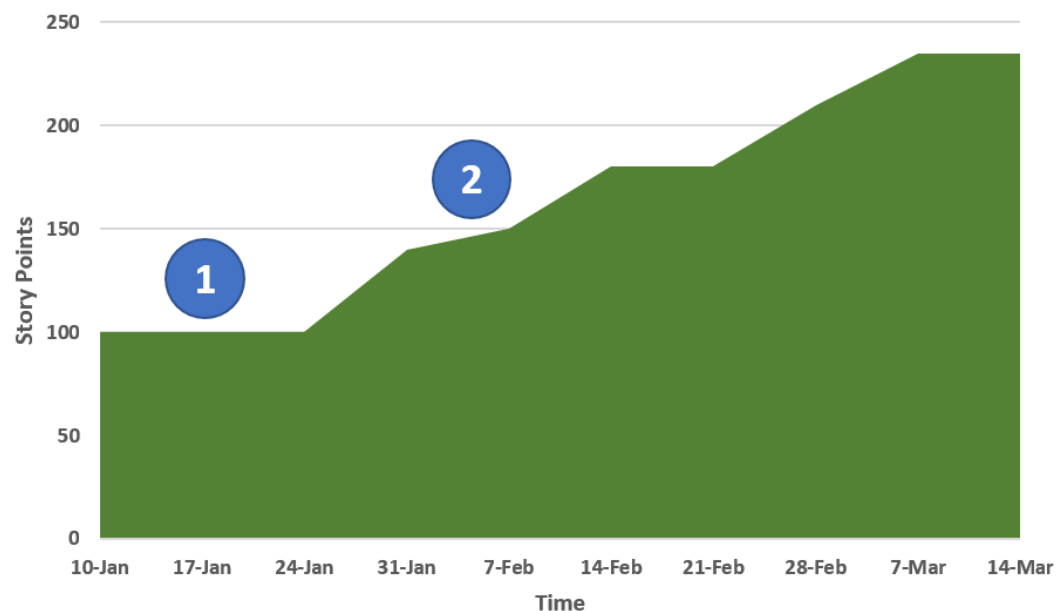
- It is evident from this trend that if we continue this way, we may complete the project after the ninth Sprint; that is, behind schedule.*** This is illustrated below

using the black line.



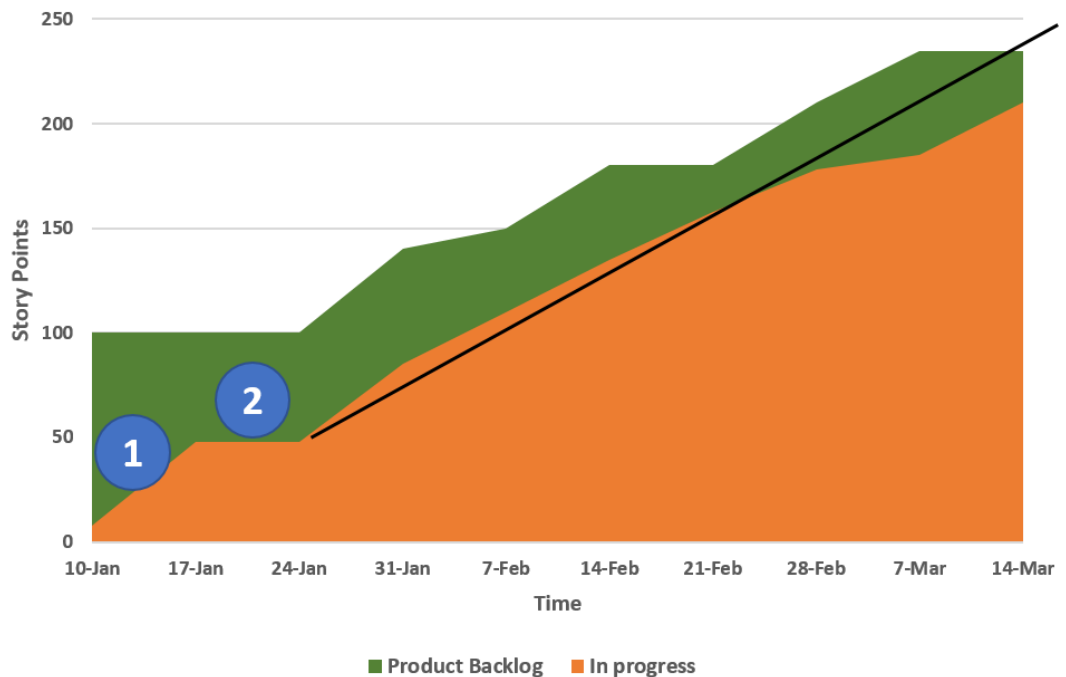
### Cumulative Flow Diagram

- A cumulative flow diagram, as its name suggests, displays cumulative values of requirements, work in progress, testing, and approved items over a time.
- Let us understand with the following illustrated example.
- In this example project, we have Story Points from Product Backlog items plotted over a timeframe.



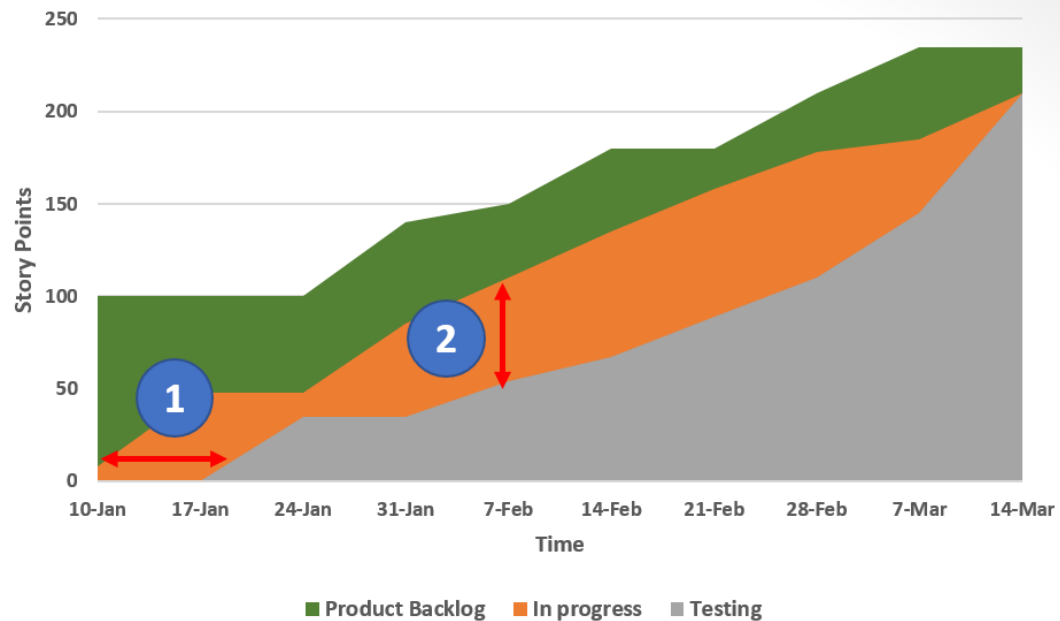
- **Indication 1:** From 10-Jan to 24-Jan, there were about 100 Story Points worth of User Stories on the Product Backlog.

- **Indication 2:** From 24-Jan to 14-Feb, some new User Stories were added to Product Backlog, so you will see the cumulative Story Point count going up.
- Let us assume, the team started working on these Story Points. On the same cumulative flow diagram, let us plot work in progress items.

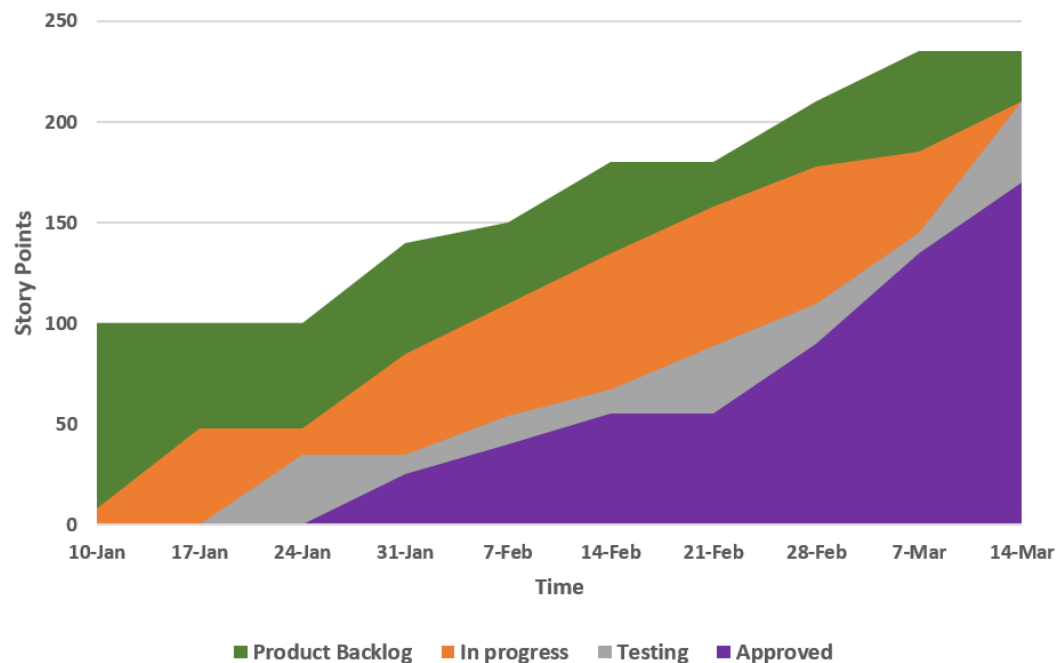


- **Indication 1:** The team started with about 8 Story Points on 10-Jan. Then on 17-Jan, the team started working on 50 Story Points.
- **Indication 2:** The team **did not** take up any new User Stories from 17-Jan to 24-Jan.
- The **Black line** shows the trend of work in progress. It doesn't come automatically in cumulative flow diagrams. It is drawn here to highlight how trends can be found out.

- In the next diagram, we see how User Stories undergo testing.



- **Indication 1:** This indicates the time delay between work-in-progress items and testing them. This is a form of waste and must be eliminated.
  - **Indication 2:** This indicates the gaps between work-in-progress items and testing. It shows testing is going slow or work-in-progress items are offered for testing quite late.
- Let us see approved items now.



- As we can see from 24-Jan, the Product Owner started approving Product Backlog items.



## Other Reports

- Other reports such as the ones below can be used in Scrum projects:
  - Resource Utilization Report
  - Defects Report
  - Velocity Charts
  - Status Reports
  - Gantt Charts
  - Milestone Charts