**Definition of Scrum**

Scrum (n): A framework within which people can address complex adaptive problems, while productively and creatively delivering products of the highest possible value.

Scrum is simple to understand, but difficult to master.

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**Scrum Values**

- **Openness**: Being open drives continuous improvement.
- **Focus**: Teams focus to deliver customer value incrementally.
- **Commitment**: Teams commit to goals and improvement.
- **Respect**: Accept & respect the strengths of different people.
- **Courage**: Be brave. Be honest. Embrace failure.
- **Commitment**: Teams commit to goals and improvement.

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**Scrum Roles**

- **The Product Owner** owns the Product Backlog as he/she has to maximize the ROI of the Product.
  - The Product Owner is responsible for expressing backlog items and prioritizing them.
  - The Product Owner decides on release dates and content.
  - The Product Owner discusses and agrees with Stakeholders what to do and why.
  - Collaborates with the Development Team on the details of the Product Backlog during the Sprint.

- **The Development Team** is a cross-functional team.
  - Every skill needed to create a potentially shippable product increment must be in the team.
  - The optimal size is between 3 and 9 members.
  - The Development Team delivers a potentially releasable Increment of a "Done" product at the end of each Sprint.
  - They are self-organizing. No one (not even the Scrum Master) tells the Development Team how to turn the Product Backlog into Increments of potentially releasable functionality.
  - Scrum recognizes no titles for Development Team members other than Developer, regardless of the work being performed by each person.

- **The Scrum Master** is responsible for ensuring Scrum is understood and enacted. Scrum Masters do this by ensuring that the Scrum Team adheres to Scrum theory, practices, and rules.
  - The Scrum Master is a servant-leader for the Scrum Team, supporting the Product Owner with managing the Product Backlog and coaches the team in self-organization and cross-functional collaboration.
  - Helps with removing impediments to the Development Team's progress.
  - The Scrum Master leads and coaches the organization in its Scrum adoption.

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**Scrum Artifacts**

- **The Product Backlog** is an ordered list of Product Backlog Items (PBIs) (e.g: MMF, user stories...).
  - The Product Backlog is an ordered list of requirements for changes to the product.
  - The highest prioritized items need to be more detailed.
  - The team needs to be able to estimate and test all of the Product Backlog Items.
  - The list of items is constantly evolving, changing and updating, the Product Owner is responsible to reflect the changes in the Product Backlog.

- **The Sprint Backlog** is an ordered list selected by the Development Team for delivery in the sprint, built from the top items in the Product Backlog.
  - Only the Development Team can change its Sprint Backlog during a Sprint. This happens throughout the Sprint and in particular in the Daily Scrum when necessary changes are understood.
  - The Dev. Team tracks this total work remaining at least for every Daily Scrum to project the likelihood of achieving the Sprint Goal.

- **The Increment** is the sum of all the Product Backlog items completed during a Sprint and the value of the increments of all previous Sprints.
  - An Increment must meet the Scrum Team's Definition of "Done".
  - It must be in useable condition regardless of whether the Product Owner decides to actually release it.
  - Artifact Transparency is crucial in Scrum. Decisions to optimize value and control risk are made based on the perceived state of the artifacts.
  - The Scrum Master must work with the Scrum Team, and other involved parties to make sure the artifacts are transparent and understood.

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**Scrum Events**

- **The Sprint Planning** is a two part meeting time-boxed to a maximum 8 hours for a 1 month Sprint.
  - Part 1: The Development Team creates a forecast of the items that will be developed in the Sprint.
  - The Scrum Team crafts a Sprint Goal for the Sprint through the implementation of the Product Backlog.
  - Part 2: The items in the Sprint Backlog are broken down into units of work of one day or less by the Development Team.

- **The Daily Scrum** is a daily 15-minute time-boxed event for the Development Team to synchronize activities and create a plan for the next 24 hours.
  - This is done by inspecting the work since the last Daily Scrum and forecasting the work that could be done before the next one.

- **The Sprint Review** is held at the end of the Sprint to inspect the product increment.
  - During the Sprint Review, the Scrum Team and stakeholders review what was done in the Sprint.
  - The result of the Sprint Review is a revised Product Backlog that defines the probable Product Backlog items for the next Sprint.

- **The Sprint Retrospective** occurs after the Sprint Review and prior to the next Sprint Planning.
  - The purpose is to inspect the process of the last Sprint and identify potential improvements.
  - The Scrum Team creates a plan to incorporate these improvements into the way they do their work.

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- **The Sprint Team regularly does Product Backlog Refinement** together with the stakeholders to add detail, estimates, and order to items in the Product Backlog.
  - The Scrum Team decides how and when refinement is done.
  - Product Backlog Refinement usually consumes no more than 10% of the capacity of the Development Team.
Scrum in a Nutshell

Activities:
The Sprint
Sprint planning
Daily Scrum
Sprint review
Retrospective
Backlog refinement

Products & Results:
Product Backlog
Sprint Backlog
Visible Progress
Product increment
Definition of Done

Roles:
ScrumMaster
Product Owner
Development Team

STAKEHOLDERS:
PO

Activities:

1 - 4 Weeks

15min.

PBI
TO DO
DOING
DONE

PBI
1
1a
1b

PBI
2
2a
2b

PBI
3
3a
3b

PBI
4

PBI
5

PBI
6

PBI
5a
PBI
5b
PBI
6a
PBI
6b

PBI
5c
PBI
6c

STAKEHOLDERS:

QUALITY

CHECKLIST

Check
Check
Check
Check

Products:

Product Backlog
Sprint Backlog
Visible Progress
Product increment
Definition of Done

Roles:
ScrumMaster
Product Owner
Development Team

Activities: