**SAFe**

**Scaled Agile Framework Environment**

Hi everyone, my name is Peter Tran and today I will be introducing the Scaled Agile Framework Environment or SAFe for short.

As stated in the book “Leading Change” by John P Kotter, an internationally recognised and known speaker on Agile:

“The solution is not to trash what we know and start over but instead to reintroduce, in an organic way, a second system – one which would be familiar to most successful entrepreneurs.”

SAFe is one of the largest growing frameworks intended to scale agile for large organisations and seeks to address the issues of typical agile methodologies when expanding beyond a single team.

Some companies that uses SAFe currently are:

Intel, woolworths, cisco, boeing, to name a few

Some assumptions before you watch this video is that you have a basic understanding of:

* Scrum
* Kanban
* Tickets

The Scaled Agile Framework Environment is a template or set of organisational and workflow patterns for scaling agile principles to large organisation and teams. Today I will be talking mostly about the latest iteration of SAFe which is 5.1, however the principles and ideas throughout all the versions are similar.

SAFe is formed around three central process guidelines:

1. Agile Software Development
2. Lean Product Development
3. Systems thinking

These topics wont be covered in the presentation as it is out of scope.

Similarly, to scrum, teams are cross functional, featuring both developers and testers to deliver features every iteration, which is usually 2 weeks. SAFe advocates for teams of 5 to 11 members who write, build and test tasks. With every team usually having an additional product owner and scrum master.

The product owner represents the customer and guides the team on what to work on. Taking from Scrum, the product owner is responsible for the full product life-cycle and is in charge of the team’s backlog.

The scrum master on the other hand, is like the coach of the team, and guides the team to follow SAFe principle.

Teams usually either use scrum or Kanban methodology.

All feature teams hold daily stand ups which is facilitated by the scrum master, where they talk about how they are progressing in the iteration and if there are any blocks to their work.

Before each iteration, teams hold an iteration planning event where they discuss each team members available throughout the sprint and what they will achieve by sorting user stories.

At the end of the iteration, teams hold an iteration demonstration where each team member presents what they did throughout the iteration to each other and the whole team’s accomplishment to the product owner.

Team will also hold an iteration retrospective, where they talk about what they did good and how to improve for the next iteration.

With large enterprises and organisation, there can be many teams and together they form the Agile Release Train. The whole Agile Release Train and every team within works following a Program Increment which usually consists of 5 iterations.

The Program Increment follows similar events and resembles an iteration but on a larger scale, whereby teams at the start get together to plan the whole increment in an event called the Program Increment Planning. There also is a Release Train Engineer who acts similar to the Scrum Master for team, but instead they guide the whole Agile Release Train, ensuring that it runs smoothly and remains on track. They are also responsible for facilitating the Program Increment Planning event.

In the Agile Release Train, there is also Project Manager that provides the backlog and overall vision of the project and there is the system architect who provides architectural guidance. The Product manager is responsible for providing most of the content for the team backlogs.

At the end of the Project Increment, everyone in the Agile Release Train conducts a demonstration to illustrate what every system has done throughout the increment.

Similarly with an iteration, at the end, all teams will also get together to perform a retrospective called an Inspect and Adapt event.

Throughout the Program Increment, all the Scrum masters will also hold biweekly meetings with the release train engineer to ensure that everything is progressing smoothly.

The final iteration is called Innovation and Planning Iteration or IP Iteration for short. The innovation part is time for teams to work on whatever they want so long as the work reflects the mission of the company. Usually, companies host a hackathon to often drives innovation.

The planning part is important to plan the next Program increment.

After doing something interviews with key team members at Boeing, it was found that while SAFe is currently one of the most popular approaches to scaling agile, one negative of the framework that is often criticised for being too hierarchical and inflexible.

References:

1. <https://www.scaledagileframework.com/>
2. <https://www.scaledagileframework.com/innovation-and-planning-iteration/>

Core values of SAFe are:

1. Alignment

Cadence is doing things regularly. Alignment is the principle where companies put planning and reflection in place at all levels.

1. Built in quality
2. Transparency
3. Program Execution
4. Leadership

Investigation:

From interviews with industry leaders and personal experience applying SAFe in a professional environment:

* SAFe advocates for full time scrum masters, however we found it difficult to create a full time role
* Scrum master usually needs to be very knowledgeable about the team, however this takes away capacity from the team
* SAFe is meant to be flexible, however at times it is very rigid and inflexible.
* SAFe also advocates for alignment, basically there is transparency across the organisation and everyone understands the current state and future goals of the business. The aim of this is information is free flowing and
* SAFe is too big of change that it would require a lot of courage from the leadership team