

# Organisations Scaling Agile in Denmark 2023

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#### Introduction

In 2001 when the Agile Manifesto was formulated, I was in the middle of a project where strict goals and a waterproof development plan were the requirements for funding. Somehow, I got the funding for my loosely defined continuous improvement plan, where any conclusion from one phase should dictate the actions planned for the next phase. Maybe therefore the agile principles were not something to be learnt; but merely a way to legitimate common sense.

Only few years later (2005), I found that something needed to be added to handle the extra 'something' when products grow to a size where they are handled by 3+ teams. Common sense was the guiding line again. Since then, I have been monitoring the areas of agile 'for a larger context' which eventually led to the first paper on organisations scaling agile in Denmark, in 2019.

But is scaling agile still relevant, would some ask. Well, knowing how the history evolved with Covid19, Russia-Ukraine conflict, global energy crisis etc. makes this series of papers even more interesting, and it covers both before, during and eventually after these historically landmarks. And you are about to read whether that seemed to have an impact on adoption of agile at scale in Denmark.



Knowing what I know not, and you are about to read, then it's fair to conclude that the Danish scene for organisations scaling agile has not converged on neither number, members nor preferred framework. In fact, it has moved in more directions since last year.

We collected data for the survey from September to late early December 2023. We used the same questions and data collection method as for the 2019, 2020, 2021 and 2022 survey, to enable comparisons across the now five consecutive years.

I hope you find it worth reading.

And a big thank goes out to all the people delivering insights on their organisation and hints on other relevant organisations to include. Without you, this paper would not have been possible.

Thank you all!

### What is scaling agile

Scaling Agile or Agile at Scale are key concepts in this paper, but are they well-defined concepts? No, is the brief answer. So let's start be narrowing in on what is meant by these. Agile is synonym to adapt and may be described as 'having a quick resourceful and adaptable character'. Originally when agile was coined as a term, this was regarded as related to a group of people, a **team**.

Later the need for larger groups of people that could adapt together emerged, and with this the notion of **team of teams**. The needs of teams adapting and the needs of team-of-teams adapting are different as each team on the team-of-teams face similar challenges as the teams adapting, plus the challenges emerging from the between-teams interactions.

So, for that reason, it makes sense to look at the two cases separately (or at least, know which one you are considering).

We could call it team-level agile and large-scale agile, to reflect that the latter relates to a situation with more than 3 teams/ groups of people with a need for coordinated adapting. But for here, we landed on the term *scaling agile*.

## Frameworks for Scaling Agile

Agile is about being able to adapt and able to change when something changes in purpose, values, or context. Or when we want to achieve a different outcome compared to what we already have. International situations related to Israel, Ukraine, climate change, the recent Covid19 and high inflation are great examples of 'something changed'. The lowered profit margin following the inflation rates are an example of 'we want a different outcome' so that we can remain in operation.

Scaling agile is to have the adaptability at larger levels, eg organisational level (or division level) which may materialise as accelerate/decelerate on a product area beyond where the team(s) are usually engaged with it, or by being able to engage with obstacles in a new way and/or new speed. In some cases, scaling agile is not about doing stuff faster. It's about being able to deliver stuff at all.

There are basically three ways to scale an agile organisation<sup>2</sup>:

Apply a well-defined framework for scaling agile

<sup>&</sup>lt;sup>1</sup> Mirriam-Webster dictionary

<sup>&</sup>lt;sup>2</sup> Descaling the situation/ product/ organisation/ system is an alternative approach to the real challenge to be handled. Although it is desired, this paper and overview takes off from where any kind of scaling has been chosen.



- Define your own structure for scaling agile, -or
- Form a hybrid of the two.

A relevant step both before and during agile scaling is the seemingly simple alternative to *descale* rather than (or before) scaling. And seemingly simple as the complex organisations are where they are today, because of the steps made earlier. Had it been easy to descale, this most likely would have been done earlier, given the cost-reduction often involved.

The four major and well-defined frameworks for scaling agile are SAFe, Nexus, Scrum@Scale and LeSS. They are all well-defined with detailed descriptions, applied elsewhere in practise and have a formal learning/ certification path. But additional frameworks/ concepts are also described and applied in and outside Denmark.<sup>3</sup>

<u>SAFe</u> (scaledagileframework.com) was the first of the scaling agile framework to be well-described and learning/ certifications programs. SAFe has a very clear focus on the organisation's overall level (solutions and release trains) and how overall priorities descends to manageable chunks at team level. SAFe is inspired by Lean Portfolio Management, where one objective is to have a lean enterprise with a clear description of roles and responsibilities. SAFe is not directly linked to neither Scrum nor Kanban, as teams are free chose their own operating structure although within boundaries (fixed iterations and teams within the larger cadence). However, SAFe is by many regarded as applying scrum or Kanban at the team level.

Scrum@Scale (scrumatscale.com) and Nexus (scrum.org/resources/nexus-guide) are both further developments of the well-known agile framework Scrum (scrum.org), and are formed around repeating the structures of Scrum at multiple levels of the organisation. Scrum@Scale has been developed by Jeff Sutherland (one of the two co-founders of Scrum) while Nexus was co-created by Ken Schwaber (the other of the two co-founders of Scrum). Effectively, they are both based on the condition that the structure that works for single teams, can work for teams of teams (2 levels), 3 levels and even all the way up to the portfolio level, although there are clear differences in how they seek to mitigate the higher levels.

LeSS (less.works) is the framework which put most emphasis on the complexity induced by bringing larger number of peoples together to work on the same thing. And therefore, LeSS is most insisting on *simplifying* rather that *adding to* an organisation. 'LeSS is more' or simplify the organisational complexity (descale), prior to scaling the organisation. Only when the amount of complexity, internal constraints and dependencies have been reduced, scaling should be added. LeSS also included scrum in the foundation.

<u>FAST</u> is a fairly new approach to making a larger group of persons collaborate along the agile principles, which Quinton (Ron) Quartel initiated. In brief, FAST operates around *flow* and *fluid teams* of T-shaped members with high autonomy. The Open Space-inspired FAST-meeting is the primary coordinating structure where the next cycle is arranged for goal, team membership, duration etc.

Further, a number of organisations has been inspired by the structure formerly applied at Spotify. That has not been described to the same extent as the above-mentioned frameworks, but a number of videos can be found e.g. on YouTube<sup>4</sup>.

<sup>&</sup>lt;sup>3</sup> DSDM, MVB, Crystal etc.

<sup>&</sup>lt;sup>4</sup> Two examples are <a href="https://www.youtube.com/watch?v=2FuYyX27GKk&ab">https://www.youtube.com/watch?v=2FuYyX27GKk&ab</a> channel=greg81805 and <a href="https://www.youtube.com/watch?v=Ddpm4IObKeA">https://www.youtube.com/watch?v=Ddpm4IObKeA</a>



The hybrids – which are combinations of frameworks and/or own developed structures - often combine one structure for the team level with one or more structures for the portfolio level. In some cases, different structures are applied for different divisions at the (team of) team level. The common denominator for these is that they are built around the context (people, product and business situation) they operate in. Therefore, none of these are identical nor can be directly transferred across organisations, although they generally share patterns.

In addition to these, we now see increased use of OKRs (Objectives and Key Results) to support the product visioning, backlog maturing and prioritisation. Further, we will not be surprised if we next year start seeing elements from the <u>UnFix</u> toolbox emerge, to further improve the local ways of working – or to challenge the habits in pursuit for smarter ways of working.

#### Data collection method

All data has been collected during the fall 2023 by means of LinkedIn, news media, Statistics Denmark (The National Bureau of Statistics), public presentations, www, and other public sources.

The same questions have been asked to all organisations and these are:

- 1. Name of organisation:
- 2. Which variant of scaling framework (or hybrid) is used:
- 3. Size of the scaling, i.e. number of people, teams, trains, tribes, guilds that currently work in the scaled agile setup:
- 4. Any other information on your way of working that may be relevant for other organisations to learn about

We have collected all answers and merged the data with data from other public sources.

We have reached out to far more than 100 pre-screened organisations which, has given a fine overview of the diversity of the agile environment in Denmark. In a few cases, data collection has not been feasible, wherefore these are not listed. We hope to see them reappearing on the list for 2024.

Some of the contacted organisations have actively chosen not to scale agile, or actively descale prior to/instead of scaling. This is both aligned with the recommendations from the LeSS framework, systems thinking and design and the fundamental principles laid out in <u>agile manifesto;</u> *Individuals* and interactions over processes and tools.

## Number of organisations scaling agile in Denmark

We have identified 49 Danish organisations scaling agile represented in this overview<sup>5</sup>. Of these 8 are brand new on the list, and some are re-entering the list.

Drilling down into the numbers, we see that if we combine the three largest domains, that is 33% (16) of the organisations scaling agile who operate within the financial and insurance domain, with the 15% (7) organisations in the IT domain, we continue to find that almost half of the organisations scaling agile are among the early adopting areas.

<sup>&</sup>lt;sup>5</sup> Further, we know of 10+ organisations scaling agile, who we were not able to retrieve confirmed data from before deadline.



Equally many scaling organisations (12%, 6) represents the Production domain and the Healthcare domain, which are not regarded as one of the early adopting areas. The public sector counts for every 10<sup>th</sup> organisation scaling agile, which in internationally perspective is quite high. In Denmark we see a drive in the public sector towards new ways of working which includes agile and scaling agile. The remaining part (18%) is combined of Retail (4), Transportation (3) and Energy (2). The numbers can be seen in Table 1 below.

Domain	Organisations (number)	
Retail	4	
Energy	2	
Financial	7	
Insurance	9	
Healthcare	6	
IT	7	
Public sector	5	
Production	6	
Transportation	3	
Total	49	

Table 1: Number of organisations scaling agile in Denmark by business domains

## The geographical distribution of organisations scaling agile in Denmark

When we talk about organisations scaling agile, it is natural to question whether this is only something relevant in a specific part of Denmark – or is widespread, more or less similar to the distribution of larger organisations in Denmark. So, let's dig further into the data and learn how the employees with this skill set are spread across the nation.

In order to scale agile, your organisation is most likely larger than 100 employees and often counted in thousands. Some of these organisations are placed in on more than one location in Denmark, but for the simplicity here, we count organisations only by the headquarters address.

Similar to the preceding years, we see that the organisations scaling agile are centred around the larger cities in Denmark. And 2023 shows a slightly stronger concentration around Copenhagen, with 71% (35) in the Capital Region. Combined we see more than 30 organisations located in *central* Copenhagen (excluding suburbs) and Aarhus<sup>6</sup> combined, that is, before the city area ends.

Every 10<sup>th</sup> organisation scaling agile is now in Southern Denmark Region, while the Zealand Region is represented by two organisations.

Similar to the previous years, we have not been able to identify an organisation scaling agile in the Northern Jutland Region, although the Northern Region is home for 6% of the organisations with 250+ employees in Denmark and 9% of the organisations with +50 employees. The distribution is illustrated in Figure 1 below.

<sup>&</sup>lt;sup>6</sup> Aarhus is Denmarks second largest city.



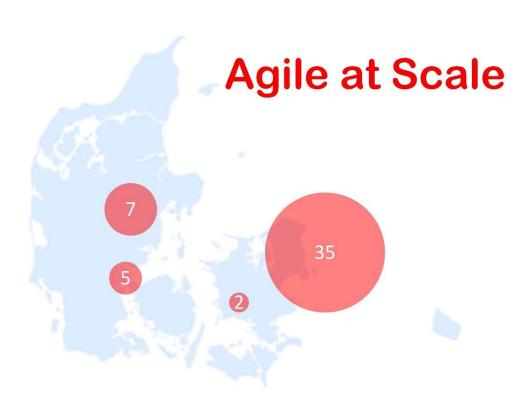


Figure 1: Geographical distribution of organisations scaling agile in Demark

In Table 2 below you can see the distribution of organisations scaling agile across regions, combined with the number of organisations with 50-249 and 250+ employees have been added<sup>7</sup>, whereby the relative number of scaled agile organisations in each region may be compared. As anticipated, there are most medium sized (50-249 employees) and large (250+ employees) organisations in the Capital region by 37% (1461) and 52% (454) respectively. Central Jutland and Southern Denmark regions each total up to 23% respectively 21% of the medium sized organisations and 18% respective 16% of the larger organisations.

Despite that the Capital Regions 'only' has half (52%) of the larger organisations it still accounts for more than 2/3 (71%) of all the scaling agile organisations in Denmark. At the opposite end of the scale is the Northern Jutland Region accounting for 6% of the larger organisations but with the first organisation scaling agile yet to be identified. All the numbers can be found in Table 2 below.

<sup>&</sup>lt;sup>7</sup> Number of organisations are for 2021, the most recent year available from Statistics Denmark. We do not expect numbers to have changed significantly since then.



Organisations	50-249	250 employees or		Scaling	Fraction % (50+	(250+
(number)	employees	more	employees	agile	employees)	employees)
Denmark total	3945	870	4815	49	1,0%	5,6%
Capital	1461	454	1915	35	1,8%	7,7%
Zealand	382	65	447	2	0,4%	3,1%
Southern Denmark	815	140	955	5	0,5%	3,6%
Central Jutland	906	160	1066	7	0,7%	4,4%
Northern Jutland	381	51	432	0	0,0%	0,0%

Table 2: Number of organisations scaling agile in Denmark distributed on regions

## Number of persons working in a scaling agile setup in Denmark

To be able to calls something an established area, we also need to have people experienced in scaling agile; either as employees within the organisations and as consultants/ available persons to assist when new organisations embark on a scaling agile journey and/or decide to pivot in the pursuit of continuous improvements.

So, let's dig further into the data and learn how the employees with this skill set are spread across Denmark.

The number of persons that are part of an agile setup is computed via direct reporting (number of persons), in combination with number of scaled groups (e.g. teams, agile release trains or similar unit) 'guestimated' to be 8 respective 80 persons, on average.

We have calculated the total number of people currently working in a scaling agile organisation in Denmark as at least 24,000 persons, for the 49 organisations on the list; the total number of people in Denmark who is currently, or has earlier, worked in a scaling agile organisation, is significantly higher. This is partly due to people who previously but not currently, are employed in a scaling agile organisation.

## Scaling agile frameworks applied in Denmark

Across the 49 Danish organisations scaling agile, we have found use of three of the four official frameworks, one widely known method for scaling agile plus local scaling paradigms are used. In addition, we have also found the fairly new model FaST as well as the unofficial model 'Spotify' applied. Previously we have seen all four scaling agile frameworks (SAFe, Scrum@Scale, Nexus, LeSS) applied in Denmark.

The most frequently used framework by organisations (in its entirety or as part of a hybrid) is SAFe by 73% (36). The data also reveals that 49% (24) use a hybrid of more than one framework and/or other elements; a number that has been growing steady over the years indicating that maturity may be a factor in exploring 'outside' standard frameworks.

Among the organisations only applying one established framework, SAFe completely dominates with 43% (21). Spotify, LeSS and FaST are each applied by one organisation, while organisations only using Nexus or Scrum@Scale has not been identified this year.

Over the years, we have seen a growing interest in experimenting and challenging the frameworks as organisations mature within the area of agile at scale. Figure 2 below, show to which extent each



scaled agile organisation use each scaling variant. 51% of the scaling agile organisations have applied a hybrid approach (combining frameworks and/or own model), while the other half applied a well-defined framework with SAFe in a clear lead with 43%.

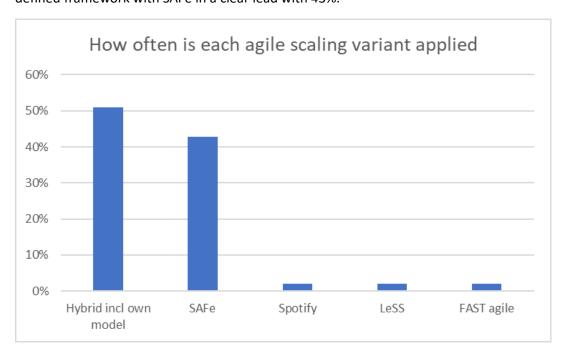


Figure 2 Distribution across types of scaled agile frameworks applied – across 'pure' implementations and hybrids

#### Further observations

Over the first years we did this survey, the vast majority of the organisations were related to 'first-mover industries' like IT and finance. Last year we saw a significant entrance of public sector organisations and this year we see this continued diversifying. We have still to see sectors like construction and care domains to enter the scene, although the gap seems to narrow.

Like the previous years, SAFe is still the most widely used framework, but the lead is diminishing, both in terms of number of 'pure SAFe' organisations, but also in terms of organisations applying it to any degree.

This year we have a new model for agile at scale present in Denmark (FaST), plus 3 of the hitherto frameworks (LeSS, SAFe and Scrum@Scale). In addition, we have seen the model referred to as 'Spotify' applied as well and number of locally matured hybrids and other toolboxes like OKRs. In the coming years, we foresee that we will see more of the locally matured (inspect & adapt) hybrids and quite likely more of these will have sought inspiration in toolboxes like eg. unFIX.

#### Advice from the organisations scaling agile

An advice given from one to another, is often an example of something that proved to work (or not work) in the advisers current context. Unfortunately, proof-of-concept in one place is never a guarantee, but rather a proof that such had proved successful in at least that combination of context of people, product, time, market situation, goal etc.

The advices here are collected across all the respondents, and the more significant ones given here.

The first advice is a repetition; but still valid and relevant. Scaling is so complex that you should **descale** prior to scaling. And descaling could be along product definitions, organisation structure, competence structure or any other dimension where there are bindings/ constraints.



The second advice is to <u>kill you darlings</u>, that is be willing to experiment and thereafter fully be willing to ditch anything that proved not to work irrespective of how appealing the thing seemed when introducing it. If you cannot kill you darlings, you end up being unable to experiment and thereby unable to adapt.

The third and last advice this time, is an experiment that turned out well for a number of organisations. That is to use **OKRs** (Objectives and Key Results) to structure the goalsetting in terms of both alignment and to operationalise goals. OKRs may also prove as a fine facilitator to detach the *what* and the *how* when refining the product backlog.

## Organisations scaling agile in Denmark

We have listed the organisations alphabetically in each category below.

#### **FAST**

Relesys

#### LeSS

Universal Robots A/S

#### SAFe

- Arbejdstilsynet
- Arla
- Autorola
- BEC Financial Technologies
- Cardlay
- CIMT (Center for It, Medico og Telefoni)
- Demant
- DSB
- Energinet
- Forca
- GN Hearing
- HBK (Hottinger, Bruel & Kjær)
- JYSK
- Landbrugsstyrelsen
- NDI Group A/S
- NOVO NORDISK A/S
- Ørsted
- Radiometer Medical
- Sampension
- SimCorp A/S
- TOPDANMARK FORSIKRING A/S

## 'Spotify'

• If Forsikring

### Hybrids & own models

- Alka Forsikring
- Alm. Brand Group
- Danske Bank



- DSV
- DXC Technology
- Grundfos
- IBM Denmark
- Jyske Bank
- LB Forsikring
- Lego Group
- Nemlig.com
- NOVOZYMES A/S
- PFA Pension
- Planday
- Salling Group IT
- Santander Consumer Bank
- Saxo Bank
- Schneider Electric
- Seges Innovation
- Stark Group
- Systematic A/S
- Udviklings- og Forenklingsstyrelsen
- Velliv
- WS Audiology

## What about the future

Where does thse bring Denmark in the future? Well, good question! So far, we have seen new organisations entering the list every year and there is no reason to believe this has levelled yet. Do we know what the level should be? No, we don't *know*.

But can we make a forecast? Well, yes. A simple forecast is to assume organisations in all regions scale agile to the same extend as the region scaling the most, which is the Capital Region. Then there would be 88 (+80%) organisations scaling agile in Denmark, in total employing 43,000+ people in a scaling agile setup.

Currently, there is no reason to anticipate that the full level of organisations scaling agile has been reached even in the Capital Region, wherefore there is also reason to anticipate an even larger level for Denmark as a whole. However, the unrealised potential here cannot be guestimated.

#### Conclusion

In many ways we have seen a 2023 as a continuation of the trends the past couple of years. We have seen agile at scale enter new business domains, and this year new organisations following suit in these areas.

We have also seen a move from 'following a framework by the book' to a more experimental/ continuous improvement approach, where 'by the book' may have been the offset, but the quest to do better, have led to experiments, that again have led to adjustments in both 'adding' elements from other sources but also 'removal' of practices that seemed to add too little value for the cost of the process.



This year is the first where OKR significantly has been mentioned as a tool related to setting the direction for the product and thereby for the refinement. We see this a clear sign of looking for better ways of all aspects of getting the right products to the right customers at the right time. We therefore welcome that any part of the value chain may be tweaked and inspiration can be found anywhere.

Since more and more people every year take part in agile at scale in an organisation in Denmark, then logically more and more diverse skills and competences are added to the circles. This is good news; the problems we face tomorrow we only have because we didn't solve them yesterday with yesterdays' techniques.

We hope to see most if not all, of the organisations on the list for 2024 – plus a range of new organisations who are currently is the process of making a go for scaling agile. We hope that you may find inspiration among those already on the list, not only within your domain but also within your geographical region. And we will do our part in spreading the word that scaling agile is not a one-size-fits-all approach. There is plenty of room to fit your organisational DNA. With these words, the only thing left is to wish you all

# Good luck with your agile journey!

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