

# Innovativeness in Finnish workplaces

Renewing working life to bring  
Finland to bloom

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**Tekes**





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**Tekes**

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# Prologue

Our source of inspiration when writing this report have been the results of the Finnish MEADOW survey funded by Tekes (the Finnish Funding Agency for Innovation) between 2012 and 2014 and the desire to mirror them against the objectives set for the development of working life in Finland. The vision of the National Working Life Development Strategy prepared in 2012 is to make working life in Finland the best in Europe by 2020. The strategy is implemented by the Working Life 2020 project coordinated by the Ministry of Employment and the Economy.

In light of the MEADOW survey and other topical research supplementing its findings, we consider the kinds of steps and leaps that should be taken to achieve the ambitious vision outlined in the strategy. We will observe working life in Finland primarily through a single thematic area in the strategy: innovation and productivity. If the starting point would have been one of the other thematic areas of the strategy – trust and cooperation, well-being at work and health or a competent workforce – our perspective would have been weighted somewhat differently.

Making Finnish working life the best in Europe requires skilful and brave choices and actions. It requires a shared will and capacity for broad-based cooperation. The change in working life is not unrelated to the overall development of the economy: the two are intertwined. Without favourable development of the economy, there is no sustainable foundation for improving working life. On the other hand, good-quality working life is a prerequisite for long-term economic growth. Based on our findings, we propose that in the long term increasing innovativeness in workplaces is the best possible economic policy for Finland.

We would like to extend our thanks for ideas and assistance to the MEADOW research group, whose members are Simo Aho, Jaana Minkkinen and Ari Mäkiäho from the University of Tampere, and to members of the steering group for the MEADOW survey: Juha Antila (Central Organisation of Finnish Trade Unions SAK), Erkki Auvinen (Finnish Confederation of Salaried Employees STTK), Niilo Hakonen (Local Government Employers KT), Päivi Lanttola (Office for the Government as Employer), Oili Marttila (Labour Market Organisation of the Church), Joonas Miettinen (Confederation of Unions for Professional and Managerial Staff in Finland) and Seppo Saukkonen (Confederation of Finnish Industries). As a general rule, the figures presented in the report are based on previously published analyses by the MEADOW research group.

The MEADOW survey was implemented as part Tekes' *Liideri – Business, Productivity and Joy at Work Programme* (2012–18) <http://www.tekes.fi/liideri/>.

In Helsinki in August 2014

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# Summary

The report compiles key results from the MEADOW (Measuring the Dynamics of Organisation and Work) survey based on three previously published research reports. In the report, we review the extent to which Finnish businesses and public-sector organisations have engaged in innovation and renewal in recent years. We also explore the participation of personnel in development, the impact of the changes on the work of personnel and the views of personnel on the changes.

Particular attention is focused on innovative organisations. In this report, the term innovative organisations is used to refer to businesses and public-sector organisations that in the last two years have produced a new or a significantly improved product or service in a way that involves feelings of enthusiasm, vigour and satisfaction experienced by personnel towards their work. This kind of positive work-related emotional and motivational state is known as work engagement.

Approximately one in four of Finnish businesses and public-sector organisations fulfil the criteria for an innovative organisation. The number of innovative organisations is the highest in the knowledge-intensive industry. Characteristics typical of innovative organisations are the active role of teams in the development of new products and services, active external networking and good opportunities of staff to influence their work.

Based on the MEADOW survey and other recent research information, we present ten areas of working life development with a number of development proposals. The proposals are guided by the vision of the National Working Life Development Strategy, according to which Finnish working life will be the best in Europe by 2020. The measures proposed concentrate on the “innovation and productivity” focus area in the strategy.

The development areas and proposals are divided between five headings: innovation activities, management of change, new roles in working life, the digital transformation and the preparedness for change in Finnish working life.

## INNOVATION ACTIVITIES

### **1. Companies actively renew their processes and organisations, but do not invest sufficiently in product and service innovations and marketing innovations to support them.**

The imbalance of innovation activities is greater in Finland than in any other of the EU15 countries. Finnish companies are more one-sided in their focus on cutting costs and often concentrate on extending the life cycle of their existing products and services rather than renewing them. For several years, the innovation of products and services in Finland has relied too strongly on the largest companies and the ICT sector. The competitive advantage of many SMEs that are highly dependent on larger core companies and their networks has been based on speed, flexibility and customisation for client needs and there has been no need for them to develop systematic processes for the renewal and marketing of their own products and services. However, this situation has now changed as the previously strong national clusters (e.g. in metal and engineering, wood processing and telecommunications) have disintegrated. Companies are forced to seek new recipes for success in order to survive in the global competition. *Activities to support innovation must focus more strongly in the capacity and motivation of all companies to renew their products and services too. The positive joint effects of innovations performed in different areas (products and services, processes, organisations, marketing, etc.) must be reinforced through comprehensive and systematic innovation thinking.*

### **2. Small-scale development is common in workplaces, but an increasing number of breakthrough innovations are needed alongside it.**

A great deal of resources are directed to development in Finnish workplaces. A large number of employees in all sectors and industrial branches have participated in the development

of their own work and the operations, products and services of their team or workplace. It is not an exaggeration to claim that in recent years Finland has been one of the countries with the most significant investments in workplace-level development activities in Europe. However, active development efforts on the workplace level have not produced new industrial and economic structures to support growth. Continuous, step-by-step development is important, but not sufficient on its own. In addition to this, more ambitious breakthrough innovations that lead to significant improvements in productivity and alter the familiar rules and revenue generation models of markets are needed in all areas of innovation activity. Their significance is highlighted in situations where technologies develop at a rapid pace and a significant percentage of the added value in the private sector in Finland is generated by slow-growth industrial branches. Such innovations are also needed by the public sector that, in the next few years, will face significant social challenges. *In activities to support innovation, it is necessary to invest increasingly in breakthrough innovations and management skills and competencies to support them both in businesses and public-sector organisations. Small-scale development, too, must be managed in a goal-oriented manner and used to support the success of breakthrough innovations.*

## MANAGEMENT OF CHANGE

### **3. Organisations are undergoing major changes, but there is still room for improvement in the areas of change management and expertise concerning changes.**

Finns have a relatively positive attitude towards change and are committed to the development of their workplace – also in an international comparison. In the MEADOW survey, the attitude of employees to changes in their workplace and their experiences of the changes are, perhaps, surprisingly positive. Negative attitudes are generated by badly managed change. The need to reform industrial and economic structures and to seek new sources of growth means that significant changes in the organisation's key operating principle will become increasingly common in workplaces. There are clear deficiencies in the competence required by organisational transformations. In organisations where such transformations have been carried out, work engagement is low and even lower than in organisations where functions have been cut for example through outsourcing. The lowered level of work engagement caused by poor manage-

ment of change and a subsequent decline in productivity often negate the benefits, such as financial gain, expected from the change. *The skills and competencies required by demanding changes in operations and organisation and the comprehensive management of these changes must be improved so that people are able to experience the renewals increasingly as opportunities rather than threats. Change management must be developed so that a better balance is achieved between perspectives related to management and leadership.*

### **4. Public-sector organisations exhibit plenty of work engagement, but it is not sufficiently channelled into innovativeness.**

Work engagement is experienced more often in local government organisations. However, in the public sector and particularly in local government organisations, work engagement often does not manifest itself as innovativeness, even though much of the work is self-managed and the teams hold responsibility for development. In the light of the MEADOW survey, everyday development work carried out by personnel and major changes in operations do not come together in an effective manner in the public sector. Management of change in public organisations is often highly complex work and explaining reasons for the changes to personnel can be a difficult task. The views of personnel on the impacts of the changes in operations are negative in several respects. It is alarming that one characteristic of innovative public organisations compared to their opposite is that no reforms focusing on division of labour between employees, organisation or working methods have been carried out in them. This would indicate that in many cases the impact of the changes was to reduce rather than boost innovation. *In public-sector change management, it is necessary to locate means by which to bring everyday development work carried out by personnel closer to needs for change arising from political pressures. Strong work engagement exhibited by personnel is an important resource in public organisations that must be utilised more effectively when planning and implementing changes.*

## NEW ROLES IN WORKING LIFE

### **5. The significance of leadership is highlighted in the changing working life, but it should be increasingly shared.**

The innovativeness of organisations is a feature of the community. Even if new ideas and visions were originally gener-



ated by certain individuals or teams, their implementation as value-creating innovations requires broad-based cooperation and commitment throughout the organisation. In Finnish workplaces, the distribution of power and responsibility both in development and regular activities is in reality still largely based on traditional hierarchical management thinking regardless of the increased prevalence of self-managed team work and an overall rise in competence level. This is not visible simply as better opportunities for influence and participation for people in managerial positions, but also as a much greater workload of these people. In the MEADOW survey, managers experienced more stress than other employees and in service companies and public-sector organisations fewer managers experienced work engagement on a daily basis compared to their subordinates. It is difficult to imagine that, in the present situation, the managers would be able to provide credible encouragement to their subordinates to help them achieve good work performance. *Managerial work must be developed into the direction of shared leadership by an open-minded re-defining of the work roles and by creating new applications for self-managed team work. The work community skills required by shared leadership from both employees and managers must be incorporated into education and training on various levels more broadly than it is today.*

#### **6. The role of employees in the development of operations is recognised, but not yet in nearly all workplaces.**

On average, Finnish workers have plenty of opportunities to participate in developing the operations of their workplace. Further, these opportunities have been improved in recent years. However, the favourable development and the progressiveness of Finland compared to many other European countries easily conceals the reality that still today, in a large number of workplaces, this opportunity does not exist. The lack of opportunities for participation applies most frequently to blue-collar workers and businesses that have not carried out renewals as concerns their products, services and ways of producing them in recent years. According to the MEADOW survey, a third of industrial companies and in one in four service companies personnel does not participate in the development of operations with any regularity. Such enterprises can be found in all size groups. The capacity of management to promote a “caring culture” where personnel feels that the managers genuinely encourage creativity and the generation

of ideas of everyone holds a key position. *Knowledge of the significance of employee-driven innovation and generation of ideas must be increased particularly in sectors where such culture does not exist. To support employee-driven innovation and generation of ideas, it is necessary to develop suitable operating methods, tools and the capabilities required by their use.*

## **DIGITAL TRANSFORMATION**

### **7. The digital transformation is here, but the different actors in society have been slow to wake up to this reality.**

Finland has a reputation as an advanced information society. This reputation was created by belonging to the “family” of Nordic welfare states, combined with the spectacular success of Nokia and a large share of high technology in export. However, Finland’s long success as a producer of ICT-based products has managed to obscure the fact that Finnish companies as a whole have not been very progressive users of ICT. Finland’s productivity growth has depended on a few sectors and companies, and growth achieved through the use of ICT as such has been modest compared to several other developed industrial countries. ICT has been perceived more as a tool to streamline existing processes and operations than as a platform for breakthrough innovations in products and services or business and the organisation of operations. Achieving new growth in both productivity and employment requires a creative and diverse perception of the possibilities of ICT and its systematic and comprehensive utilisation as part of all activities. *The skills and competencies of companies in areas such as business, management and work organisation and their prerequisites to act as forerunners in the digital transformation must be strengthened especially in sectors outside of the knowledge-intensive industries and services. In innovation management, it is necessary to invest particularly in the “fuzzy” front end of the innovation process where the focus is on mapping the opportunities entailed in the digital transformation and locating new ideas.*

### **8. Finns have a good level of digital skills and competencies, but these skills and competencies are poorly utilised by companies.**

Finland is one of the top countries in the world when it comes to the citizens’ preparedness to utilise digital media and information networks. In particular, Finnish young people and young adults are among the pioneers of the digital world, also

from an international standpoint. It is thus surprising that this does not appear to have shaped into a significant competitive advantage for businesses in Finland. For example, the utilisation of social media is low particularly in industrial companies. According to the MEADOW survey, social media is utilised in the development of products and services by just one in ten companies. In contrast to the capabilities of citizens, the capabilities of Finnish companies to utilise digitalisation in the overall development of their business activities until now appears rather bleak in the light of international comparison. Not all companies possess sufficient digital expertise in themselves. To narrow the gap between the opportunities provided by digitalisation and their utilisation, increasingly open models for innovation and development that the companies can use also to form connections to experts outside of their own organisation are required. The rapid development of social media and other aspects of the interactive Internet are continuously generating better opportunities for this. *The utilisation of the interactive Internet and cooperation between companies and different digitally networked user and knowledge communities in innovation activities and development must be enhanced. Awareness of the key strategic significance of networking for innovation must be increased among companies.*

## PREPAREDNESS FOR CHANGE IN FINNISH WORKING LIFE

### **9. In recent years, Finnish workplaces have undergone a large number of changes, but improvements in the quality of working life have not been sufficient.**

In recent years, Finnish working life has undergone a great deal of change at a rapid pace. This is evident in the frequency of technological, organisational and other operational change in workplaces. Even though the attitude of Finns to changes in their own workplace has been relatively positive, the numerous changes have not had a sufficient overall impact on the quality of working life. In the light of the most common indicators of the area, the quality of working life has not deteriorated in recent years, although it is also not possible to detect clear improvement, either. The slow development of working life

threatens to lead to a growing underuse of the increased skills and competencies of Finns in the area of work, growing frustration towards the contents of work and a decline in the significance of paid labour in relation to other areas of life. At the current rate, achieving the vision of the National Working Life Development Strategy by 2020 seems unrealistic. *Experimental development of the ways of organising and performing work that promotes people's opportunities to develop and influence their work must be encouraged and supported. In order to make Finnish working life the best in Europe, it is necessary to promote the "rethinking of work" in all key sectors and industrial branches.*

### **10. Finns are committed to the values of the industrial work society, but these alone are not sufficient to renew industrial and economic structures.**

Finns have internalised the values of the industrial work society. Work has important significance as an element bringing meaning and content to life, and work is performed for the good of one's organisation or community in a diligent, reliable and persevering manner. The significance of this set of values as a success factor for Finland in the future is by no means self-evident, however. The values of the industrial work society adopted by Finns may have supported the participation of personnel in small-scale development in workplaces, but the renewal of the industrial and economic structures also requires the capacity to implement breakthrough innovations and to carry out radical organisational transformations. The renewal of structures requires a set of values and work culture that emphasise courage, enthusiasm and preparedness for risk-taking but also openness, tolerance, diversity and the capacity for broad-based cooperation and networking. These, however, are not characteristics typically highlighted in the values of Finns. Finnish work culture, too, requires updating, as we aim to become the best in Europe in the area of innovation and productivity. *To update Finnish work culture, leadership must be developed to respond to the challenges of future working life particularly in the areas of managing networks, diversity and enthusiasm. The attitudes and skills and competencies required in the changing working life must be reinforced in the different levels of education and training.*

# Introduction

The Finnish economy has been ailing in recent years. The financial insecurity that began in 2008 has hit Finland harder than many other developed industrial countries. Finland's gross domestic product is still smaller than in 2008, and industrial production and export have yet to make a full recovery from the shock and return to their previous level.

Finland will not be able to achieve sustainable growth by relying exclusively on its previous industrial and economic structures. Sustainable growth requires the renewal of these structures and identifying new sources for growth. A key position is held by innovations: insights based on discovery, exploration and learning that manifest themselves as new products and services and as new ways of producing them by companies.

A nation cannot live off innovations as such. Economic well-being depends on the amount of work performed and how productively this is done. In developed industrial countries innovation is *the* means by which industrial and economic structures are renewed and by which productivity is best improved. The significance of innovations as a source of economic well-being for Finland is emphasised by the fact that in the future, economic growth can only result from growth in productivity. The amount of work performed cannot increase to any significant degree, as with the ageing of the population the amount of workforce in Finland is expected to decline in the next few years. The reduction is expected to be even more radical than in several other countries similar to Finland.

Even though international comparisons tend to place Finland among the "innovation leaders", it is justifiable to ask how innovative businesses in Finland really are and how well does Finnish working life support the renewal of businesses in the current transition. As a rule, the comparisons tend to focus on the assessment of the general prerequisites for innovation activities, such as investments in research and development by businesses and the government, education systems, the functionality of markets or the dissemination of the use of in-

formation and communication technologies (ICTs). They also display a strong traditional emphasis on innovations based on science and research. Ways to produce innovations have diversified in recent years as the economy has become more knowledge-intensive and service-dominated and the education level of population has increased. The significance of customers, users, the personnel of companies and other organisations, and different networks and knowledge communities in innovation activities has increased and become more visible. What is required is an increasingly diverse understanding of innovations and a new way to measure innovativeness.

In this report, we will expand the understanding of the capacity for renewal of businesses and working life in Finland utilising a diverse and comprehensive research and statistical data focusing on the organisation level. Our starting point is that innovations are a central and in the future an even more crucial prerequisite for the success of companies in the market and for their ability to remain competitive in the long term. In the Finnish public sector, too, innovations and renewal are necessary when responding to major social challenges such as the ageing of the population and sustainability gap in the public economy. Working life that provides the right prerequisites for innovativeness thus constitutes one of the key success factors of a nation – a factor the significance of which has not been sufficiently brought out in public discussion.

## Perspective of the report

The viability of a business requires that the company has the capacity to operate in a manner that is financially profitable and to generate profit. In this report, however, we are not interested in the prerequisites for profitable business as such. The operations of a company may be financially profitable at a given moment for a number of different reasons. Moreover, current profitability has little value in predicting whether a company will be profitable in five or ten years, for example.

The viability of a company depends on its capacity for successful renewal. This perspective is central in the report.<sup>1</sup>

We will start by exploring the extent to which Finnish companies have engaged in innovation and renewal in recent years and by examining their reasons for doing so. In addition to companies, we will look at public-sector organisations, as in the next few years similar pressures and expectations will be directed to the renewal of their operations as to those of businesses. We will focus particular attention to the role of personnel in development activities.

#### Info box 1. Why is the role of personnel central in innovation?

Individual innovations may help organisations improve their productivity and competitiveness on a temporary basis. In the long term, however, the crucial element is *innovativeness*. By this we mean the capacity to produce innovations in an efficient manner and learning to do this better each time.

Innovativeness requires organisational learning. Learning organisations innovate. Further, when innovating, organisations learn. Organisational learning is manifest, for example, as increasingly evolved ways of managing customer relationships, cooperating both internally and with different partners, motivating people to good performance and organising work.

There is a positive, mutually reinforcing cycle between producing innovations and organisational learning. The cycle is all the more powerful the stronger the communal nature of the innovation and learning process is, in other words, the more broad-based the participation of staff – often also of customers and users – is in the process.

Further, we focus on how the renewals have influenced the work of personnel and what are staff members' attitudes towards and experiences of the changes. All these factors impact how much initiative, creativity and enthusiasm that is required for an organisation to be innovative is generated among personnel.

The report also reveals in how many businesses and public-sector organisations the capacity to produce innova-

tions is associated with work engagement as experienced by personnel. The term work engagement describes a state of mind where the employee feels strong and energetic, enthusiastic and satisfied when engrossed in his or her work. We consider the share of such organisations to be an indicator of how many workplaces in Finland provide favourable conditions for long-term innovativeness.

#### Info box 2. What does enthusiasm have to do with innovation?

On the background of innovations are ideas or insights that help us see things in a new light. The desire and capacity for this require an atmosphere that creates space for a new kind of thinking and ideas as well as the internal motivation of employees. In this report we focus particular attention on ways of achieving internal motivation among employees through the concept of *work engagement*. Without the desire and ability to find new ways of seeing and doing things organisations will deteriorate and shrivel. On the level of the economy, the same thing can be expressed with the statement that enthusiastic workers are a prerequisite for sustainable economic growth.<sup>2</sup>

#### What is the report based on?

The most important source for results and conclusions in the report are the data and analyses of the MEADOW (Measuring the Dynamics of Organisation and Work) survey funded by Tekes in 2012 to 2014.<sup>3</sup> The survey began with interviews of employer representatives from businesses and public-sector organisations operating in Finland. After this, employees from the same organisations were interviewed.<sup>4</sup> The data was collected in 2012. The sample is representative of Finnish businesses and public-sector organisations with more than 10 employees. The data combines information obtained from the registers of Statistics Finland. The number of employer representatives interviewed was 1,531. A total of 1,711 employees from the same organisations were interviewed.

Other recent studies have also been utilised in the preparation of the report and in the drawing of conclusions.

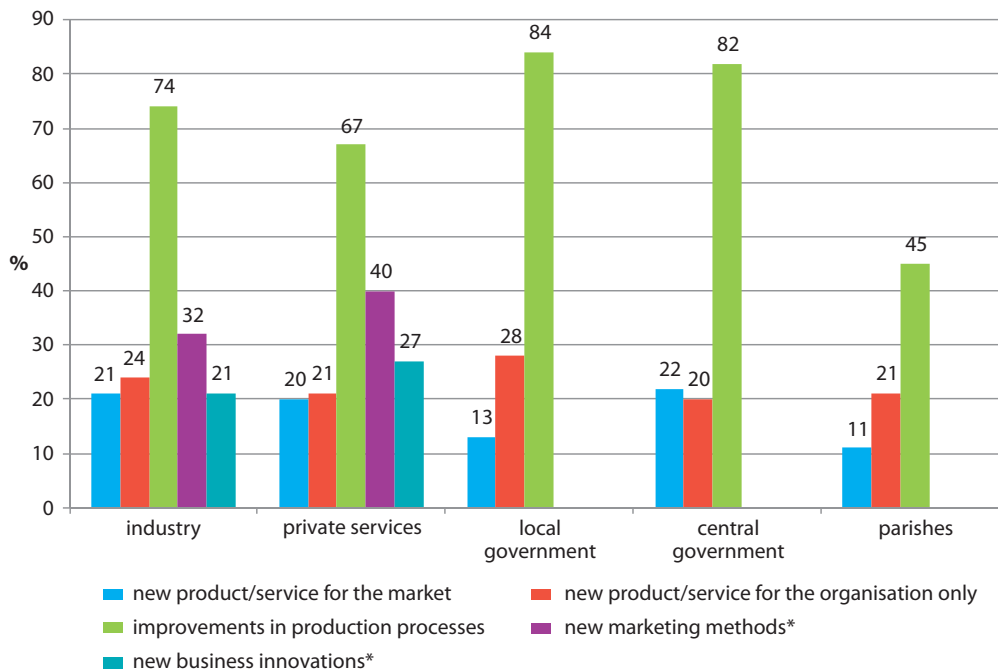
# How actively are companies generating innovations in Finland?

Innovations come in several different types. They may target areas such as products, services, processes, business, sales and marketing or management and the organisation. The novelty value of innovations ranges from minor changes to radical reforms and further to revolutionary transitions altering the traditional rules of the markets and prior revenue generation models.

A clear majority of Finnish businesses and public-sector organisations have developed their production of products and services in the past two years, between 2010 and 2012.

The proportion of companies who have developed their products and services amounts to more than 40 per cent. Slightly over a third of the companies have developed their marketing methods, while one in four have come up with business innovations (Figure 1). Innovations and renewals have a tendency to accumulate. For example, significant renewals in products and services often require the development of production processes, marketing methods and business models to take place alongside them.

**Figure 1. Innovations and renewals between 2010 and 2012 according to sector (employer interviews).**



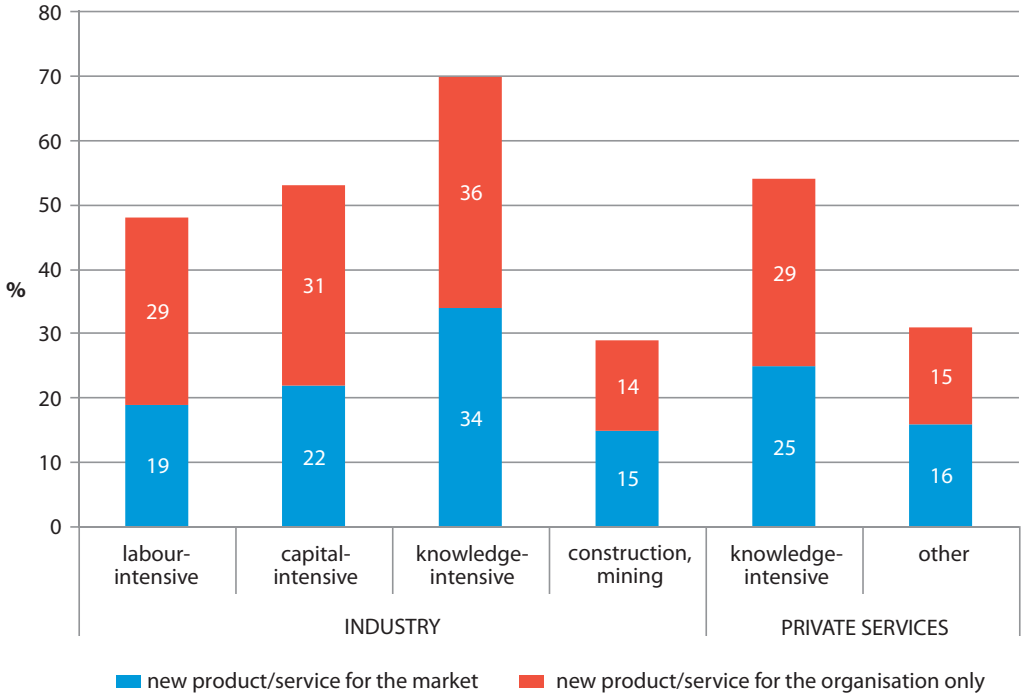
\*question posed to private-sector actors only

Businesses can be divided into four groups based on innovations and renewals implemented by them. Approximately one in five of the companies have developed a *new* or significantly improved product or service *for the market* between 2010 and 2012. Another fifth have developed a *new* product or service *for the company itself*. Two out of five have not developed new products or services but have implemented innovations or other significant renewals in their production processes, marketing or business. The remaining fifth have not performed any of these activities in the observed time period.

The knowledge-intensive industry is clearly the engine of innovation activities in Finland. More than 70 per cent of busi-

nesses in the sector have developed new products or services. The knowledge-intensive industry consists of sectors such as the chemical industry, the electrical and electronics industry and the manufacturing of machines, equipment and vehicles. Also in the capital-intensive industry and knowledge-intensive services, more than half of companies have developed new products or services between 2010–2012. The capital-intensive industry includes the wood-processing industry, metal production and energy production. Knowledge-intensive services include private finance, consulting, education and training, health and social welfare services. The proportion of companies that have developed new products and services is the smallest in construction and mining (Figure 2).

**Figure 2. Product and service innovations in 2010 to 2012 according to industrial branch of companies (employer interviews).**



Activity in the producing of innovations grows consistently with the size of the company in both industrial and service companies. Export companies are more active innovators than those operating in the domestic market alone. In

the knowledge-intensive industry, where the frequency of product and service innovations is by far the highest, the proportion of export companies is significantly larger than in the rest of the industry or in the service sector.

**Info box 3. Are Finnish companies active innovators compared to businesses in other European countries labelled as “innovation leaders”?**

The activeness of Finnish companies in producing *new products and services* in the 2010s has been notably lower than in Denmark, which stands out clearly from other European “innovation leaders” such as Finland, Sweden and Germany. Finland also lags slightly behind Sweden particularly as concerns service companies. Even in a broader European comparison, Finnish companies do not appear to have renewed their products and services particularly actively in recent years.

Instead, Finnish companies’ investments in the renewal of their *production processes and organisations* have been greater than in many European countries. Yet, in these areas, too, Finland remains clearly behind Denmark. The renewal of organisations in particular would appear to be more common in all of the Nordic countries than in Europe in general.

Conversely, particularly in Finnish industrial enterprises, investments in the renewal of *marketing methods* compared to other European countries have been small. The difference to other Nordic countries and – once again – to Denmark in particular is vast. In service companies, on the other hand, the level of activity in this area is close to the European average.

Source: Database of European Company Survey 2013.<sup>5</sup>

# Organisational change and reasons for it

In the MEADOW survey, the employer representatives were asked about the external reasons for which the organisations represented by them had altered the ways in which they operate within the past year. In industrial and service enterprises, the most common reasons were changes in demand and intensified competition. Often, the adoption of new technology also played a role. Its significance as the single most important reason is highlighted in the capital-intensive industry and

knowledge-intensive services. In public-sector organisations, the most important reasons were the adoption of new technology, but also cuts in appropriations. Increased wage costs were an important reason for change in one in four service companies and one in five industrial companies. The significance of increased wage costs was greater in public-sector organisations than in private enterprises (Figure 3).

#### **Info box 4. What is the significance of online services and social media for the changes in operations?**

The adoption of new technology can be the reason for organisational change in several different ways. The interactive Internet in particular is a new tool, and the utilisation of the vast spectrum of applications based on it has profound and far-reaching implications for all sectors. For example, the Industrial Internet of Things has been predicted to constitute one such revolutionary change for several industrial branches already in the next few years.

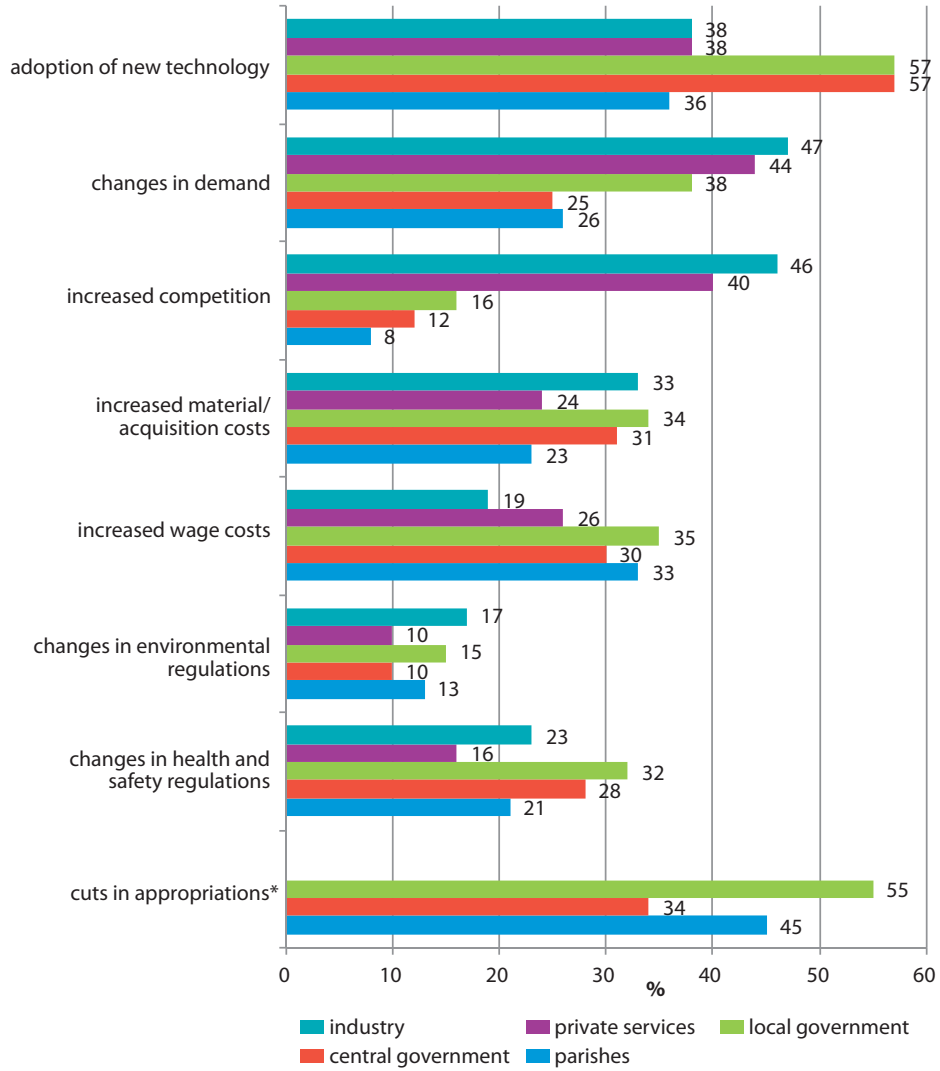
The range of online services available to Internet users has increased at a rapid pace. According to the MEADOW survey, in 2012 44 per cent of industrial companies and 57 per cent of service companies offered services online. Out of public-sector organisations, more than 60 per cent provided online services.

The utilisation of social media is even rarer: out of industrial companies, only 16 per cent utilised social media. In service companies and public-sector organisations, the proportion is higher: 40 per cent in the former and slightly over half in the latter. Most commonly, social media is utilised in marketing and external communications.

In the development of products and services, the utilisation of social media is still in its infancy. Out of industrial businesses, less than 10 per cent use social media as a development tool. In service companies and public-sector organisations, the proportion is slightly higher, but here too just over 10 per cent.



Figure 3. Reasons for changes in operations according to sector (employer interviews).



\*question posed to public-sector actors only

Almost half of Finnish businesses have implemented an organisational change process in the past two years. In approximately 50 per cent of these companies, the change consisted of a relatively minor reorganisation of responsibilities and duties. In service companies, the changes were slightly more common than in industrial companies. Yet, knowledge-intensive industry remains at the top of the statistics, with two thirds of the companies having implemented organisational change. In large companies, the changes were more common than in small ones. Export companies have been more active in renewing their organisation compared to those operating in the domestic market. In local and central government organisations, changes have been implemented even more frequently than in the private sector on average (Figure 4).

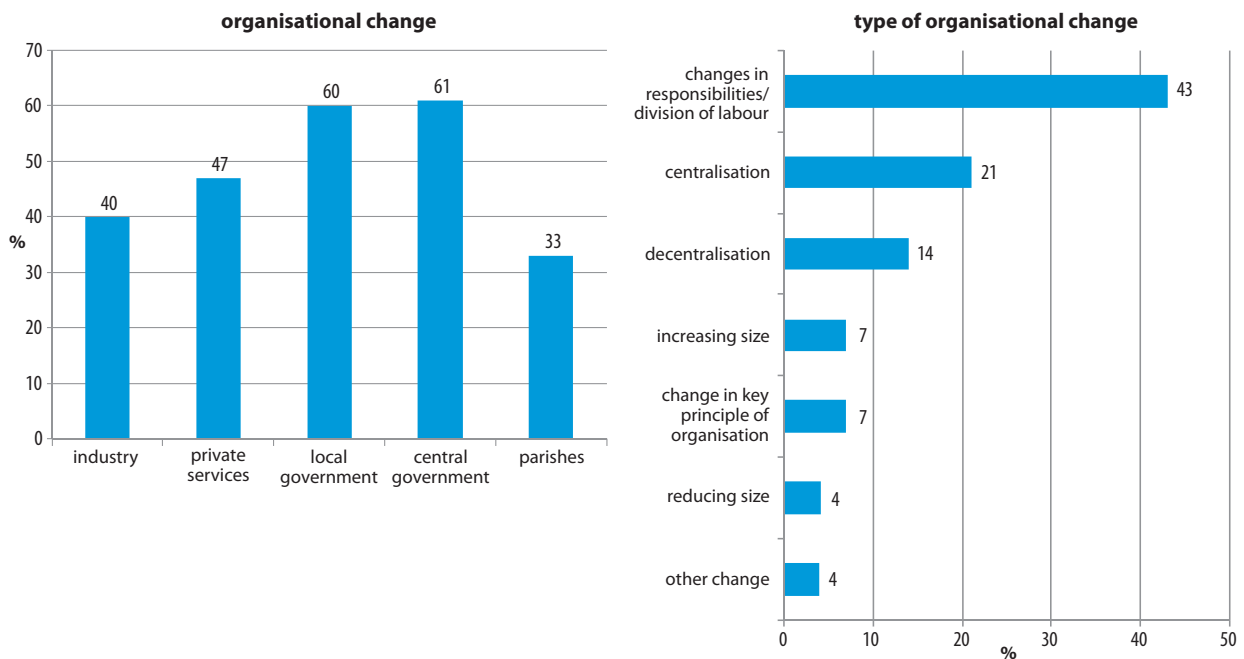
No single direction could be detected in the organisational changes implemented. The changes implemented by companies were aimed, equally often, to decentralise and

centralise power and responsibility. The goal of cutting back and expanding the operations of a company were almost equally common. In public-sector organisations, centralisation has been significantly more common than decentralisation.

The companies' level of activity in the area of innovation and renewals implemented clearly go hand in hand. Companies that have developed new products and services have implemented organisational changes more often and more extensively than others. The most active reformers have been companies that have introduced new products and services to the market.

The renewals were not restricted within an organisation. Companies that have developed new products and services cooperate more actively with other companies in the development of products and services, procurement and sales and marketing. They have also outsourced these functions to other companies more often.

**Figure 4. Organisational change in 2010 to 2012 according to sector (employer interviews).**



# Changes in the work of personnel

In recent years, public discussion on changes in working life in Finland has been carried out in largely negative tones. The employee interviews conducted in the MEADOW survey do not support the perception of the general deterioration of working conditions and terms of employment with the changes. When employees from workplaces that had implemented changes or renewals were asked how the changes had impacted their own work, the statements were surprisingly positive.

More than 50 per cent of employees stated that in the past two years work tasks had been distributed in a new way between employees, organisation in the workplace had been reformed or working methods or systems renewed. Changes were more frequent in central government workplaces than in other sectors.

Less than 50 per cent of employees interviewed for the MEADOW survey perceived that the changes had had a significant impact on their own work tasks. Most commonly, the changes have had an impact on work tasks and workload and the experienced meaningfulness regarding one's work. Impacts on career advancement and wages were rarer. A clear majority perceives the impact to their own work tasks and the meaningfulness of their work as positive. In companies, individuals viewing the changes as positive outnumber those with the opposite view. In public-sector organisations, the impact on workload forms an exception: the number of those viewing the change in a negative light in this respect was large particularly in central government workplaces and parishes (Figure 5).

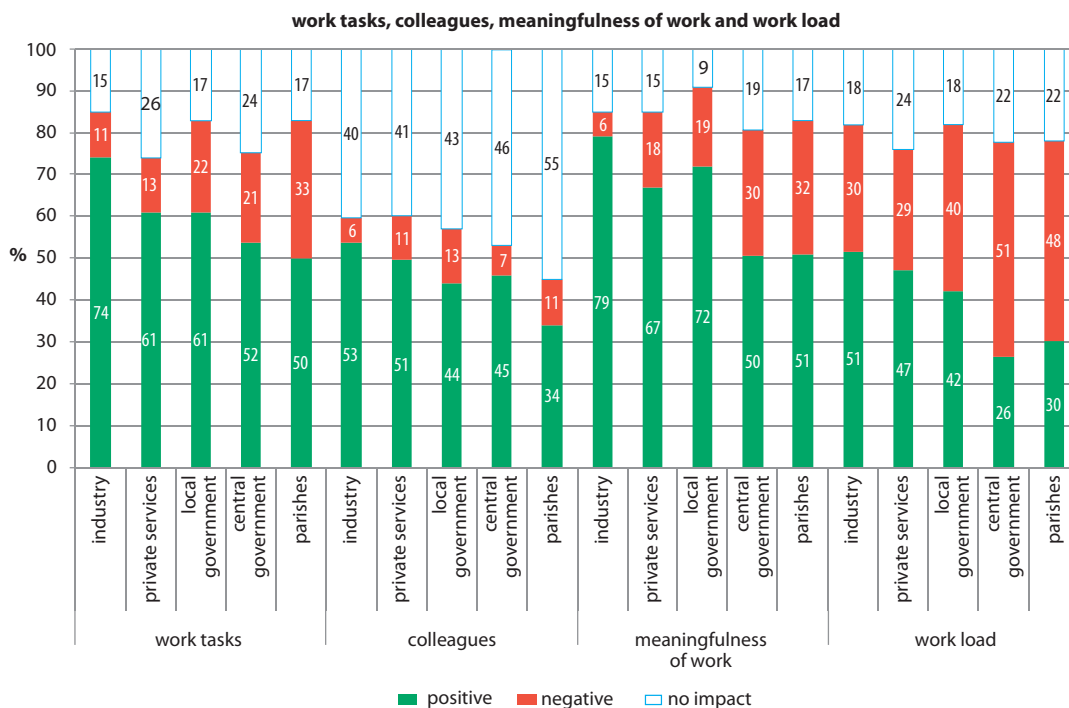
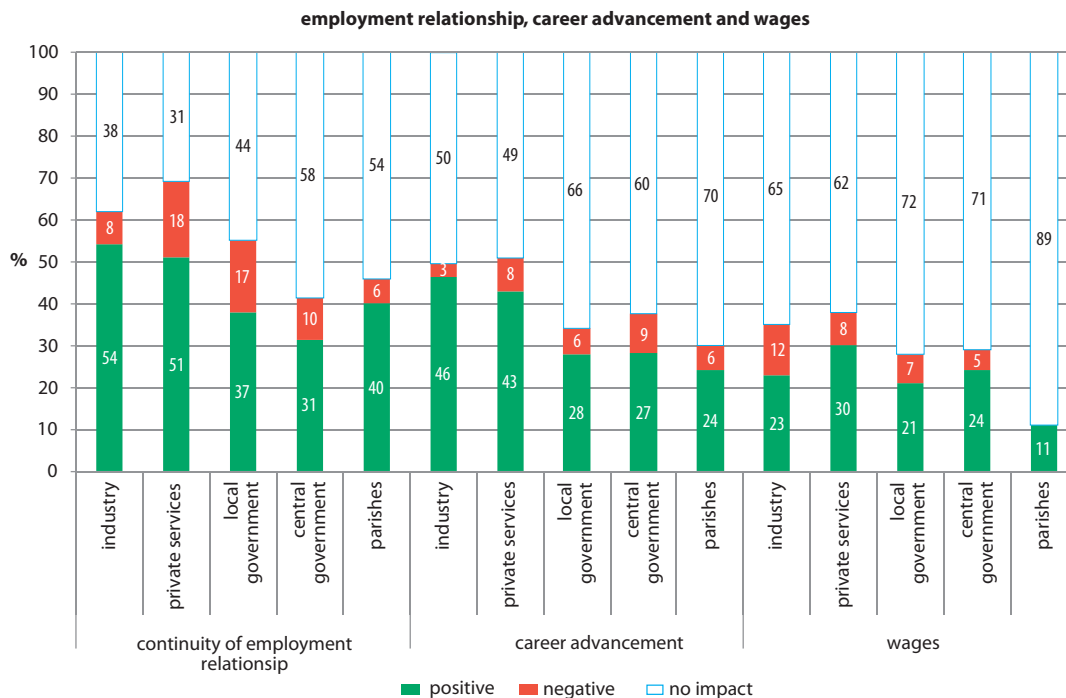
## **Info box 5. What explains the attitude of employees towards changes in their own work and at their own workplace?**

Even though many may assume a critical perspective towards the current trends as concerns change in working life, changes in the person's own workplace are, more often than broader changes, viewed as positive indications of a willingness to develop the workplace and its functions. Commitment to one's own workplace is strong among Finnish workers in general. Nine out of ten are proud of their own workplace, and equally many agree completely with the statement "my employer can rely on me". Four out of five would recommend their current workplace to their friends.

A clear majority considers changes implemented in their own workplace as useful, necessary and even essential. The prevalence of these perceptions is strong in the private sector and particularly in the industry. Three out of four are happy with their opportunities to influence decision making concerning the changes. The changes are perceived as meaningful particularly when the employees have had realistic opportunities to influence them.

The opportunity to have a say in changes requires that the employees themselves possess sufficient skills and competence. As the literacy, numeracy and information technology skills of the Finnish adult population are among the best in the world, Finnish companies have, in this respect, good opportunities to utilise the competence of their staff in innovation activities and other development work.<sup>6</sup> According to the European Working Conditions Survey, the likelihood of employees to seek and participate in training offered by their employer is greater in Finland than in other European countries.<sup>7</sup>

Figure 5. The impact of changes on the work and terms of employment of the employees (employee interviews).



# Personnel as developer

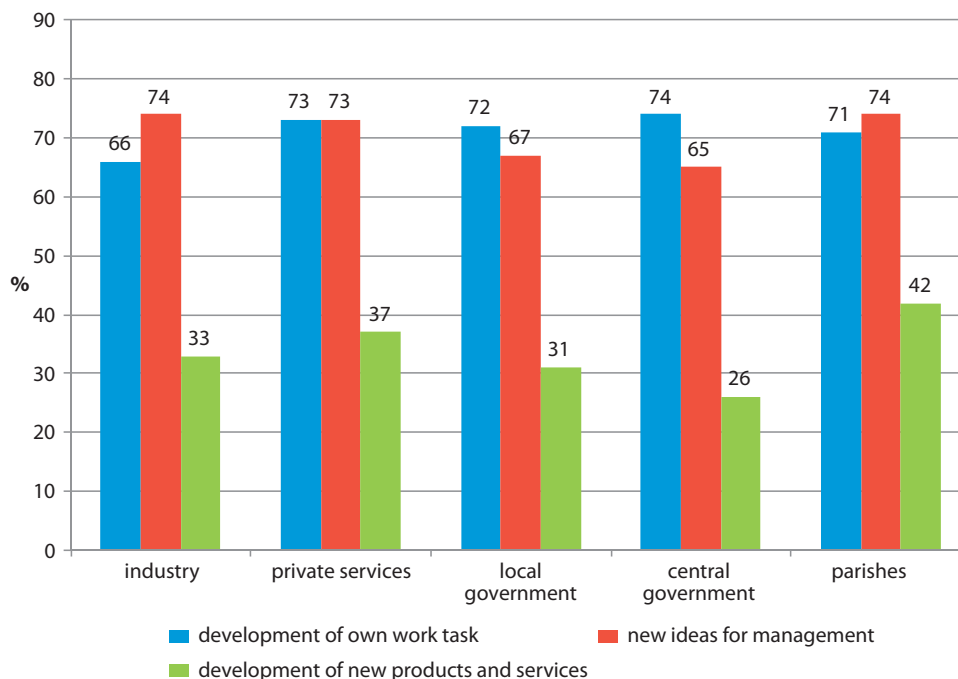
## The role of employees in development

Internal small-scale development is a common practice in Finnish organisations. This was also reflected in the results of the MEADOW survey regarding the role of employees in development. Nearly three in four have both developed solutions to improve their own work and proposed new ideas to the management or supervisor during the past year. According to their own statement, slightly more than a third have participated in the development of products or services (Figure 6).

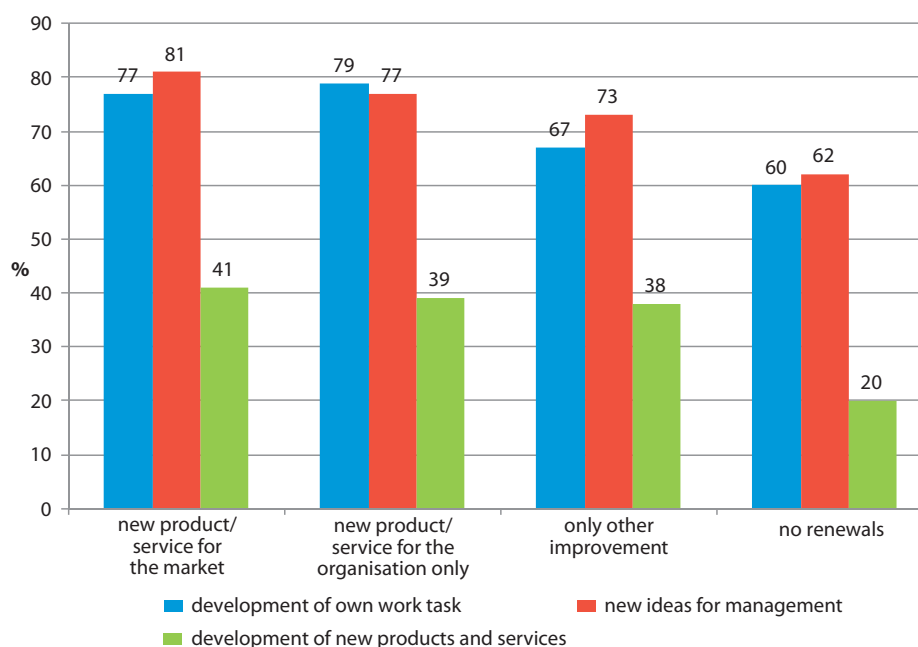
In companies that have developed new products or services for the market or for the organisation itself, the percentages were greater compared to other businesses. The numbers in Figure 7 indicate that small-scale development work is also commonly performed in businesses where no actual innovations have been carried out in recent years as concerns products, services, production, business or marketing.

Opportunities for enriching and diversifying the contents of work persist, as more than four out of five of the employees interviewed for the MEADOW survey feel they could handle

Figure 6. The role of employees in development according to sector (employee interviews).



**Figure 7. Employees' role in development according to the companies' innovation activity (employer and employee interviews).**



**Info box 6. How do learning and the opportunities for participation and influence differ between personnel groups?**

The differences between personnel groups in workplace learning and opportunities for participation and influence remain vast. Upper white-collar employees are approximately twice as likely as the blue-collar worker to have excellent opportunities for learning in the workplace, participating in training provided by the employer and influencing work tasks and the division of labour. In Finland, 61 per cent of upper white-collar employees have good opportunities to participate in the development of their own workplace when the corresponding proportion among blue-collar workers is one third. Lower white-collar employees are located between these two groups. The differences have remained on a similar level throughout the 2000s.

Source: Working Life Barometer of the Ministry of Employment and the Economy 2013.<sup>8</sup>

**Info box 7. How do the perceptions of personnel and management differ concerning support provided by managers in innovation activities?**

The perceptions of management and staff often differ clearly as concerns support provided by managers in innovation activities. Even though the management itself feels it is open to the development ideas of personnel and encourages employees to learn and develop in their work, the employees may not see the situation in the same way. Personnel's experience of encouragement received remains essentially important in promoting employee-driven innovation activities. The capacity of management to promote the emergence of a "caring management culture" where personnel feels that managers genuinely encourage creativity and the generation of ideas by everyone as well as open-minded experimentation with ideas produced by personnel is in a key position. The objective is to locate a space of shared understanding where the management will listen to the personnel and have a genuine interest in the ideas of personnel.

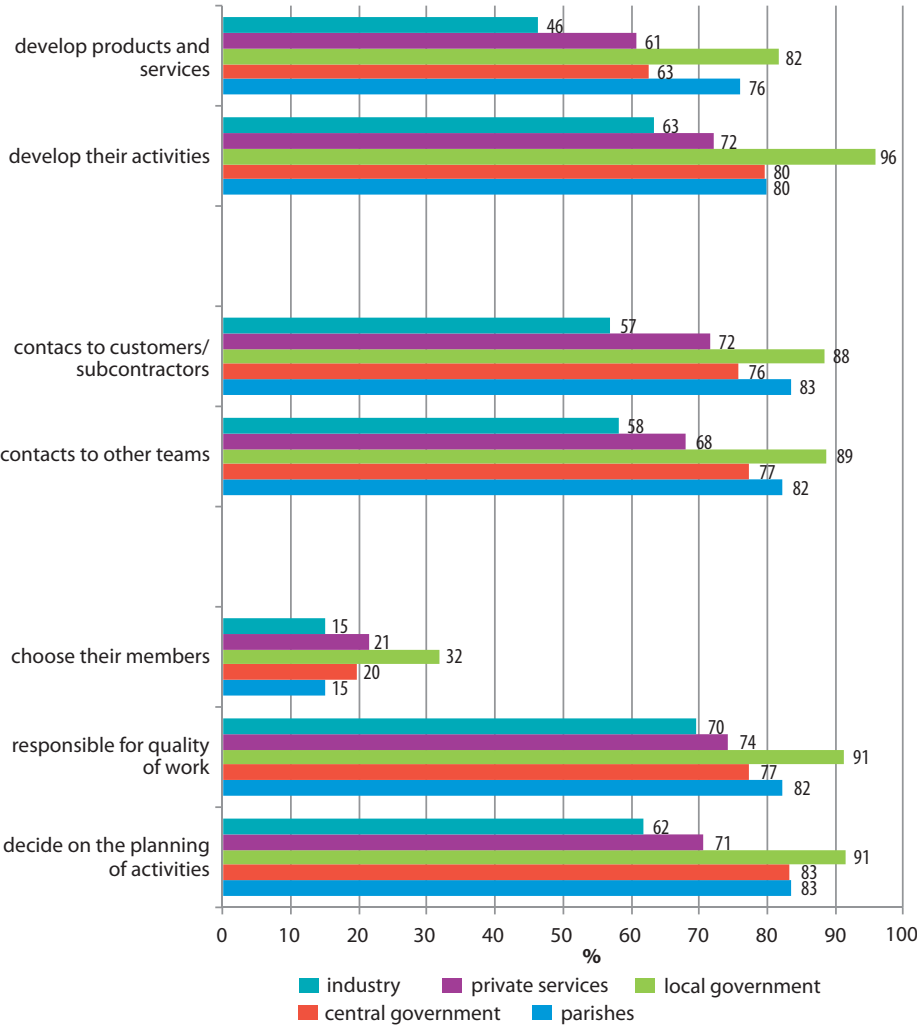
Source: Ramstad 2014.<sup>9</sup>

more demanding work tasks. Equally many estimate that they have received sufficient training to manage well with their current tasks. Despite the fact that workplace learning benefits both the employee and the employer, more than a third of employees learn new things at work less frequently than once a month or not at all. In companies in which no innovations were carried out, this answer was given by many as 50 per cent. In organisations that develop products or services or otherwise renew their operations, work is more likely to include the provision of guidance and advice to other employees.

### The role of teams in development

Development in the workplace nowadays often takes place through teams. Clear differences in team work can be detected according to sector. For example in industrial companies, the tasks and the nature of teams are very different compared to municipal sector organisations, where the power and responsibilities of teams are typically the broadest. As is evident in Figure 8, it is very common that teams are given responsibility for the development of operations and products and services in workplaces.

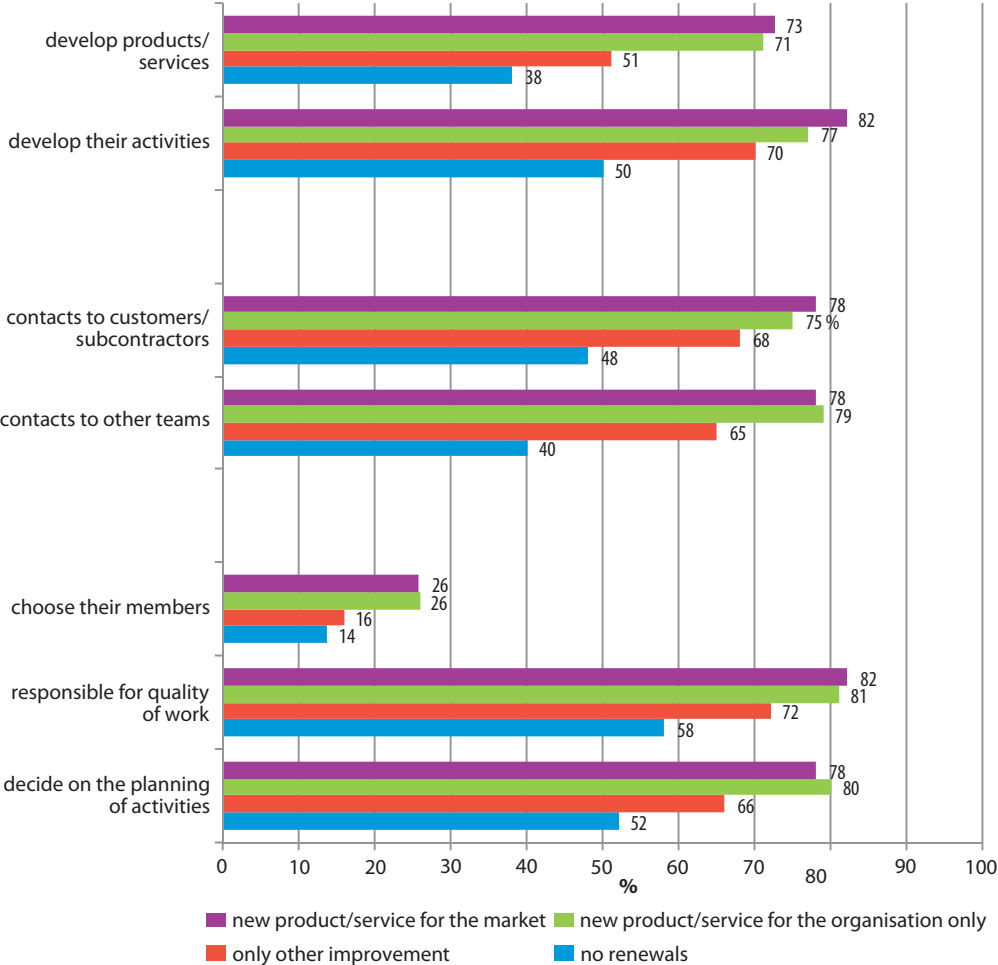
Figure 8. Self-managed team work according to sector (employer interviews).



Development work taking place in teams is linked to the idea of *self-managed team work* that has achieved greater prevalence in Finland in the last few years.<sup>10</sup> The development work performed by self-managed teams is typically directed to *existing* products and services. This is reflected in how the share of organisations where teams develop products and services is greater in all sectors compared to the share of organisations that have developed entirely *new* products and services.

A clear difference can also be detected in how work is performed together between companies that have developed new products and services, those that have developed other aspects and those that have not performed any renewals whatsoever. Companies that have developed new products and services are more likely to have teams that are in charge of their own working methods, the quality of the work performed by them and the development of both their own activities and the products and services of the company. In such companies, teams are more likely to have direct links to external customers or subcontractors too (Figure 9).

**Figure 9. Self-managed team work according to the innovation activity of companies (employer interviews).**





### Regularity of employees' participation in development

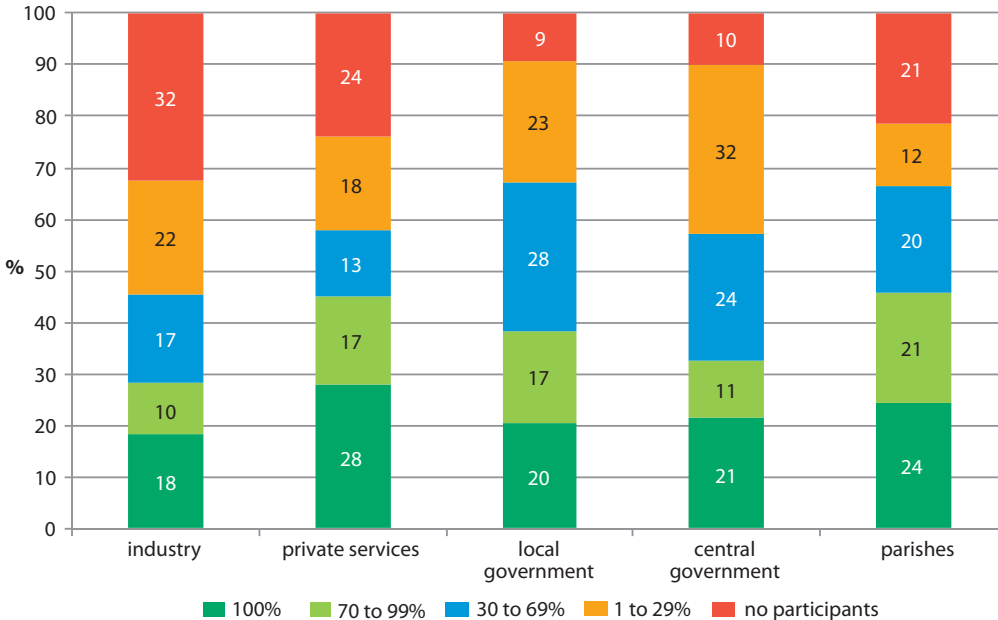
A more accurate picture of the role of personnel in development is obtained from responses to the employer survey on the proportion of personnel that participates in the development of operations in their own organisation *on a regular basis*. According to the employers, in slightly over 25 per cent of private service companies the whole personnel participates in development work on a regular basis. In other sectors participation by the whole staff is rarer. On the other hand in the private sector, there are many, particularly industrial companies, where personnel does not participate in the development of operations with any regularity (Figure 10).

In industrial companies that have produced new products and services, nearly 50 per cent of employees have

participated in development activities on a regular basis. In industrial companies that have implemented renewals regarding production processes, marketing or business only, the proportion is slightly over a third. In companies where no renewals were carried out, only one in five employees had participated in development activities on a regular basis.

In service companies, the differences are similar, but the share of participating employees tends to be higher. In service companies that have developed new products and services, on average 60 per cent of personnel have taken part in development activities, whereas for companies that have renewed other aspects of their operations only the share is approximately half. In service companies where no renewals have been carried out, about one third of personnel have taken part in development activities on a regular basis.

**Figure 10. Regular participation by employees in the development of operations, percentage of personnel according to sector (employer interviews).**



# The importance of work engagement

The precondition for success in a company are the people – both management and employees – who provide their input through their work performance. Recent research lends support to the view according to which in an increasingly knowledge and service-intensive economy, the initiative, creativity and enthusiasm of people plays an even greater role as a source of value creation, renewal and long-term success for an organisation. This kind of work-related positive emotional and motivational state can be described by the concept of *work engagement*.

## Info box 8. What does work engagement mean?

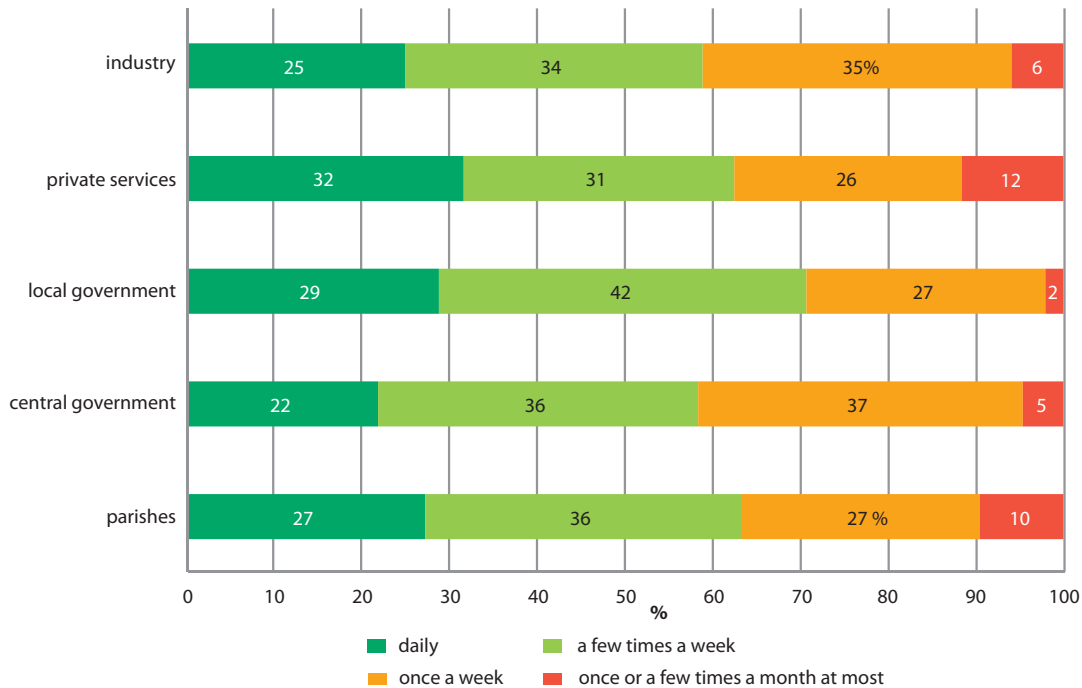
Work engagement is an emotional and motivational state associated with vigour, dedication and absorption in work that is more permanent than a fleeting experience. Vigour is characterised by feeling energetic, the willingness to invest effort in one's work and persistence and striving for success even in the face of difficulties. Dedication is described by experiencing a sense of significance and enthusiasm, inspiration, taking pride in one's work and perceiving the work as a challenge. Absorption is characterised by being fully concentrated and engrossed in one's work and the pleasure derived from this, which can make it difficult to detach oneself from work. The experience of work engagement is strengthened by challenging and diverse work tasks, opportunities to impact one's work, appreciation and support received at the workplace, encouraging leadership and the opportunity to learn new things and develop as an individual.

Source: Utrecht Work Engagement Scale 2003.<sup>11</sup>

In the MEADOW survey, work engagement was addressed through three statements, similarly to the Work and Health survey conducted by the Finnish Institute of Occupational Health.<sup>12</sup> The statements are: "I feel strong and energetic in my work", "I am enthusiastic about my work" and "I feel satisfied when I'm engrossed in my work". Almost one in three employee respondents in the MEADOW survey experienced work engagement on a daily basis and 40 per cent a few times a week. The experience of work engagement is the most frequent in organisations in the local government sector. One in ten respondents report not experiencing work engagement even weekly (Figure 11).

In change situations, it is worthwhile to secure work engagement. The change itself may not be directly associated with work engagement, but the type of change carried out and the ways in which it is implemented impact work engagement. In the data from the MEADOW survey, work engagement was the highest in organisations that had grown or that had adopted new functions. Also in organisations where power and responsibility had been differentiated or decentralised to employees or new units had been formed, work engagement was greater than average. It was the weakest in organisations that had recently implemented major reforms, such as altering the key principle of the organisation. Work engagement was also lower than average in organisations that had combined units, centralised power and responsibility or restructured themselves as leaner organisations.

Figure 11. Work engagement according to sector (employee interviews).



**Info box 9. Why is work engagement something worth striving for?**

Work engagement has a number of positive impacts both for the organisation as a whole and for the individual employee. Work engagement predicts a productive work performance better than, for example, job satisfaction and is a central prerequisite for innovativeness in an organisation. Work engagement also conveys information on the well-being of the employee. According to studies, a person who experiences work engagement

- has a more positive attitude towards his or her job and workplace,
- has less thoughts about changing jobs,
- shows initiative and acts to benefit his or her work and workplace community also voluntarily,
- performs well at work and is productive,
- is motivated to learn and educate himself or herself,
- is happier with his or her life,
- experiences work and home life as mutually enriching and
- is healthier.

Source: Finnish Institute of Occupational Health, Work Engagement.<sup>13</sup>

# Innovative organisations in Finland

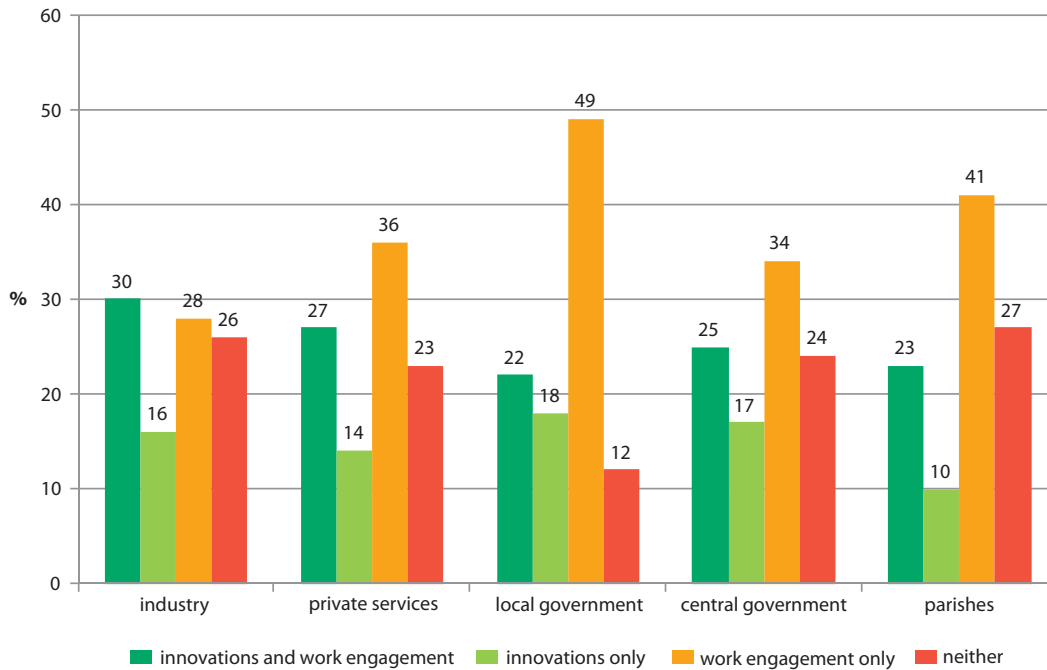
A company can be competitive for a number of different reasons. The operational environment of companies is being transformed at an increasingly rapid pace, and the changes to come may be more difficult to predict due to the globalising economy and increasing networking between actors. In a situation like this, the capacity of a company to produce innovations and renew itself assumes an even greater importance. This capacity is described by the term *innovativeness*.

A company cannot remain innovative for long if its innovativeness rests solely on the shoulders of its owner, operational management or certain individual experts. Fundamentally, the innovativeness of a company is a characteristic that

describes the company as a community: what is required is a spirit of enthusiasm and energy among personnel. For this reason, we perceive a central characteristic of an *innovative organisation* to be that it produces innovations in a way that entails work engagement as experienced by personnel. We aimed to find out how many companies and public-sector organisations there are in Finland that in the past two years have produced a new or a significantly improved product or service and in which the personnel experience work engagement at least a few times a week.

Slightly over a fourth of Finnish companies fulfil these criteria. The share is slightly greater with industrial compa-

Figure 12. Innovative organisations according to sector (employer and employee interviews).



nies than those in the service sector. Less than a fourth of public-sector organisations meet the above-listed criteria. Correspondingly, the proportion of organisations that have produced no product and service innovations and exhibit low work engagement is almost one in four of all organisations. The exception to this is the local government sector, where the share of such organisations is clearly lower than elsewhere. Finland, particularly its local government sector, has a large number of organisations where work engagement is high but innovativeness low (Figure 12).

The percentage of innovative organisations is the highest in the knowledge-intensive industry. Also companies in the capital-intensive industry and the knowledge-intensive service sectors are over-represented. The proportion of such companies is the smallest in other, non-knowledge-intensive services (Figure 13).

Activeness to develop new products and services increases consistently with the size of the company. Conversely, in small businesses with 10 to 49 employees, experiencing work engagement is more common compared to large ones. Yet, the number of companies where the development of new products and services is combined with work engagement experienced by personnel is the greatest in the category of medium-sized companies (50 to 249 employees). The combination of developing new products and services and experiencing work engagement is the rarest in small companies of 10 to 49 employees (Figure 14). In the public sector, unlike in companies, the frequency of this combination increases consistently as the size of the organisation increases (Figure 15).

**Figure 13. Innovative organisations according to industrial branch of companies (employer and employee interviews).**

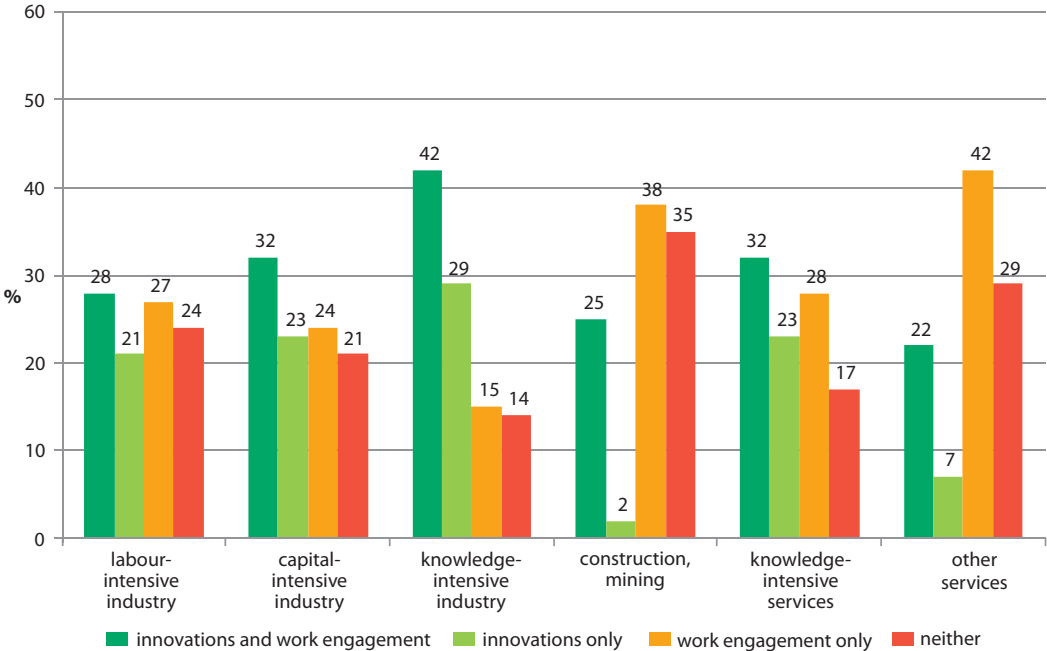


Figure 14. Innovative organisations according to company size (employer and employee interviews).

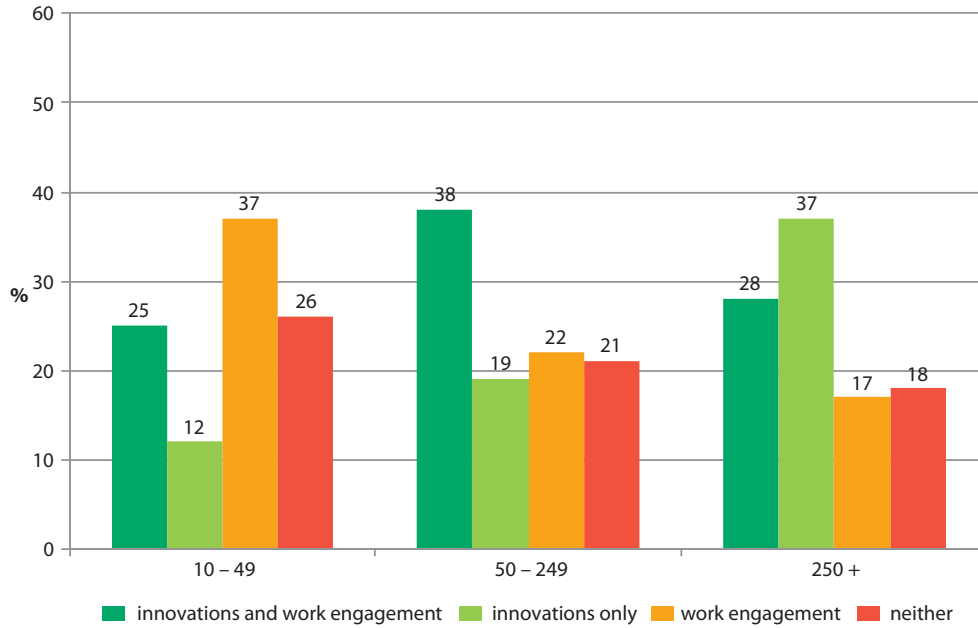
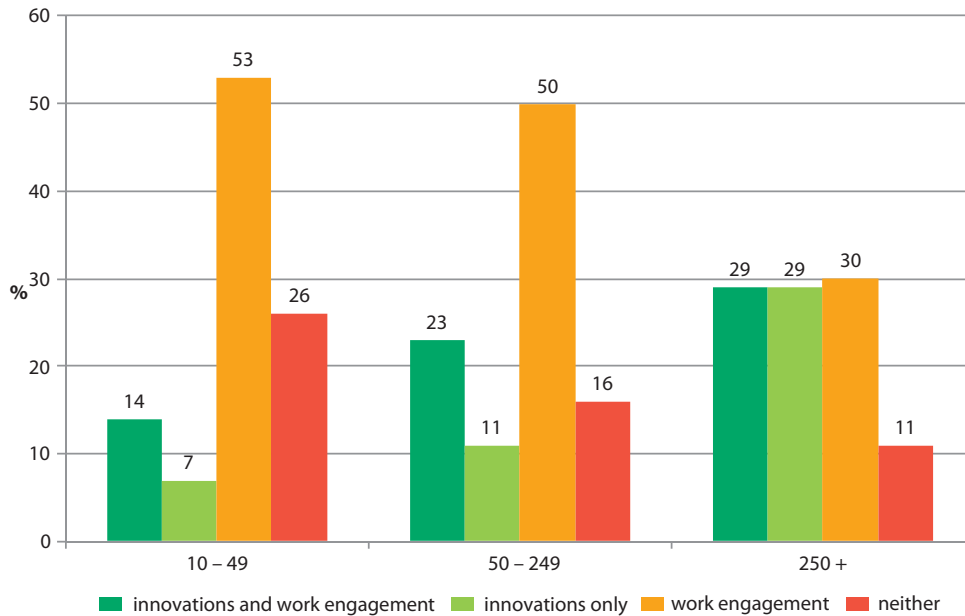


Figure 15. Innovative organisations in the public sector according to the size of the organisation (employer and employee interviews).



Can certain features be deemed characteristic of innovative organisations? This question was examined in the MEADOW research data with the help of statistical analyses separately for industrial companies, service companies and public-sector organisations. The analyses were performed by comparing innovative organisations to their opposite, i.e. organisations that had not developed new products or services and where the level of work engagement was low. The analyses show that generally applicable characteristic common to innovative organisations are difficult to find.

Among *industrial companies*, companies in the knowledge-intensive industry form a distinct group that stands out from the rest as concerns their likelihood to count among innovative organisations. In industrial companies, features characteristic of innovative companies are the regular monitoring of customer satisfaction, extensive networking with other companies (incl. the development of products or services, procurement and sales and marketing), the participation of teams in the development of new products and services, the opportunities of staff to influence their own work tasks and opportunities for flexible performance of work (incl. flexitime and telework).

In *service companies*, the characteristics of innovative organisations are weighted somewhat differently. The significance of teams that develop products and services, networking with other companies and the opportunities of employees to influence their own work are highlighted also in service companies. Another element typical of innovative organisations among service companies was that in the past two years they had carried out renewals targeted at the organisation, working methods and the division of labour between employees.

An aspect that emerged as a common trait between *public-sector organisations* and businesses was the significance of external networks particularly as concerned the development of products and services. A characteristic highlighted in innovative organisations in the public sector more clearly than in companies was the significance of social support obtained from colleagues and the significance of being part of a team in itself. In contrast to service companies, a feature typical of innovative public-sector organisations was that *no renewals* had been carried out in them in the past two years regarding the division of labour between employees, organisation and working methods.

# Development areas and proposals

The vision of the National Working Life Development Strategy launched by the Government of Prime Minister Katainen is to make working life in Finland the best in Europe by 2020. One of the four focus areas of the strategy is innovation and productivity. According to the strategy, forerunner status in this area means that businesses and organisations have excellent world-class products, services, operational concepts and workplace communities that are continuously being developed. The development is based on wide participation by personnel and constitutes a learning process for everyone involved. The most recent information and opportunities created by the development of technology are utilised in the development work. In addition to productivity, the development efforts also aim to improve the quality of working life.<sup>14</sup>

What are the critical questions that we should focus on in order to get Finland back on track from the current financial difficulties and to reach a forerunner status in Europe by 2020? In the following, we present ten development areas based on the MEADOW survey and other recent research information supplementing it as well as development proposals related to them.<sup>15</sup> Our views are guided by the above characterisation, taken from the strategy, of the meaning of forerunner status specifically in the focus area of innovation and productivity. The development proposals represent a cross-section of different policy areas. It is clear that in order to make working life in Finland the best in Europe, broad-based cooperation in the focus area of innovation and productivity is needed between different actors and policy areas.

The development areas and proposals are divided between five headings: innovation activities, management of change, new roles in working life, the digital transformation and the preparedness for change in Finnish working life.

## INNOVATION ACTIVITIES

### **1. Companies actively renew their processes and organisations, but do not invest sufficiently in product and service innovations and marketing innovations to support them.**

The imbalance of innovation activities is greater in Finland than in any other of the EU15 countries.<sup>16</sup> Finnish companies are more one-sided in their focus on cutting costs and often concentrate on extending the life cycle of their existing products and services rather than renewing them. For several years, the innovation of products and services in Finland has relied too strongly on the largest companies and the ICT sector. The competitive advantage of many SMEs that are highly dependent on larger core companies and their networks has been based on speed, flexibility and customisation for client needs and there has been no need for them to develop systematic processes for the renewal and marketing of their own products and services. However, this situation has now changed as the previously strong national clusters (e.g. in metal and engineering, wood processing and telecommunications) have disintegrated. Companies are forced to seek new recipes for success in order to survive in the global competition. *Activities to support innovation must focus more strongly in the capacity and motivation of all companies to renew their products and services too. The positive joint effects of innovations performed in different areas (products and services, processes, organisations, marketing, etc.) must be reinforced through comprehensive and systematic innovation thinking.*



## **2. Small-scale development is common in workplaces, but an increasing number of breakthrough innovations are needed alongside it.**

A great deal of resources are directed to development in Finnish workplaces. A large number of employees in all sectors and industrial branches have participated in the development of their own work and the operations, products and services of their team or workplace. It is not an exaggeration to claim that in recent years Finland has been one of the countries with the most significant investments in workplace-level development activities in Europe. However, active development efforts on the workplace level have not produced new industrial and economic structures to support growth. Continuous, step-by-step development is important, but not sufficient on its own. In addition to this, more ambitious breakthrough innovations that lead to significant improvements in productivity and alter the familiar rules and revenue generation models of markets are needed in all areas of innovation activity. Their significance is highlighted in situations where technologies develop at a rapid pace and a significant percentage of the added value in the private sector in Finland is generated by slow-growth industrial branches. Such innovations are also needed by the public sector that, in the next few years, will face significant social challenges. *In activities to support innovation, it is necessary to invest increasingly in breakthrough innovations and management skills and competencies to support them both in businesses and public-sector organisations. Small-scale development, too, must be managed in a goal-oriented manner and used to support the success of breakthrough innovations.*

## **MANAGEMENT OF CHANGE**

### **3. Organisations are undergoing major changes, but there is still room for improvement in the areas of change management and expertise concerning changes.**

Finnish have a relatively positive attitude towards change and are committed to the development of their workplace – also in an international comparison.<sup>17</sup> In the MEADOW survey, the attitude of employees to changes in their workplace and their experiences of the changes are, perhaps, surprisingly positive. Negative attitudes are generated by badly managed change. The need to reform industrial and economic structures and to seek new sources of growth means that significant changes in

the organisation's key operating principle will become increasingly common in workplaces. There are clear deficiencies in the competence required by organisational transformations. In organisations where such transformations have been carried out, work engagement is low and even lower than in organisations where functions have been cut for example through outsourcing. The lowered level of work engagement caused by poor management of change and a subsequent decline in productivity often negate the benefits, such as financial gain, expected from the change. *The skills and competencies required by demanding changes in operations and organisation and the comprehensive management of these changes must be improved so that people are able to experience the renewals increasingly as opportunities rather than threats. Change management must be developed so that a better balance is achieved between perspectives related to management and leadership.*

### **4. Public-sector organisations exhibit plenty of work engagement, but it is not sufficiently channelled into innovativeness.**

Work engagement is experienced more often in local government organisations. However, in the public sector and particularly in local government organisations, work engagement often does not manifest itself as innovativeness, even though much of the work is self-managed and the teams hold responsibility for development. In the light of the MEADOW survey, everyday development work carried out by personnel and major changes in operations do not come together in an effective manner in the public sector. Management of change in public organisations is often highly complex work and explaining reasons for the changes to personnel can be a difficult task.<sup>18</sup> The views of personnel on the impacts of the changes in operations are negative in several respects. It is alarming that one characteristic of innovative public organisations compared to their opposite is that no reforms focusing on division of labour between employees, organisation or working methods have been carried out in them. This would indicate that in many cases the impact of the changes was to reduce rather than boost innovation. *In public-sector change management, it is necessary to locate means by which to bring everyday development work carried out by personnel closer to needs for change arising from political pressures. Strong work engagement exhibited by personnel is an important resource in public organisations that must be utilised more effectively when planning and implementing changes.*

## NEW ROLES IN WORKING LIFE

### **5. The significance of leadership is highlighted in the changing working life, but it should be increasingly shared.**

The innovativeness of organisations is a feature of the community. Even if new ideas and visions were originally generated by certain individuals or teams, their implementation as value-creating innovations requires broad-based cooperation and commitment throughout the organisation. In Finnish workplaces, the distribution of power and responsibility both in development and regular activities is in reality still largely based on traditional hierarchical management thinking regardless of the increased prevalence of self-managed team work and an overall rise in competence level. This is not visible simply as better opportunities for influence and participation for people in managerial positions, but also as a much greater workload of these people.<sup>19</sup> In the MEADOW survey, managers experienced more stress than other employees and in service companies and public-sector organisations fewer managers experienced work engagement on a daily basis compared to their subordinates. It is difficult to imagine that, in the present situation, the managers would be able to provide credible encouragement to their subordinates to help them achieve good work performance. *Managerial work must be developed into the direction of shared leadership by an open-minded re-defining of the work roles and by creating new applications for self-managed team work. The work community skills required by shared leadership from both employees and managers must be incorporated into education and training on various levels more broadly than it is today.*

### **6. The role of employees in the development of operations is recognised, but not yet in nearly all workplaces.**

On average, Finnish workers have plenty of opportunities to participate in developing the operations of their workplace. Further, these opportunities have been improved in recent years.<sup>20</sup> However, the favourable development and the progressiveness of Finland compared to many other European countries easily conceals the reality that still today, in a large number of workplaces, this opportunity does not exist. The lack of opportunities for participation applies most frequently to blue-collar workers and businesses that have not carried out renewals as concerns their products, services and ways of

producing them in recent years. According to the MEADOW survey, a third of industrial companies and in one in four service companies personnel does not participate in the development of operations with any regularity. Such enterprises can be found in all size groups. The capacity of management to promote a "caring culture" where personnel feels that the managers genuinely encourage creativity and the generation of ideas of everyone holds a key position. *Knowledge of the significance of employee-driven innovation and generation of ideas must be increased particularly in sectors where such culture does not exist. To support employee-driven innovation and generation of ideas, it is necessary to develop suitable operating methods, tools and the capabilities required by their use.*

## DIGITAL TRANSFORMATION

### **7. The digital transformation is here, but the different actors in society have been slow to wake up to this reality.**

Finland has a reputation as an advanced information society. This reputation was created by belonging to the "family" of Nordic welfare states, combined with the spectacular success of Nokia and a large share of high technology in export. However, Finland's long success as a producer of ICT-based products has managed to obscure the fact that Finnish companies as a whole have not been very progressive users of ICT. Finland's productivity growth has depended on a few sectors and companies, and growth achieved through the use of ICT as such has been modest compared to several other developed industrial countries.<sup>21</sup> ICT has been perceived more as a tool to streamline existing processes and operations than as a platform for breakthrough innovations in products and services or business and the organisation of operations. Achieving new growth in both productivity and employment requires a creative and diverse perception of the possibilities of ICT and its systematic and comprehensive utilisation as part of all activities. *The skills and competencies of companies in areas such as business, management and work organisation and their prerequisites to act as forerunners in the digital transformation must be strengthened especially in sectors outside of the knowledge-intensive industries and services. In innovation management, it is necessary to invest particularly in the "fuzzy" front end of the innovation process where the focus is on mapping the opportunities entailed in the digital transformation and locating new ideas.*

**8. Finns have a good level of digital skills and competencies, but these skills and competencies are poorly utilised by companies.**

Finland is one of the top countries in the world when it comes to the citizens' preparedness to utilise digital media and information networks. In particular, Finnish young people and young adults are among the pioneers of the digital world, also from an international standpoint. It is thus surprising that this does not appear to have shaped into a significant competitive advantage for businesses in Finland. For example, the utilisation of social media is low particularly in industrial companies. According to the MEADOW survey, social media is utilised in the development of products and services by just one in ten companies.<sup>22</sup> In contrast to the capabilities of citizens, the capabilities of Finnish companies to utilise digitalisation in the overall development of their business activities until now appears rather bleak in the light of international comparison.<sup>23</sup> Not all companies possess sufficient digital expertise in themselves. To narrow the gap between the opportunities provided by digitalisation and their utilisation, increasingly open models for innovation and development that the companies can use also to form connections to experts outside of their own organisation are required. The rapid development of social media and other aspects of the interactive Internet are continuously generating better opportunities for this. *The utilisation of the interactive Internet and cooperation between companies and different digitally networked user and knowledge communities in innovation activities and development must be enhanced. Awareness of the key strategic significance of networking for innovation must be increased among companies.*

**PREPAREDNESS FOR CHANGE IN FINNISH WORKING LIFE**

**9. In recent years, Finnish workplaces have undergone a large number of changes, but improvements in the quality of working life have not been sufficient.**

In recent years, Finnish working life has undergone a great deal of change at a rapid pace. This is evident in the frequency of technological, organisational and other operational change in workplaces. Even though the attitude of Finns to changes in their own workplace has been relatively positive, the numerous changes have not had a sufficient overall impact on the quality of working life. In the light of the most common indicators of the area, the quality of working life has

not deteriorated in recent years, although it is also not possible to detect clear improvement, either.<sup>24</sup> The slow development of working life threatens to lead to a growing underuse of the increased skills and competencies of Finns in the area of work, growing frustration towards the contents of work and a decline in the significance of paid labour in relation to other areas of life. At the current rate, achieving the vision of the National Working Life Development Strategy by 2020 seems unrealistic. *Experimental development of the ways of organising and performing work that promotes people's opportunities to develop and influence their work must be encouraged and supported. In order to make Finnish working life the best in Europe, it is necessary to promote the "rethinking of work" in all key sectors and industrial branches.*

**10. Finns are committed to the values of the industrial work society, but these alone are not sufficient to renew industrial and economic structures.**

Finns have internalised the values of the industrial work society. Work has important significance as an element bringing meaning and content to life, and work is performed for the good of one's organisation or community in a diligent, reliable and persevering manner. The significance of this set of values as a success factor for Finland in the future is by no means self-evident, however. The values of the industrial work society adopted by Finns may have supported the participation of personnel in small-scale development in workplaces, but the renewal of the industrial and economic structures also requires the capacity to implement breakthrough innovations and to carry out radical organisational transformations. The renewal of structures requires a set of values and work culture that emphasise courage, enthusiasm and preparedness for risk-taking but also openness, tolerance, diversity and the capacity for broad-based cooperation and networking. These, however, are not characteristics typically highlighted in the values of Finns.<sup>25</sup> Finnish work culture, too, requires updating, as we aim to become the best in Europe in the area of innovation and productivity. *To update Finnish work culture, leadership must be developed to respond to the challenges of future working life particularly in the areas of managing networks, diversity and enthusiasm. The attitudes and skills and competencies required in the changing working life must be reinforced in the different levels of education and training.*

In the following, the development areas and proposals are summarized in a table form (Table 1).

**Table 1. Summary of the development areas and proposals.**

Development areas	Development proposals
<p><b>1.</b> Companies actively renew their processes and organisations, but do not invest sufficiently in product and service innovations and marketing innovations to support them.</p>	<p><b>1A.</b> Activities to support innovation must focus more strongly in the capacity and motivation of all companies to renew their products and services too.</p> <p><b>1B.</b> The positive joint effects of innovations performed in different areas (products and services, processes, organisations, marketing, etc.) must be reinforced through comprehensive and systematic innovation thinking.</p>
<p><b>2.</b> Small-scale development is common in workplaces, but an increasing number of breakthrough innovations are needed alongside it.</p>	<p><b>2A.</b> In activities to support innovation, it is necessary to invest increasingly in breakthrough innovations and management skills and competencies to support them both in businesses and public-sector organisations.</p> <p><b>2B.</b> Small-scale development, too, must be managed in a goal-oriented manner and used to support the success of breakthrough innovations.</p>
<p><b>3.</b> Organisations are undergoing major changes, but there is still room for improvement in the areas of change management and expertise concerning changes.</p>	<p><b>3A.</b> The skills and competencies required by demanding changes in operations and organisation and the comprehensive management of these changes must be improved so that people are able to experience the renewals increasingly as opportunities rather than threats.</p> <p><b>3B.</b> Change management must be developed so that a better balance is achieved between perspectives related to management and leadership.</p>
<p><b>4.</b> Public-sector organisations exhibit plenty of work engagement, but it is not sufficiently channelled into innovativeness.</p>	<p><b>4A.</b> In public-sector change management, it is necessary to locate means by which to bring everyday development work carried out by personnel closer to needs for change arising from political pressures.</p> <p><b>4B.</b> Strong work engagement exhibited by personnel is an important resource in public organisations that must be utilised more effectively when planning and implementing changes.</p>
<p><b>5.</b> The significance of leadership is highlighted in the changing working life, but it should be increasingly shared.</p>	<p><b>5A.</b> Managerial work must be developed into the direction of shared leadership by an open-minded redefining of the work roles and by creating new applications for self-managed team work.</p> <p><b>5B.</b> The work community skills required by shared leadership from both employees and managers must be incorporated into education and training on various levels more broadly than it is today.</p>
<p><b>6.</b> The role of employees in the development of operations is recognised, but not yet in nearly all workplaces.</p>	<p><b>6A.</b> Knowledge of the significance of employee-driven innovation and generation of ideas must be increased particularly in sectors where such culture does not exist.</p> <p><b>6B.</b> To support employee-driven innovation and generation of ideas, it is necessary to develop suitable operating methods, tools and the capabilities required by their use.</p>

Development areas	Development proposals
<p><b>7.</b> The digital transformation is here, but the different actors in society have been slow to wake up to this reality.</p>	<p><b>7A.</b> The skills and competencies of companies in areas such as business, management and work organisation and their prerequisites to act as forerunners in the digital transformation must be strengthened especially in sectors outside of the knowledge-intensive industries and services.</p> <p><b>7B.</b> In innovation management, it is necessary to invest particularly in the “fuzzy” front end of the innovation process where the focus is on mapping the opportunities entailed in the digital transformation and locating new ideas.</p>
<p><b>8.</b> Finns have a good level of digital skills and competencies, but these skills and competencies are poorly utilised by companies.</p>	<p><b>8A.</b> The utilisation of the interactive Internet and cooperation between companies and different digitally networked user and knowledge communities in innovation activities and development must be enhanced.</p> <p><b>8B.</b> Awareness of the key strategic significance of networking for innovation must be increased among companies.</p>
<p><b>9.</b> In recent years, Finnish workplaces have undergone a large number of changes, but improvements in the quality of working life have not been sufficient.</p>	<p><b>9A.</b> Experimental development of the ways of organising and performing work that promotes people’s opportunities to develop and influence their work must be encouraged and supported.</p> <p><b>9B.</b> In order to make Finnish working life the best in Europe, it is necessary to promote the “rethinking of work” in all key sectors and industrial branches.</p>
<p><b>10.</b> Finns are committed to the values of the industrial work society, but these alone are not sufficient to renew industrial and economic structures.</p>	<p><b>10A.</b> To update Finnish work culture, leadership must be developed to respond to the challenges of future working life particularly in the areas of managing networks, diversity and enthusiasm.</p> <p><b>10B.</b> The attitudes and skills and competencies required in the changing working life must be reinforced in the different levels of education and training.</p>

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- <sup>1</sup> The matter can also be expressed as follows: we are interested in organisation-level factors associated with the “growth competitiveness” – or more broadly the “renewal competitiveness” – of Finnish companies and public-sector organisations. So far, this perspective has been rare in discussion on Finnish competitiveness partly due to the lack of existing statistical and research data. For more detailed information on concepts and indicators describing competitiveness, see Maliranta, M. (2014) *Kustannuskilpailukyky kasvuunestymisen ehtona: mittausta, osatekijöitä ja tulkintaa* (Helsinki: ETLA B264). [http://www.etla.fi/wp-content/uploads/Kustannuskilpailukyky\\_kasvuunestymisen\\_ehtona\\_ETLA\\_B264\\_low\\_res\\_kansilla.pdf](http://www.etla.fi/wp-content/uploads/Kustannuskilpailukyky_kasvuunestymisen_ehtona_ETLA_B264_low_res_kansilla.pdf)
- <sup>2</sup> Edmund Phelps, the 2006 Nobel Laureate in Economics, writes this in his 2013 work *Mass Flourishing: How Grassroots Innovation Created Jobs, Challenge and Change* (Princeton, NJ: Princeton University Press). In Finland, the significance of enthusiasm as a prerequisite for productivity and innovativeness has been explored, among others, by Martela and Jarenko in their report *Sisäinen motivaatio: tulevaisuuden työssä tuottavuus ja innostus kohtaavat* (Eduskunnan tulevaisuusvaliokunnan julkaisu 3/2014) [http://www.eduskunta.fi/triphome/bin/thw.cgi/trip?\\${APPL}=erekj&\\${BASE}=erekj&\\${HWIDS}=0.47/1400144687\\_114717&\\${TRIPPIFE}=PDF.pdf](http://www.eduskunta.fi/triphome/bin/thw.cgi/trip?${APPL}=erekj&${BASE}=erekj&${HWIDS}=0.47/1400144687_114717&${TRIPPIFE}=PDF.pdf)
- <sup>3</sup> The MEADOW survey was also conducted in Norway, Sweden and Denmark in the 2010s. A total of three reports produced by researchers from the University of Tampere have been published on the Finnish MEADOW survey. They contain more detailed presentation of the survey and its results. For further information, see:

  - Aho, S. & Mäkiäho, A. (2013) *Organisaatioiden ja työn dynamiikka työnantajien näkökulmasta: MEADOW-tutkimuksen I väliraportti*. Tekesin katsaus 299/2013. Helsinki: Tekes. [http://www.tekes.fi/u/Meadow\\_1.pdf](http://www.tekes.fi/u/Meadow_1.pdf)
  - Minkkinen, J., Aho, S. & Mäkiäho, A. (2013) *Organisaatioiden ja työn dynamiikka työntekijöiden näkökulmasta: MEADOW-tutkimuksen II väliraportti*. Tekesin katsaus 300/2013. Helsinki: Tekes. [http://www.tekes.fi/u/Meadow\\_2.pdf](http://www.tekes.fi/u/Meadow_2.pdf)
  - Aho, S., Minkkinen, J. & Mäkiäho, A. (2014) *Organisointikäytännöt, innovatiivisuus ja hyvinvointi: työnantaja- ja työntekijähaastatteluja yhdistävään MEADOW-aineistoon perustuva tutkimus*. Tekesin katsaus 310/2014. Helsinki: Tekes. [http://www.tekes.fi/u/Meadow\\_III.pdf](http://www.tekes.fi/u/Meadow_III.pdf)
- <sup>4</sup> The employer representatives interviewed generally represent the top management of the company or public-sector organisation. The employees interviewed do not represent a random sampling of all Finnish wage earners. The sample excludes, among others, those working in employer units of less than 10 persons and those who have worked less than 1.5 years in the unit in question. The purpose of the employee interviews was not to provide a statistically representative picture of the working conditions of Finnish wage earners, but to supplement the information that was obtained from register data and employer interviews about the employer units that were the target of the survey.
- <sup>5</sup> The comparisons are based on data from the European Company Survey implemented by the European Foundation for the Improvement of Living and Working Conditions (Eurofound) in 2013. The data is available at <http://www.eurofound.europa.eu/DVS/DVT/?dataSource=3RDECS>
- <sup>6</sup> OECD (2013) *OECD Skills Outlook 2013: First Results from the Survey of Adult Skills*. OECD Publishing. [http://skills.oecd.org/OECD\\_Skills\\_Outlook\\_2013.pdf](http://skills.oecd.org/OECD_Skills_Outlook_2013.pdf)
- <sup>7</sup> Eurofound (2012) *Fifth European Working Conditions Survey*. Luxembourg: Publications Office of the European Union. <http://www.eurofound.europa.eu/publications/htmlfiles/ef1182.htm>
- <sup>8</sup> Lyly-Yrjänäinen, M. (2014a) *Työolobarometri syksy 2013*. TEM-julkaisuja, Työ ja yrittäjyys 32/2014. Helsinki: TEM.
- <sup>9</sup> Ramstad, E. (2014) *Toimintatapamuutosten yhteys tuloksellisuuden ja työelämän laadun samanaikaiseen paranemiseen*. Työpoliittinen aikakauskirja 2/2014, 23-39. <http://www.tem.fi/files/40362/tak22014.pdf>
- <sup>10</sup> According to the European Company Survey, in 2013 Finland was one of the top countries in Europe in the prevalence self-managed team work together with Sweden and Denmark.
- <sup>11</sup> Schaufeli, W. & Bakker, A. (2003) *Utrecht Work Engagement Scale: Preliminary Manual*. Utrecht: Utrecht University, Occupational Health Psychology Unit. [http://www.beanmanaged.com/doc/pdf/arnoldbakker/articles/articles\\_arnold\\_bakker\\_87.pdf](http://www.beanmanaged.com/doc/pdf/arnoldbakker/articles/articles_arnold_bakker_87.pdf)
- <sup>12</sup> The Work and Health Telephone Survey by the Finnish Institute of Occupational Health collects follow-up data on the work, working conditions and occupational health of the working population in Finland. Questions on work engagement were part of the survey in 2006, 2009 and 2012. [http://www.ttl.fi/fi/verkkokirjat/tyo\\_ja\\_terveys-suomessa/sivut/default.aspx](http://www.ttl.fi/fi/verkkokirjat/tyo_ja_terveys-suomessa/sivut/default.aspx)



- <sup>13</sup> For the meaning of work engagement, see the website of the Finnish Institute of Occupational Health. [http://www.ttl.fi/fi/tyohyvinvointi/tyon\\_imu/miksi\\_tyon\\_imu\\_on\\_tarkeaa/sivut/default.aspx](http://www.ttl.fi/fi/tyohyvinvointi/tyon_imu/miksi_tyon_imu_on_tarkeaa/sivut/default.aspx)
- <sup>14</sup> Ministry of Employment and the Economy (2012) *National Working Life Strategy to 2020*. Helsinki: Ministry of Employment and the Economy. [http://www.tyoelama2020.fi/files/104/Strategy\\_2020.pdf](http://www.tyoelama2020.fi/files/104/Strategy_2020.pdf)
- <sup>15</sup> We refer to individual sources only in exceptional cases. See below for a list of other sources used in addition to those cited previously in this report:
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- <sup>16</sup> This conclusion can be drawn in the light of the figures from the European Company Survey, when different countries are compared regarding the proportion of companies that have renewed their products and services and, on the other hand, their process and organisation.
- <sup>17</sup> For example, according to the fifth European Working Conditions Survey implemented in 2010, Finland represents the top EU countries in how workers perceive their own organisation motivates them to the “best possible” work performance. The data is available at [http://www.eurofound.europa.eu/surveys/smt/ewcs/ewcs2010\\_11\\_07.htm](http://www.eurofound.europa.eu/surveys/smt/ewcs/ewcs2010_11_07.htm)
- <sup>18</sup> According to the MEADOW survey, the most commonly cited reasons for changes in operations in companies are *financial*, such as changes in demand and increased competition. In the public sector, on the other hand the significance of reasons that can be considered *political* in nature, such as cuts in appropriations, was highlighted. These were the second most common reason in the local and central government sector and the number one reason for parishes.
- <sup>19</sup> Lyly-Yrjänäinen, M. (2014b) *Työpaikkojen toimintatapojen uudistuksiin liittyy oppimismahdollisuuksia ja kuormitus-tekijöitä*. Työpoliittinen aikakauskirja 2/2014, 69–77. <http://www.tem.fi/files/40362/tak22014.pdf>
- <sup>20</sup> Lyly-Yrjänäinen (2014b).
- <sup>21</sup> Miller & Atkinson (2014). In recent years, the impact of the use of ICT on the growth of GDP has remained much more modest in Finland than, for example in Sweden and Denmark as well as several other developed industrial countries. It has also been proposed that the better competence of American companies in the utilisation of ICTs explains as much as 50 per cent of the differences in growth in productivity between Europe and the US.
- <sup>22</sup> The proportion is almost exactly the same as the one cited by the European Company Survey as the share of Finnish companies utilising social media or other electronic platforms in the development of the organisation of work in cooperation with personnel.
- <sup>23</sup> According to the Digibarometer 2014, for example, the preconditions for the utilisation of digitalisation have not been realised in Finland on company level e.g. as the use of cloud services, online procurement or success in online business nearly as well as they have in other Nordic countries. The Technology Barometer 2014 survey conveys a very similar message.
- <sup>24</sup> Such indicators include opportunities for learning and development in the workplace, opportunities contained in the work to influence work tasks, working methods and the pace of work, and work load.
- <sup>25</sup> See also Haavisto, I. (2014) *Työlle ahneet – suomalaiset arvostavat ahkeruutta, mutta ovat huonoja jakamaan*. Helsinki: EVA. <http://www.eva.fi/wp-content/uploads/2014/07/Tyolle-ahneet2.pdf>

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