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Virtual Joint Companies as a Means of Incentivizing SMEs to Use Occupational Health Services—A Trial in Two Municipalities in Finland From 2009 to 2011

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Employees of Small and Medium-sized Enterprises (SMEs) can benefit from occupational health services (OHS) in the same way that employees of large organizations do. The aim of this 3-year trial was to investigate whether integrating multiple SMEs into virtual joint companies may result in incentive structures like those of large companies concerning access to Occupational Health Services (OHS), which can improve wellbeing and reduce the number of sickness visits to clinics. Several SMEs were grouped together to form virtual organizations to enter into agreements with OHS providers. Two groups were created, each with a somewhat different price structure: one with a fixed annual fee and the other with a cost-dependent fee. The number of sickness visits to clinics increased among those who worked under the cost-dependent fee system, whereas it decreased among those who worked under the fixed-fee system. The findings on the work climate were inconclusive because there was no discernible difference. The improved productive time was particularly appealing to SME businesses, since employees could rapidly schedule sickness visit and they were able to spend less time dealing with sickness-related paperwork. It also raised their awareness of their employees' health. When OHS providers could address SMEs as a group, their desire to collaborate with them improved. Furthermore, the local entrepreneur organizations, which served as the virtual headquarters for the SME groups, stated that they would be willing to continue with the work for a rather moderate compensation. The ability of SMEs to create legal organizations in the form of virtual joint companies appears to address, at least partially, the issues related with the conflict between their small sizes and Occupational Safety and Health (OSH) incentive systems to address work accidents and disease incidences. Using the proposed approach would allow for differential fee systems, as well as economic incentive systems, which presently apply predominantly to large firms, might be extended to SMEs.

Keywords: virtual joint companies, economic incentive, occupational health services, Small and Medium-sized Enterprises (SMEs), safety and health compliance

INTRODUCTION

According to previous studies, occupational safety, and health (OSH) interventions may considerably enhance workers' health while also positively impacting business outcomes (Cancelliere et al., 2011; Goetzel et al., 2014; Song and Baicker, 2019). Some reviews even show that OSH might minimize health care expenditures and absenteeism (Grimani et al., 2018), as well as have a good economic impact (Lerner et al., 2013) and return on investment (Unsal et al., 2021). Despite the compelling business case, investment in occupational health services (OHS) varies considerably across companies (Unsal et al., 2021). The size, type, and industry sector have been identified as critical in determining which organizations may adopt OSH (McCoy et al., 2014). For example, investment in OSH is more common in large/medium businesses, likely due to their strong wellbeing culture and more discretionary funding, as compared to small businesses (McCoy et al., 2014; Taylor et al., 2016). Investment decisions in OSH could also be impacted by different factors such as funding, time, and management support (Taylor et al., 2016). Considering the gaps such as unnoticed high costs for employers and the strong business case for OSH, there is an urgent need to improve OHS provision to *Small and Medium-sized Enterprises* (SMEs).

Few studies have investigated the factors that motivate managers to commit to resources to OSH. Those studies have suggested that regulations, economic incentives, and ethical reasons are important (Miller and Haslam, 2009; Martinsson et al., 2016). Various incentives identified seemed to influence the decision-making in parallel with each other in Martinsson et al.'s (2016) analysis, namely: regulations, effects on the workplace, knowledge of the program, characteristics of the intervention, communication, and collaboration with the provider. In a recent review of ways of improving compliance with OSH regulations, Walters et al. (2021) analyze, among others, the role of economic incentives. "Compliance promotion refers to any activity that encourages voluntary compliance with regulatory standards" (Walters et al., 2021, p. 11; Parker and Nielsen, 2011). Compliance promotion includes economic incentives, which cover e.g., taxes, subsidies, and tradeable rights. Economic incentives are part of indirect measure in opposite to direct command-and-control measures. According to Walters et al. (2021, p. 66) the trend among EU member states has during the recent decades been toward more indirect measures, including economic incentives. Furthermore, "Several studies within EU Member States published in the early 2000s continued to explore these issues, finding some evidence for the success of various schemes (Krüger et al., 2000; Munich Re Group, 2000, 2002, 2005; Miller et al., 2002; Nicholson et al., 2006; Walters et al., 2021, p. 69).

Economic incentives can be divided into those which emphasize the cost of non-compliance and those which underline the economic benefits of compliance. We could call them negative and positive economic incentives. Based on the report of Walters et al. (2021), it can be concluded that negative economic incentives are rather non-effective, because they are perceived as marginal financial impacts on companies. In general, economic incentives seem to be less applicable to SME businesses than larger organizations (Walters et al., 2021, p. 72). As a result, it is important to understand the economic incentives for organizational compliance in OSH, as well as what alternative techniques regulatory bodies might employ to increase OSH compliance. Understanding the elements that promote OSH compliance in businesses of all sizes and industrial sectors can assist to influence future OSH research priorities.

According to an EU-OSHA report, Finland is one of the countries that exemplifies a focus on economic incentives (Walters et al., 2021, p. 70). In Finland occupational health services (OHS[1]), workers' compensation insurance and invalidity pension are based on certain incentive systems. Concerning OHS, the main incentive system consists of reimbursements to employers for their OHS expenditures (Yrjänheikki and Savolainen, 2000). There are mixed research findings about the economic effectiveness of OHS expenditure in Finland (Kankaanpää et al., 2008; Aura and Ahonen, 2016, p. 92). There seems to be no direct link between the amount of OHS expenditure and the financial performance of the company, but indirect effects via improved employee health, employee retention and engagement (Ibid.). Accident insurance and invalidity pension premiums are diversified to favor safe workplaces (Kankaanpää, 2010). For mathematical reasons, insurance and pension premiums for SMEs are not diversified (Soikkanen, 2009; Walters et al., 2021, p. 72). Therefore, premiums become more diversified as the company grows larger. In the case of OHS, the incentive system does not work because the perceived benefits do not exceed the perceived costs.

In Finland all employees are covered by mandatory occupational health services (OHS) (Yrjänheikki and Savolainen, 2000). In practice all employees of micro-companies (<10 employees) are not covered by OHS. The services are provided by private OHS-providers, public health centers and own OHS-units of large companies. The main incentive for companies to make contracts with OHS-providers is that the employers can get about half of their OHS expenditures reimbursed by the Social Insurance Institution[2] (Kela) (Kankaanpää et al., 2008). Both service providers and the management of SMEs are unwilling to invest the time and effort required to receive the Kela-reimbursement. To receive the reimbursement, the OHS providers must make annual reports for their customers, who must make the applications to Kela. They rather let their personnel use free public health services, which are inferior to OHS from an occupational health point of view. It is also common for SMEs not to apply for reimbursements for personnel health costs to avoid bureaucracy.

A pilot study, called FUSK, was put up from 2008 and 2011 in Finland, where several SMEs established bigger consortia to benefit from an OHS-related incentive system. The basic idea of the trial was to gather several SMEs to virtual corporations, with a right to make agreements with OHS providers. Employees of SMEs may benefit from occupational health services (OHS) in

[1]We use OHS as an abbreviation of occupational health services, and OSH as an abbreviation of occupational safety and health.

[2]To be more specific, the companies first pay wage and salary-related charges to Kela, which then reimburses them for actual OSH-costs.

the same way that employees of large organizations do, and SMEs' management could concentrate on their core business activities. For the moment, only individual companies are legally allowed to make such agreements and to apply for reimbursements for their OHS expenditures from the Social Insurance Institution (Kela) (Meyer-Arnold, 2022). To do that, local entrepreneur associations agreed to serve as the virtual organizations' main offices, with SMEs serving as branch units. The main office handled all communication, reporting, and financial transactions connected to the participating SMEs OHS activities. The trial research must be constructed to avoid legal problems. One of the statutes stated that the head offices of virtual businesses might only request for reimbursement for one company each year. As a result, separate funds from a research grant (mainly by the Ministry of Health and Welfare) were used to pay the reimbursements. So, for 3 years, the virtual corporations sought for and received OHS reimbursements from a virtual Kela. The aim of this 3-year trial was to investigate whether integrating multiple SMEs into virtual joint companies may result in incentive structures like those of large companies concerning OHS, which can improve wellbeing and reduce number of sickness visits.

RESEARCH QUESTIONS

The research questions of the project were:

- How do group based OHS arrangements affect personnel number of sickness visits and wellbeing at work?
- How does the presented model promote the OHS-providers' interest to provide services to SMEs?
- What eventual problems with the FUSK model were noticed?

MATERIALS AND METHODS

The FUSK trial was conducted in two small Finnish municipalities in Kimito and Åland Islands from 2009 to 2011 to increase the incentives for SMEs to provide adequate occupational health services (OHS) to their personnel. The study results were intended to be broadly applicable to the workers' compensation and invalidity pension systems. A report on the study was originally published in Swedish language (Bruncrona et al., 2012). In this trial, 48 SMEs (157 persons) at Kimito island (64 persons) and Åland island (93 persons) for 3 years formed two virtual corporations, so that all the member companies received the same OHS services and benefits that the combined organizations received. The trial still needs to be published, because it has not been presented for an international audience before and because the relevant legislation is unchanged since the trial (Meyer-Arnold, 2022). Furthermore, the KivaQ control data (KivaQ, 8000) from years 2000–2012 ($n = 8{,}000$) are practically the same as the equivalent data for years 2013–2022 ($N = 33\,700$) (Näsman, 2022).

The Incentive Model (Intervention)

The incentive model is based on non-legal (virtual) groups of SMEs, which are represented by a local entrepreneur organization. The local entrepreneur organizations acted as virtual headquarters (VHQ) of the "virtual joint corporations," which made agreements with occupational health service (OHS) providers for the member SMEs. The VHQ made common OHS plans for their member companies, made agreements with OHS providers and took care of all related monetary transactions on behalf of the member companies. The member companies paid an annual fee according to agreed principles. The OHS providers made annual OHS plans and reports for the virtual corporations, on basis of which the VHQ applied for refunds for their OHS expenditures for each year. The member companies did not have to worry about the amount of health costs of its employees, who received professional occupational health care. The sick-leave wages were paid to the employees according to existing collective bargaining agreements.

Two payment models were applied:

- on Kimito island the participants paid an annual fee to the VHQ, based on previous experiences of the OHS provider. The SMEs only paid the net cost (about 300 € per employee), which was the total cost (500 €) minus the reimbursement (200 €). In this model the OHS provider could win or lose money, depending on the actual annual costs.
- on Åland island the OHS provider charged monthly the VHQ for every service provided. The VHQ charged from the participating SMEs annually the same fee per employee. The fee could vary from year to year depending on the actual costs.

A control group of SMEs, comprising of all other member companies of the local entrepreneurial association with no more than 25 employees, was formed to strengthen the credibility of the conclusions. The control group was made up of entrepreneurs and workers from local business groups on Kimito and Åland who did not engage in the project and had a maximum of 25 employees. Based on these criteria, the total potential control group consisted of 74 companies on Kimito Island (∼238 people) and 97 companies on Åland (∼408 persons). The information was based on the membership lists received by the local business associations. The size of the control group varied based on what was thought reasonable given the diverse procedures in the various surveys (work climate survey, interview).

Occupational health services on Åland were managed by the private medical center with occupational health nurses, physicians, and physiotherapist primarily responsible for FUSK occupational health care. On Kimito Island, occupational health care was managed by the non-profit medical center with physicians, occupational health nurses, and occupational physiotherapist were responsible for the intervention.

DATA COLLECTION

The project researchers made interviews, sent questionnaires by email, and gathered financial data from the companies.

A work climate survey was undertaken in 2008 among all FUSK enterprises as well as all control group companies with a maximum of 25 employees as part of the intended data

collection. The KivaQ-survey (Näsman and Ahonen, 2009a,b; Näsman, 2017) was used. The same KIVA survey that was used in the DRUVAN project; however, the questions were somewhat changed within the context of the FUSK project depending on whether the respondent was an active entrepreneur (partner or CEO) or an employee of the company. As a result, two distinct KIVA surveys with 7 basic questions, were distributed to the SMEs. However, the questions in the two KIVA surveys focused on the identical topics, namely the overall work climate and job satisfaction. **Table 1** has list of the questions that were asked to employees and entrepreneurs. Work well-being was measured by using the KivaQ questionnaire, which has been validated by Nylund (2013).

In **Table 2**, the response rate to the baseline KivaQ questionnaire is presented.

After the trial KivaQ-surveys were conducted among the participating SMEs. **Table 3** presents the respondents to the KivaQ-surveys on work climate questionnaire.

As part of the baseline data collection, a series of semi-structured interviews were conducted with entrepreneurs and employees from both FUSK companies and control group companies. Interviews were also conducted with the employees and management of the OHS providers involved. The idea was that the interviews would provide important information about the current situation, opinions, and expectations about OHS in general among the respondents. The information would then also be used to further develop the FUSK model, so that it better meets the needs of the stakeholders involved. The results obtained from the baseline survey would also serve as an important frame of reference for the results of the interviews to be conducted after the project had ended.

The interview itself was conducted with the help of several key questions and specific focus areas. The lead questions varied depending on the respondent's characteristics (employee or entrepreneur) and type of company (FUSK company, control group company, or OHS providers). The discussion was general and the length per interview varied between 14 and 35 min. The large variations were primarily because the FUSK companies generally had many thoughts and questions about the project that they were happy to reflect on, which led to long discussions about detailed issues between the interviewer and the respondent. The control group companies, on the other hand, were more reserved and thus wanted to conduct the interview quickly to return to their work, which in turn led to rather short interviews with the respondents from this group. Forty-two baseline interviews with respondents from two OHS providers and 20 SMEs were conducted to monitor the attitudes toward the current OHS situation. These comprised Five interviews with OHS staff and management, ten interviews with FUSK entrepreneurs, ten interviews with FUSK employees, eleven interviews with control group entrepreneurs, and six interviews with control group employees. Twenty post-intervention interviews were conducted: Ten at FUSK- SMEs, six at control SMEs, two at VHQs, and two at OHS providers.

RESULTS

Group-based OHS arrangements and employees' frequency of sickness visits as well as their overall wellbeing.

The result shows that there were no major changes in the perceived work wellbeing during the FUSK-project. On average, the values for both the FUSK group and the control group were higher than in the KivaQ-database 8000 (year 2000–2012), which is a KivaQ database collected in several Finnish public and private organizations in years 2000–2012. The finding is in line with the fact that the control group include large organizations, which usually have poorer work wellbeing ratings than small companies. To demonstrate the relevance of the KivaQ (2021), comparison data with the equivalent values for years 2000–2022 are presented in the KivaQ 33000 (year 2000–2022, $n = 33{,}711$) (see **Figure 1**).

The entrepreneur work climate survey results indicate similar conclusions (see **Figure 2**) with no major changes.

Some FUSK entrepreneurs were skeptical with the incentive package stating that their staff might choose to go more on sick leave with more OSH visits. However, this was not the case. On Kimito Island, there was no evidence that the staff took more sick leave. On the contrary, sickness visits to OHS were significantly fewer in 2011 than in 2010. On the other hand, one could see a steady increase in sickness visits to Åland. On Åland island, the additional sickness visits to OHS resulted in increased costs for the companies as the number of sickness visits to clinics rose constantly. On Kimito island, where the OHS, costs were fixed, the number of visits went down, even forming a slightly upside-down u-curve (see **Figure 3**).

Benefits of the Model to SMEs in OHS Matters

The greatest advantage with the FUSK-arrangement was revealed by the interviews. Employers, employees,

TABLE 1 | List of questions to employees and entrepreneurs.

Employee survey questions	Entrepreneur questions
1. Have you enjoyed coming to work in the last weeks? (1–10)	1. Have you enjoyed coming to work in the last weeks? (1–10)
2. How meaningful do you regard your job? (1–10)	2. How meaningful do you regard your job? (1–10)
3. How well do you feel in control of your work? (1–10)	3. How well do you feel in control of your work? (1–10)
4. How well do you get on with your fellow-workers? (1–10)	4. How safe is your business and its future prospects? (1–10)
5. How well does your immediate superior perform as superior? (1–10)	5. How much can you influence factors concerning your job and business? (1–10)
6. How certain are you that you will keep your job with this employer? (1–10)	
7. How much can you influence factors concerning your job? (1–10)	

TABLE 2 | The respondents in the baseline survey in 2008.

	Submitted	Replies	Percent (%)
FUSK-SMEs (total 42, Åland 25, Kimito 17)			
FUSK-entrepreneurs	50	41	82
FUSK-employees	96	72	75
TOTAL	146	113	77
CONTROL-SMEs (total 171, Åland 97, Kimito 74)			
Control-entrepreneurs	224	100	45
Control-employees	422	146	35
TOTAL	646	246	38

OHS suppliers, and "virtual HQs" were all satisfied with the model. The FUSK companies thought the arrangement brought fast service, flexibility, and better follow-up of their own health. The employees appreciated the rapid and uncomplicated way to get access to the physician or nurse and get professional help. The employers appreciated the rapid service and that the loss of employee working time got shorter because of the short waiting-times.

> "In terms of healthcare and the employees, it is probably punctuality and appointments that are the biggest benefit. You can sit for 3 h and wait for municipal health care or something like that. Of course, the follow-up of everything is also understood." (Entrepreneur, Kimito Island)
>
> "Yes, I think it's good because it's a reasonable price. If it is the case that you can go to a general practitioner, that is great. It's so that I did not really get into it because I did not know that. When you get a proper check every year, I think it's great. Otherwise, I think it does not happen that you go and do that. Then you get to know if something is wrong, so you think before it goes too far. I think that is great." (Entrepreneur, Åland)

They also appreciated to get a systematic and professional general overview of the health status of their personnel and the preventive health care the employees could get. The increased costs because of the new arrangement also saved them time-consuming bureaucracy. All employers wanted the trial to continue.

> "Now I would almost say that, now it has worked well. The health center is good for those who have time to sit and wait, but for workers there should probably be something else. It is still not open in the evening and at night. In ordinary health care, they have time to sit there." (Employee, Kimito Island)
>
> "Yes, FHV facilitates the entrepreneur's work. They take care of it, especially this prevention. I do not have to think about when they should go and when they should not. They have that follow-up system and call them in at regular intervals and so on. I do not really need to think about that at all. Yes, I feel like getting value for money!" (Young entrepreneur, Kimito Island)

When asked if the entrepreneurs have experienced the bureaucracy around occupational health care as difficult, the answers were an unequivocal no.

> "No, we have not had anyone" (Entrepreneur, Åland)

OHS-PROVIDERS' INTEREST TO PROVIDE SERVICES TO SMEs

The discrepancies between FUSK companies and other companies are not seen as significant by OHS providers. The OHS provider in Åland underlined that the arrangement was a good idea since companies needed not to think about the prices for each individual client who required examinations and treatment, because a set quantity of care and examinations was included in the price.

The OHS providers said they were more willing to work with SMEs as a group, because it saved them costs and time, as many SMEs formed bigger units. Also, the local entrepreneur organizations, which acted as virtual headquarters of the SME group said they would be willing to continue with the work for a rather moderate compensation.

Everyone agreed that the FUSK project worked very well and that it is the right idea to treat all small businesses as one big one.

> "So, as it has worked now that you have been able to handle them as a group, then it has really been the right idea. If we had them as individual one-man companies, I do not think we would have even included them at all like this as one. In today's situation, as we have lived now, we would not have taken individuals with two employees, as we now have." (Board member)
>
> "I think it has worked very well. It has been so easy to tell companies to just come along, that it costs this amount of money. This is the absolute best." (Co-owner, former CEO)

Most had no proposals to develop the FUSK idea, but in Åland there was a proposal to have a monthly fee, where it is clear what is included, which was the system that was tested on Kimito Island. Because all the FUSK enterprises were classified as one big corporation, the administration believed it was notably simpler to administer. On the other hand, they had difficulty imagining that associations other than business associations, ss. accounting firms, or cooperatives would be sufficiently familiar with the care, health, preventive activities, contracts, business plans, and so on, required to manage the administration on Kimito Island. They felt it didn't matter who did it in Åland. Most people had no alternative ideas on who could govern the administration. They believe that commercial alliances are natural. Social security authority, on the other hand, were advised to handle purchases and administration directly with the OHS providers for the SMEs.

POSSIBLE PROBLEMS WITH THE FUSK MODEL

In the interviews with occupational health care, the following views emerged:

TABLE 3 | Respondents to the KivaQ-surveys on work climate questionnaire (KivaQ) 2011.

	Submitted to		Number of respondents				
	SMEs (*N*)	Persons (*N*)	SMEs (*N*)	Employees (*N*)	Entrepreneurs (*N*)	Total respondents (*N*)	Response rate (%)
Kimito, FUSK	17	64	12	22	9	31	48
Åland, FUSK	31	93	22	37	20	57	61
FUSK total	48	157	34	59	29	88	56
Kimito, control	20	123	9	31	7	38	31
Åland, control	37	177	15	36	17	53	30
Control total	57	300	24	67	24	91	30
All responses	105	457	58	126	53	179	39

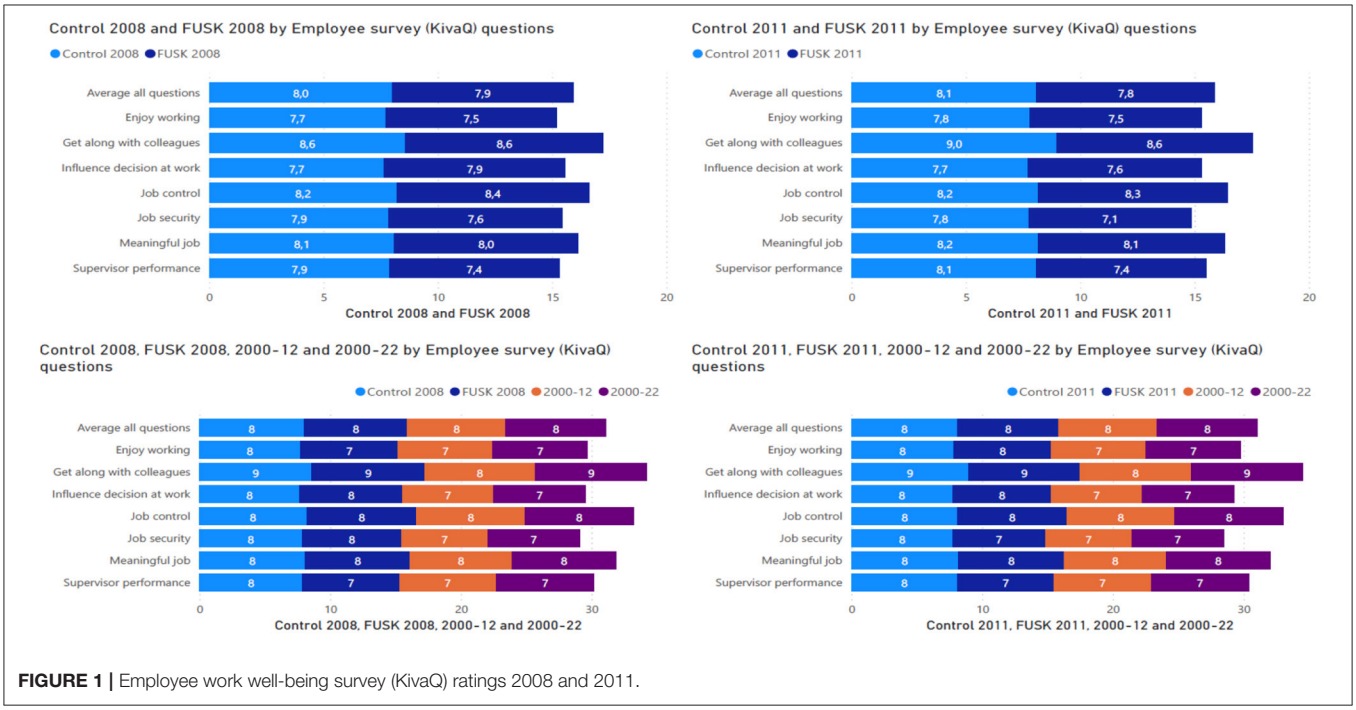

FIGURE 1 | Employee work well-being survey (KivaQ) ratings 2008 and 2011.

Kimito island

- no problem if the principles are clear to all parties, but if all FUSK companies would like to continue individually, it will scare the OHS providers.
- if business plans must be made separately for each company despite FUSK, they doubt that the business associations can cater for all parts
- the costs can lead to problems as it is not known in advance what the FPA will approve. It then becomes difficult to know what to charge.
- more precise pricing is required

Åland

- a single manager within the OHS makes the system vulnerable
- if the amount of money you intend to spend per client and company is much larger or much smaller than you intended, it can make the system unequal.

In the interviews, it was revealed that some FUSK members have hardly used occupational health care at all, which means that it has become quite expensive for them. However, when compared to the estimated cost of a day's sick leave for an employee in Finland, which is around 350€, the overall cost of OHS was less than the costs of a day's sick leave for an employee.

DISCUSSION

In general, entrepreneurs do not give high priority to occupational health care. They find it cumbersome, expensive, bureaucratic, and they do not have the time and energy to put it down when there are "more important" things to do. In addition, many SMEs do not know how best to deal with their employees' occupational health and safety, which is required by law. Generally occupational health and safety is poorer in SMEs than in large corporations (Tremblay and Badri, 2018).

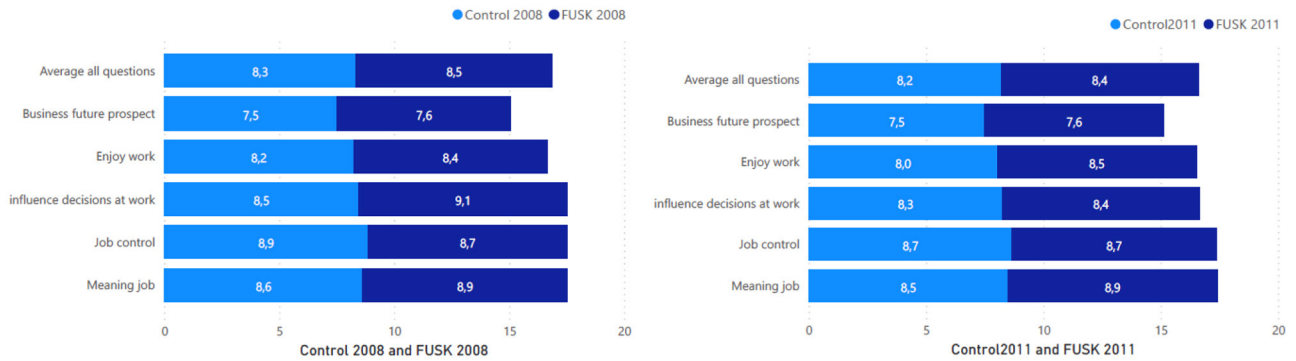

FIGURE 2 | Entrepreneur work climate survey (KivaQ) results 2008 and 2011.

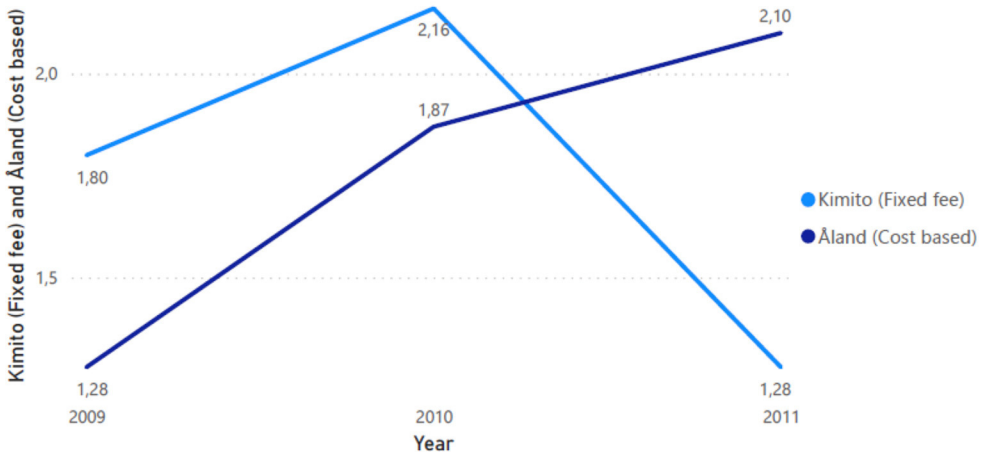

FIGURE 3 | The average number of sickness visits at the OHS per employee during the FUSK-trial.

Therefore, it is of utmost importance to develop systems to simplify the acquisition of comprehensive occupational health care and thereby also help entrepreneurs to comply with the law. The FUSK project has tested a model using a group-based OHS-trial with business associations as intermediaries.

The role of business associations was important as administrators (i.e., buying OHS and taking care of invoices). They were the orchestrators, working to bring together the companies into "a large" company and acted as an intermediary for the payment between the companies and the OHS provider. i.e., the companies never received any bills from provider but paid a lump sum to the business associations for occupational health care. This FUSK model made the process quick and easy for both the companies and business associations. It is important, however, that the system must not entail a financial risk for the business associations.

Our group-based OHS-trial indicates that the obstacles preventing groups of SMEs from forming legal entities in OHS contexts in Finland should be removed. The system, where SMEs form virtual joint corporations, seems to increase their willingness to use professional occupational health services. In Finland, one of the challenges of the public health care is access to physicians. The OHS is competitive in this aspect and that is why companies often prefer private OHS providers, which according to Finnish law has an emphasis on prevention. The system also seems to increase OHS providers willingness to cooperate with SMEs and their personnel. This article adds to the discussion about improved compliance with occupational safety and health regulations (Walters et al., 2021), particularly concerning SMEs and occupational health services (OHS).

Another interesting point to highlight is that SMEs with a fixed cost arrangement thought the arrangement was a significant improvement for them with regards to OHS. This is not withstanding the cost which was relatively higher than what the SMEs had previously been paying annually. However, what the SMEs perhaps appreciated most was that this was a kind of insurance, in that they knew exactly what they were going to budget for, providing security and safety to the economy. The majority supported the continuation of the FUSK system. This is even though private health insurance in Åland means that most individuals are "dual insured," meaning they are covered by employment and privately. It was intriguing that

the entrepreneurs and employees in the control firms, although having private health insurance, believed that preventative health care would be beneficial. The municipal health care on Kimito Island works well, and you receive time faster than in many other areas. Despite this, FUSK members believe it is vital with occupational health care, which in this instance is about more than just having time to see a physician fast.

It is likely that the suggested change in Finnish legislation would create new types of market actors, which would take care of the HQ function in the suggested groups of SMEs. So far (2022) no suggested changes have been made in Finnish legislation (Meyer-Arnold, 2022). A moderate version of the FUSK-project was conducted by FIOH in 2015–2018 (Lerssi-Uskelin, 2019), which resulted in the possibility to join Joint procurement activities in the occupational health care sector (Hansel, 2020). The 2015–2018 trial did, however, not include pooled compensation money, which allowed centralized compensation applications and less bureaucracy for the SMEs. This was a crucial element in the FUSK project. Future studies are needed to further investigate the effectiveness of the group-based incentives to help SMEs to acquire OHS for their employees. In a broader context, the possibility of SMEs to form legal entities in form of virtual joint corporations seems to, at least partly, solve the problems associated with the conflict between small numbers and incentive systems in occupational health and safety contexts (Soikkanen, 2009). Using the suggested group-based system might make it possible to use differentiated fee systems to extend economic incentive systems in work accident and disease contexts, which now apply only to large organizations, also to SMEs.

Concerning OHS, the issues of "paper health" in terms of management and governance, resources, and responsibilities toward OHS which have been subjected to regulations and voluntary agreements in some countries have also been a debate. In other countries such regulations and agreements play a lesser role. Regulations are, at best, good, but they might not be enough to guarantee OHS at the utmost level since there is a challenge of how to put the principles into practice, i.e., how to manage employee health effectively and efficiently in an ongoing business. Thus, the regulations and voluntary agreements are applied in "a tick the box mentality" because it is not a prescription of what is needed to address the dwindling health management especially in SMEs. In all, this kind of innovativeness in rethinking OHS to make services accessible to small businesses is important these days of uncertainty and changes, when the role of SMEs are increasing in countries including Finland. More studies investing the economic incentives for promoting OHS and occupational health and safety in SMEs are recommended to move employee health and safety from accounting papers to real practice and better outcome.

The FUSK project has a strength of testing two different payment systems to provide access to OHS to SMEs. The study combined multi-methods of questionnaire and interviews to evaluate the FUSK trial. However, there are limitations to the study. Due to some difficulties that were encountered along the study period, some data collection was suspended. The aim was to send out the KIVA questionnaire before the intervention (baseline data), after each year, and after the intervention has ended. As the research was suspended after the first year, only the baseline results and the final year results are available. The response rate was not large enough as expected for the control group. However, we do not think this has any significant impact on the conclusion drawn in this study. It would have been interesting to include more responses from the enterprises in the control group. There were also some slight differences in the practices on the two Islands included. On Kimito Island, the occupational health care provider had more work concerning reimbursement, while the business association did this work on Åland. This may be an explanation for the fact that the administration manager within OHS on Kimito Island experienced the project as work-intensive, while those on Åland thought it was easy. It was mainly the bureaucracy with compensation and reimbursement that was perceived as work intensive. Although both payment systems worked very well in the end. The biggest advantage was that it did not cause the companies any work.

CONCLUSION

The FUSK system works to facilitate SMEs have access to OHS. Overall, all parties were satisfied. The FUSK system significantly simplifies the work of occupational health care providers, primarily through the joint business plan and the invoicing system/s. This makes SMEs more profitable for the providers than if they were individual small customers and therefore also makes them significantly more attractive for providers. The FUSK system also simplifies the small business owner's work in that the only thing required of them is that they sign the contract and pay a bill a year. The new player in this context is the business associations, which with their work facilitate the work of both the entrepreneur and the occupational health service provider. It was also considered possible that any other actor than the business associations could act as an intermediary, e.g., a FUSK cooperative or an accounting firm.

If the FUSK system were to be implemented, it is likely that the coverage of small businesses in terms of comprehensive occupational health care would increase significantly if the system were to change and enable the purchase of OHS jointly for small businesses. It is now critical to design legislation instruments that allows the FUSK concept to be implemented. Next, it is important to market the idea to business associations and occupational health care providers in Finland, so that they become active locally and convince local small business owners of the importance of occupational health care and develop ready-made structures for the acquisition and implementation of comprehensive occupational health care.

DATA AVAILABILITY STATEMENT

The raw data supporting the conclusions of this article will be made available by the authors, without undue reservation.

ETHICS STATEMENT

Ethical review and approval was not required for the study on human participants in accordance with the local legislation and institutional requirements. Written informed consent for participation was not required for this study in accordance with the national legislation and the institutional requirements.

AUTHOR CONTRIBUTIONS

GA conceived the research idea. GA and ON performed the study, analysis, and writing of the report. EA contributed to the analysis and writing of the report. All authors contributed to the writing of the manuscript.

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Conflict of Interest: ON is a founding partner and senior advisor at KivaQ Ltd.

The remaining authors declare that the research was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

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