Factors influencing the motivation of small enterprises to participate in OHS initiatives

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Abstract
Small enterprises have limited resources to prioritise occupational health and safety (OHS) and programmes have been developed to support these enterprises and regulators and other stakeholders struggle to motivate them. In this paper we analyses through a realistic evaluation analytical approach the factors influencing small enterprises in the construction industry to engage in an OHS programme. A new Danish programme focusing on prevention of the long-term effects of physical strain in the musculoskeletal system is studied. The programme provides financial support as well as guidance from advisors from the Danish Working Environment Authority to implement new OHS approaches.

The study uses a mixed-method design, encompassing quantitative and qualitative analyses of data from the participating enterprises.

The results of the study show that the introduction to the programme influenced the motivation of the enterprises to engage in the programme. There was a high motivation to participate when the enterprises did so voluntarily and comparable a low motivation where participation was considered compulsory. The guidance and the economic incentive also influenced the motivation and to ensure that the programme leads to a process of sensemaking that will make the enterprises change behaviour. Few enterprises would apply without this support. However when motivation was externally forced, the process of sensemaking was hard to reach. The sensemaking process depended to a great extent on the acknowledgement of the need of the new OHS instrument or aid as well as on three contextual factors; relevant projects and instrument/aid; characteristics of the manager; and the workplace culture. The acknowledgement of the need of the programme increases the possibility of the enterprises will put the programme into action. The contextual factors of the enterprise, the industry and the society might set limits on the efficacy of programme mechanisms and should be taken into account.

Keywords
Workplace intervention, construction industry, musculoskeletal disorders, regulation, mixed-methods, realist evaluation
1. Introduction

Regulators, practitioners and researchers struggle to engage with small enterprises and they have looked at different possibilities for designing programmes (Breslin et al., 2010; MacEachen et al., 2010). By small enterprise we will in this study focus on enterprises with 20 or fewer employees. To motivate small enterprises, the occupational health and safety (OHS) programmes have to consider the characteristics of small enterprises (Hasle and Limborg, 2006). Literature reveals that personal values and priorities of the owner influence the workplace culture, the social relations and the attitude of the enterprise (Eakin et al., 2000; Hasle and Limborg, 2006; Walters, 2001). The owner is often also the manager and most often the same person is handling all management issues, including OHS (from now on referred to as owner-manager). Thus, it is a matter of motivating the owner-managers to participate in OHS activities as they play an important role in any change of procedure within the enterprise (Eakin, 1992; Hasle and Limborg, 2006). In order to develop relevant programmes an outline of the underlying assumptions and conceptions of programmes is useful to know how to bring about the intended outcomes.

The objective of the paper is to provide a better understanding of the mechanisms motivating small enterprises to engage in OHS intervention programmes and improve their OHS by studying a new Danish OHS programme (Hasle et al., 2012).

The research question is: Which mechanisms influence the motivation of managers of small enterprises to apply for and implement the programme and which contextual conditions influence this process?

The paper’s starting point is to build on existing literature on intervention programmes for small enterprises, followed by a description of the Danish programme and an outline of the methods used for data collection. Subsequently, a description of the analytical approach ‘Realistic Evaluation’ and the results are presented. Finally, the discussion of the findings as well as the conclusion answering the research question is revealed.

1.1. Intervention programmes for small enterprises

Social programmes such as OHS programmes are complex as they try to change the behaviour of a special target group with various circumstances (Rossi et al., 2004). OHS programmes have tried to incorporate the specific needs of small enterprises in terms of the workplace structure, the culture and stakeholders, but many programmes have limited success and are difficult to sustain (Champoux and Brun, 2003; Hasle and Limborg, 2006; Walters, 2003; Legg et al., 2010). Regulators, OHS practitioners and prevention services are aware that they need to change their approach if they are to reach and influence small enterprises (Walters, 2003).

Many small enterprises have limited resources to prioritise OHS (Walters, 2001; Hasle et al., 2012) and they often find it difficult to meet the demands from authorities and comply with legislation (Balduck et al., 2006; Vickers et al., 2005). The literature has revealed that small enterprises compared to larger enterprises have a lack of financial and managerial resources as well as general preference for informal and non-formalized approaches to preventive OHS activity (Arocena and Nunez, 2010; Champoux and Brun, 2003; Mayhew, 1997; Mayhew and Quinlan, 1997; Rigby and Lawlor, 2001; Walters and Lamm, 2003; Walters, 2004).

Small enterprises have distinctive features compared to larger enterprises (MacEachen et al., 2010; Hasle et al., 2012). One feature is that small enterprises often are involved in different social and personal relations which make it possible to create informal organisation of work. Another is the dilemma that on the one hand they often fight for survival due to a high degree of
external uncertainty and on the other hand they have the strength that they have the ability to respond quickly to changing economic conditions (MacEachen et al., 2010). In the perception of OHS many owner-managers often tend to underestimate risks and overestimate their own knowledge of the necessary control measures and OHS becomes a peripheral issue (Hasle et al., 2012). The owner-managers are often guided more by personal and cultural beliefs than by national guidelines (Hasle and Limborg, 2006; MacEachen et al., 2010). OHS is often seen as a problem that has to be solved when it occurs and many owner-managers do not recognise the need for a systematic OHS approach. It therefore seems to be important to focus on simple and low cost solutions and on action-oriented methods combining OSH with other management goals and it should be based on trust and dialogue (Hasle and Limborg, 2006; Lamm, 2000).

As analysed by Hasle et al. (2012), a new Danish programme has taken the special features and challenges into account when designing an OHS programme targeting small enterprises and this paper explores this programme.

1.2. The Danish OSH programme

In 2011, in order to meet the needs of small construction enterprises, the Danish government through the so-called Prevention Fund launched a new programme called Prevention Packages focusing on prevention of the long-term effects of physical strain in the musculoskeletal system (Hasle et al., 2012). A Prevention Package consists of a simple guideline with a description of the implementation of new tools to find solutions to the problems the enterprise face depending on their needs and the enterprises have the opportunity to apply for two different Prevention Packages: one focusing on heavy lifting and the use of technical lifting aids and another one focusing on improved planning through a systematic approach. The enterprises are supported financially and the budget covers salaries to the participants and for some costs during the implementation process. They are also supported by an advisor from the Danish Working Environment Authority. Small enterprises (less than 9 employees) can apply and the implementation process is defined to last three to six months.

As a part of the programme, the Danish Working Environment Authority made a campaign where inspectors through dialogue supervise construction enterprises and if necessary encouraged them to apply for a Prevention Package. Apart from this campaign the Prevention Fund as well as employer organisations and unions informed about the opportunity to apply. For further details about the programme see Hasle et al. (2012).

2. Material and methods

The study consists of a mixed-method design encompassing quantitative and qualitative data.

The quantitative data material consists of the 145 of the 165 enterprises approved for a Prevention Package (a response rate of 88%). The manager of each participating enterprise received a questionnaire right after approval focusing on e.g. motivation and organisational structure. Of the 165 enterprises 117 applied for the one focusing on heavy lifting and 21 for the second focusing on improved planning and 27 applied for both ones. The main applicants were carpenters (66) followed by electricians (36) bricklayers (26) and plumbers (26).

The qualitative data consists of 9 case studies selected on the basis of a telephone survey (the cases are listed in table 1). The enterprises were visited when they were in the middle of the process and the owner-managers were interviewed and where possible we attended meetings with the advisors. The interviews lasted on average 1 hour and were audio-taped, transcribed verbatim and thematically coded in accordance with the key themes of the interviews using the
software programme Nvivo (Computer software, 1999). The qualitative data was organised thematically and a content analysis was performed.

### Table 1: characteristics of the case enterprises

<table>
<thead>
<tr>
<th>Trade</th>
<th>Owner’s experience</th>
<th>Number of employees</th>
<th>Employee turnover</th>
<th>Employed bookkeeper</th>
<th>Physical workplace</th>
<th>Prevention Package</th>
</tr>
</thead>
<tbody>
<tr>
<td>Carpenter</td>
<td>14 years</td>
<td>5 employees</td>
<td>Reduced from 12 employees</td>
<td>Yes, part time assistant</td>
<td>Workshop and office</td>
<td>Both</td>
</tr>
<tr>
<td>Various construction work (sewer work)</td>
<td>23 years</td>
<td>1 employee</td>
<td>Reduced from 22 employees</td>
<td>No</td>
<td>Workshop and office at home</td>
<td>&quot;Planning&quot;</td>
</tr>
<tr>
<td>Carpenter</td>
<td>20 years</td>
<td>8 employees</td>
<td>Reduced from 11</td>
<td>Yes, assisting wife full time</td>
<td>Workshop and office at home</td>
<td>Both</td>
</tr>
<tr>
<td>Carpenter</td>
<td>7 years</td>
<td>2 employees</td>
<td>No changes</td>
<td>No</td>
<td>Office at home</td>
<td>&quot;Planning&quot;</td>
</tr>
<tr>
<td>Carpenter</td>
<td>10 years</td>
<td>3 employees</td>
<td>No changes</td>
<td>No</td>
<td>Workshop and office</td>
<td>&quot;Planning&quot;</td>
</tr>
<tr>
<td>Bricklayer</td>
<td>6 years</td>
<td>6 employees</td>
<td>Increased after 5 years alone</td>
<td>No</td>
<td>A small storage for equipment</td>
<td>&quot;Heavy lifting&quot;</td>
</tr>
<tr>
<td>Electrician</td>
<td>Not known</td>
<td>4 employees</td>
<td>Not known</td>
<td>No</td>
<td>Workshop and office</td>
<td>&quot;Heavy lifting&quot;</td>
</tr>
<tr>
<td>Bricklayer</td>
<td>17 years</td>
<td>5 employees</td>
<td>Increased after 1-2 years alone</td>
<td>Not known</td>
<td>Workshop and office at home</td>
<td>&quot;Heavy lifting&quot;</td>
</tr>
<tr>
<td>Carpenter</td>
<td>5 years</td>
<td>6 employees</td>
<td>Increased from 1 employee</td>
<td>Yes, part time assistant</td>
<td>Office at home</td>
<td>&quot;Heavy lifting&quot;</td>
</tr>
</tbody>
</table>

### 3. Analytical approach

Much of the current research on motivation is focusing on what motivates people to work whereas the role of motivation in work environment activities has not been explored much (Bjorklund, 2001; Hedlund et al., 2010). No single motivation theory can provide a sufficient explanatory model. Instead, it is often necessary to use several theories of motivation (Hedlund et al., 2010).

In the understanding of motivation, the focus in this paper is on the change of action in the specific target group. The motivation of the small enterprises and the mechanisms that initiate action are analysed through an organizational change perspective where the individuals act according to the process of making sense of the world around them (Weick, 2000; Weick et al., 2005).

This process depends on whether the enterprises have an intention to act that is either intrinsic or extrinsic. If the intention intrinsic it means that the individual finds improvements of the work environment important and will undertake a change process for its own sake in order to explore and learn (Hedlund et al., 2010).

On the other hand if the intention to act is the result of external inducements it can be described
as extrinsic and the change is performed in order to meet an outcome separate from the individual. This could be to exhibit a behaviour that is socially acceptable or to meet external standards e.g. by taking responsibility and showing interest in the improvement of the work environment (Hedlund et al., 2010).

This notion of motivation as the intention to act is analysed by using realistic evaluation as the analytical approach (Pawson and Tilley, 1997; Pawson, 2006). A realist design is based on a theory of the causal explanation of how mechanisms in contexts result in outcomes (Pawson, 2006: p 17-37). According to this theory "programmes work (have successful ‘outcomes’) only in so far as they introduce the appropriate ideas and opportunities (‘mechanisms’) to groups in the appropriate social and cultural conditions (‘contexts”) (Pawson and Tilley, 1997: p 57).

By cultural conditions is meant that programmes are embedded in contexts referring to not only a spatial or geographical or institutional location, but also initiated by sets of social rules, norms, values and interrelationships gathered in specific places. The context sets limits on the efficacy of programme mechanisms which should be understood as the stakeholders’ choices (reasoning) and their capacity (resources) to put these into practice. Realist evaluation then includes investigation of the extent to which the pre-existing social contexts enable or disable the intended mechanism of change. To make the change happen is depending on whether the people desiring change have the ability to bring it about (Pawson and Tilley, 1997).

Interventions are based on hypotheses and assumptions about how change processes and causal relations are connected to the programme activities which can be outlined in a theory of change or a programme theory (Rossi et al., 2004; Pawson, 2006: p 17-37).

The programme theory and underlying assumptions of the change process of the Prevention Packages are illustrated in figure 1. The introduction to the programme makes the enterprises aware of the programme and the mechanisms or instruments such as the economic incentive trigger them to apply. Then a process of sensemaking takes place which will lead to an intention to act (can be either extrinsic or intrinsic). The context sets limits on the efficacy of programme mechanisms and the enterprises’ ability to put the programme into action.

Figure 1: A theoretical framework to understand how motivation leads to action

![Diagram of motivation leading to action](image-url)
4. Results

The Danish Working Environment Authority's special dialogue based inspection seems to be an effective way to engage with the enterprises as most enterprises have heard about the Prevention Packages through them followed by the employer organisation, personal network and websites or newsletters (table 2).

Table 2: The introduction to the programme

<table>
<thead>
<tr>
<th>Introduction to the programme</th>
<th>% of the responses</th>
<th>N (answered the question)</th>
</tr>
</thead>
<tbody>
<tr>
<td>The Danish Working Environment Authority</td>
<td>72%</td>
<td>144</td>
</tr>
<tr>
<td>Employer organisation</td>
<td>25 %</td>
<td>144</td>
</tr>
<tr>
<td>Network</td>
<td>12 %</td>
<td>144</td>
</tr>
<tr>
<td>Websites or newsletter</td>
<td>12 %</td>
<td>144</td>
</tr>
<tr>
<td>Other</td>
<td>13 %</td>
<td>144</td>
</tr>
</tbody>
</table>

Table 3 illustrates the three main instigators of the application in the participating enterprises.

Table 3: The instigator of the application

<table>
<thead>
<tr>
<th>The instigator of the application</th>
<th>% of the responses</th>
<th>N (answered the question)</th>
</tr>
</thead>
<tbody>
<tr>
<td>The employer</td>
<td>87%</td>
<td>145</td>
</tr>
<tr>
<td>An inspector from the Danish Working Environment Authority</td>
<td>27%</td>
<td>145</td>
</tr>
<tr>
<td>The employee(s)</td>
<td>12%</td>
<td>145</td>
</tr>
<tr>
<td>Other</td>
<td>1 %</td>
<td>145</td>
</tr>
</tbody>
</table>

Table 3 shows that the employer was the main instigator but the Danish Working Environment Authority also played a role in the application process in some of the enterprises.

In some case enterprises, they were contacted through the Authority and some owner-managers felt a pressure from the Authority to apply and the cause of applying was to accommodate the authority’s request and fear of getting an enforcement notice or a fine. Other case enterprises appreciated the visit from the Authorities and regarded the programme as a good opportunity to improve OHS. One factor expressed was the experience of responsibility which could both be related to the conditions for the employees and to the expectations from the Authorities or other stakeholders. The responsibility can thus be interpreted as both intrinsic and extrinsic motivation depending on what is done for the enterprise’s sake and to meet other stakeholders’ requirements. The opportunity to develop a fruitful dialogue with the authorities about OHS was for some enterprises interesting and for others it was important to set an example for other enterprises to follow and even be an instructive experience for the Authorities and other stakeholders.

When asked in the survey about the expectations of the outcome of the programme (more response categories), the owner-managers' answers can be seen in the table 4. In an open response category some owner-managers mentioned "straighten up the workshop", "a good workplace", "opportunity to use technical aids", and "the employees should develop and be able to make decisions".
Table 4: The expectations of the outcome of the programme

<table>
<thead>
<tr>
<th>The expectations of the outcome of the programme</th>
<th>% of the respondents rating this category (to a great extent)</th>
<th>N (answered the question)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Improvements of the ergonomic and physical work environment</td>
<td>75 %</td>
<td>142</td>
</tr>
<tr>
<td>Reduction of sickness absence and strengthen staff retention</td>
<td>51 %</td>
<td>134</td>
</tr>
<tr>
<td>Profit economically</td>
<td>36 %</td>
<td>140</td>
</tr>
<tr>
<td>Improvement of the psychosocial work environment</td>
<td>25 %</td>
<td>126</td>
</tr>
<tr>
<td>Other</td>
<td>18 %</td>
<td>28</td>
</tr>
</tbody>
</table>

To further illustrate the findings in the survey, we would like to draw attention to two case studies and explore the steps in the programme theory (figure 1). The cases were selected as illustrative examples of to what extend the change process happen as assumed in the programme theory. In the first case the owner-manager was driven by an intrinsic motivation whereas the owner-manager’s motivation in the other case had an extrinsic character. Both cases applied for the Prevention Package focusing on improved planning.

4.1. The intrinsic case

The owner-manager is educated as bricklayer with an additional exam in sewer work and a later degree as a construction technician and has had the enterprise for 23 years. Earlier they were up to 22 employees and today the enterprise only consists of the owner-manager and one employee (trained in the enterprise). The owner-manager has a workshop storing equipment and office both at his private house. He has no bookkeeper but do the office work himself. He has a positive attitude towards the Authorities and uses them and the employer organisation for counselling. He is familiar with standardized procedures due to the legal requirements related to sewer work.

The mechanism that triggered the owner-manager’s motivation was a newsletter from the employer organisation where they encouraged enterprises to apply. To him improved planning e.g. when making offers for new projects or tasks a systematic approach is valuable and a reduction of time waste could be possible as every project would be planned in detail including a list of relevant equipment for carrying out the task. This would especially be relevant if he wants to expand the enterprise and once again employ more personnel.

The economic incentive also played a role and if no support was given the owner-manager doubt that he would have applied. The support from the advisors from the Danish Working Environment Authority also played an important role. The owner-manager wanted to be at the forefront of OHS in terms of meeting the expectations of the authority.

The primary motivation is therefore intrinsic as he was inspired by the written information in the newsletter and considered the possibility important for himself and his enterprise. Extrinsic factors such as being at terms with authorities and the financial support also play a role but are not the main reason to trigger his interest.

The owner-manager sees potential benefits of the programme in the long run and the intention to act is thus based on a long-term goal and not depending on e.g. a specific project or circumstance. The possibility of improved planning and change of work routines is thus improved.
because the owner-manager's ability to change and the contextual conditions promote the programme mechanisms to trigger the process which is illustrated in figure 2.

**Figure 2: Flow of motivation in the intrinsic case**

**Contextual factors:**
Positive attitude towards the authorities and use them and the employer organization for counseling, experience, physical environment/workplace, used to standardized procedures.

**Introduction to programme:**
- Employer organisation
- Own initiative

**Programme mechanisms/instruments:**
- Economic incentive
- Support from Authority
- Content of the Prevention Package

**Process of sensemaking:**
- Need for a systematic approach towards OHS
- Long-term investment
- Self-confidence

**Action:**
- Implement new work routines

### 4.2 The extrinsic case

The owner-manager is educated as carpenter and has had the enterprise for 7 years. The turnover has been relatively stable for a long time with 1-2 employees and no apprentices. Today the enterprise consists of the owner-manager and two employees with a seniority of approximately one year. The owner-manager has an office at his private home and no bookkeeper is employed, but his wife helps him.

The owner-manager is not a member of any employer organization and he has no problem with the Authorities but almost never has any contact with them. He delegates the work to his employees often via telephone or they meet at the construction site or at the office as is most convenient.

He was introduced to the programme through an inspection from the Danish Working Environment Authority. The inspector noticed some problems regarding equipment and issued an enforcement notice. According to the owner-manager, the inspector was about to issue another one but told the owner-manager about the possibility of applying for a Prevention Package. He saw this as an opportunity to remedy the problem and chose to apply even though he did not recognise that he had any OHS problems. The application was approved and the advisors from the authority (different ones from the inspection) came to support the enterprise as included in the programme. The owner-manager experienced the dialogue with the advisors good and meaningful but he found it difficult to implement the systematic approach as the owner-manager is satisfied with his current OHS practice e.g. renting technical aid if needed and planning depending on the project. Additionally he finds it difficult to develop an OHS planning form because of lack of IT skills even though the advisors gave him a template. All in all he could not see that the benefits of developing a more systematic OHS approach would outweigh the drawbacks of changing practice. The result was that no action took place. An explanation could be that the motivation was extrinsic and the context limited the efficacy of programme mechanisms to put the programme into action which is illustrated in figure 3.
To sum up there was high motivation to participate where the enterprise did so voluntarily (intrinsic motivation) and low motivation where participation was considered compulsory (extrinsic motivation). The financial support and the guidance though increased the possibility of a change process. The sensemaking process depended to a great extent on the acknowledgement of the need of the new OHS instrument or behaviour change.

The two cases are chosen as illustrative examples and often it is not that obvious whether the motivation is extrinsic and intrinsic. To expand the understanding of the mechanisms influencing motivation, the next section will present the findings from the other case studies and the questionnaires.

4.3. Contextual factors influencing the process of sensemaking

Contextual factors such as the owner-manager's experience within the enterprise seem to be important for the sensemaking process.

If the owner-manager has worked many years without any employees and only had a few years of experience with employees, there seems to be a tendency of a low interest in improvement of the OHS practice.

On the other hand if the owner-manager has worked many years with employees, there seems to be a higher sense of acknowledging OHS as an important issue. The owner-manager tends to develop greater responsibility for the wellbeing of the employees and investment in e.g. technical aids. These owner-managers recognise the profitability of healthy employees in terms of low sickness absence and commitment to the enterprise. When asked about the legal OHS demands, some owner-managers explain that they find it difficult to meet all the demands. Legal demands do not only concern OHS standards but all kinds of obligations and responsibilities for an employer such as maternity or sick leave, insurances, annual auditing. Many owner-managers find it difficult to find the time to take care of all of them and there seems to be a difference between the owner-managers with and without a bookkeeper. The owner-managers in the case studies are educated as skilled construction workers and often office work becomes a challenge or a burden to overcome. This contextual factor has an important impact on the process of sensemaking. As in case two the limited IT qualifications become a barrier and a reason for rejecting the need for the content of the Prevention Package. Subsectors in construction have different conditions as the technical professions such as electricians have a basic training and a
daily use of standardized procedures whereas it to a higher degree are up to carpenters and bricklayers discretion to decide how to handle their projects.

Another important factor in the process of sensemaking is the physical context of the enterprise e.g. whether there is a workshop or not. This factor is important because the physical environment sets the limits of the possibilities of a collective or relational sensemaking within the enterprise. This means for example that if they at the enterprise need to talk about the way they want to implement the programme or what kind of technical aids they want, they have to meet somewhere to talk about it. In the cases where they only meet at the construction site, there is a lack of acknowledgement of the necessity of more systematic OHS practice.

4.4. Mechanisms influencing the process of sensemaking

The process of sensemaking depends to a large extent on the initial motivation to apply for a Prevention Package as illustrated by the two case studies. But in some of the other case studies some other factors were also identified as important. One main mechanisms or driving factor was whether there was a relevant task or project to use or to develop a new OHS practice. This was especially a main factor in the enterprises implementing the Prevention Package focusing on heavy lifting and use of technical aid. The process of sensemaking was easier to start if the enterprise had a relevant project or a task to try out the new work routine/to develop OHS system. When the owner-manager heard from the advisors about the possibility of renting a technical aid specially designed for a task the owner-manager immediately acknowledged the benefit of this OHS improvement. Otherwise if there were no relevant project or task suitable for a new work routine or to develop OHS systems the process of sensemaking was difficult to start or never happened. A promoting factor was when the technical aid was demonstrated either in real life or on a photo/video. The owner-manager and the employees could thereby see the use of the technical aid. Depending on both the owner-manager’s and advisors’ experience and knowledge about the possible instruments or technical aids, the enterprises were introduced to different options. If they both lacked knowledge about the options the process of sensemaking was difficult to start or never happened.

If the motivation was extrinsic the owner-manager did not prioritise the development of new OHS systems if the workload was heavy. Otherwise if they were not busy at the enterprise e.g. in the winter season the development of OHS systems seemed to be easier. The workload did not play a significant role when the motivation was intrinsic because the owner-manager incorporated the new OHS instrument into the on-going task or project.

Summative the mechanisms triggering the process of sensemaking were relevant tasks or projects, relevant instruments or technical aids and inspirational advisors among others. These mechanisms were very important where the motivation was extrinsically driven. The same mechanisms did not seem to be as crucial to the process of sensemaking if the motivation was intrinsic.

5. Discussion

When launching the programme all small construction enterprises in Denmark had the opportunity to apply for financial support to implement the programme. However only some enterprises applied and only some of those actually had an intention to change their OHS practice.

Through the analysis it is clear that the introduction to the programme play a key role in terms of how to motivate small enterprises. This covers whether the packages are introduced by the
Danish Working Environment Authority, the employer organisation or by a personal network. When contacted by the Danish Working Environment Authority the desire to participate was contingent on the owner-managers’ perception of the inspectors. Some owner-managers felt they were forced to participate whereas others saw it as a great opportunity to develop their workplace and OHS skills. The economic incentive and the guidance were both important drivers for most enterprises and most owner-managers desire a good dialogue with the Authorities. When the workplaces had applied for a Prevention Package, the motivational factors that made them actually change work routines were depending on the sensemaking of the new OHS instrument. If the owner-manager does not acknowledge the need of change it does not matter what incentives or methods to use. On the other hand if the owner-manager acknowledges the need for the OHS instrument it seems that costs and time means less. To illustrate these relations the analytical model is expanded as shown in figure 4.

Figure 4: Flow of motivation based on the analysis of the empirical findings.

To make change happen depends on whether the motivation is extrinsic or intrinsic as the former is a major constraint for active implementation. Therefore the instigator of the programme plays a crucial role as well as the introduction to the programme. It is difficult to influence the context in terms of the characteristics of the sector and the specific enterprise, but the policy makers have to consider the introduction to the programme and with which instruments small enterprises should be reached. In the case of the Prevention Packages it is not enough that the enterprises are offered financial and guiding support. If the programme is considered to be imposed on the enterprise, the motivation will be extrinsic and active participation will be low. This motivation might be changed during the implementation process, the study does not explore that, but to reach a process of sensemaking the shortcut is to create intrinsic motivation. A possible avenue is to use trusted intermediaries to disseminate the information about the programme. In this case it was mainly the employer organisation and personal networks, although it seems as some inspectors also managed to create interest without imposing the programme.

A challenge for the Authorities is to train their inspectors to encourage the programme through volunteerism instead of enforcement. The advisors guiding the enterprises should also be trained to support the enterprises in the sensemaking process. This covers providing relevant material
and guidelines such as different practical skills (e.g. IT skills) and tools to help the enterprises find the solutions of their problems. The programmes targeting small enterprises need to be adjusted to the specific workplace setting and the social conditions. This includes social rules, norms, values and interrelationships within the workplace. This can be done in the specific enterprise in the sense that the advisors needs to be aware of such differences. This also concerns a good cooperation with the employer organisations and unions as they might be able to influence the sector in a broader scale. As shown in the analysis the employer organisations’ endorsement of the programme may improve the probability of the enterprises to participate in such a programme. This is of course depending on the respect and reputation the particular organisation.

The context of the specific enterprise to a large extend sets limits on the efficacy of programme mechanisms. By this we mean the stakeholders’ choices (reasoning/sensemaking) and their capacity (resources) to put these into practice. But as reflected upon earlier it is programme mechanisms that make the step from asking whether a programme works to understanding what aspects of a programme that makes it work. The point is to identify mechanisms adjusted to the broadest possible context in order to have more enterprises to successfully enrol in the programme.

6. Conclusion

The paper argues that the Prevention Packages can lead to a change of OSH practice if the process is triggered by different mechanisms. One mechanism is the way the enterprises become aware of the programme and the incentives to improve the working conditions. The programme mechanisms of providing financial support and additionally guidance by advisors from the Danish Working Environment Authority can lead to engagement of the small enterprises. By providing financial support and knowledge about solutions and methods to improve OHS, the small enterprises find it easier to engage in such a programme. However the participation depends on whether the programme is promoted by trusted stakeholders or more an enforced participation.

The specific content of the programme is also relevant and often depending on the owner-managers ability to understand the use of the programme and whether they consider it useful and beneficial. The crucial point is to motivate the owner-managers to an intrinsic intention to act. By intrinsic motivation a process of sensemaking in terms of an acknowledgement of a need for developing OHS systems and new practices is then easier to reach. To what extend these mechanism are put into action depends on the contextual factors such as the workplace setting. Through the analysis we will argue that this understanding is depending on the workplace settings (contextual factors). The workplace setting may set limits on the efficacy of programme mechanisms and how the Prevention Packages lead to a change of OSH practice. The contextual factors identified are the characteristics of the enterprise as well as the sector such as the needed practical skills, attitude towards the authorities, etc. Additionally the process is influenced by contextual factors such as relevant task or project, available instrument/aid and a good timing in terms of general workload.

Of interest would be to explore to what extend the intrinsic versus extrinsic motivation leads to a long-term improvement of the working conditions. Based on a better understanding of these two forms of motivation an exploration of how programmes can be designed with an increased possibility for intrinsic motivation. Additionally the observed sensemaking and implementation process results in behaviour change that remains after a period of time needs to be explored.


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