Management systems standards and certifications from the perspective of SMEs and the actors around them
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Abstract

**Purpose and problem:** During one of the initial interviews for the project BOOST, the CEO of a small business described the business as facing a tsunami of requests related to the many quality and environmental management system standards used within the housing and construction industry. Continued discussions with business representatives supported this description. Reviewing previous research, we found that research results regarding the impact of management system standards and certifications are inconclusive but that it repeatedly has been argued that the impact is related to the motives for introducing a management system. These findings in combination with the argument that there is a need for further research on how different management systems are and should be integrated made us focus on the question how different actors within this specific industry reason on different standards and certifications for management systems. An important part of the study is also the mapping of different standards and standard setting organizations of relevance for SMEs within the industry.

**Method:** The study is performed with a holistic approach. Drawing on interviews, observations, and document studies we investigate first which are the major management system standards and certifications relevant for small and medium sized enterprises working with glass and wood in the housing construction industry and, second how SME managers and owners as well as actors around them reason in relation to the different standards and certifications.

**Result:** Our map of the different standards and standard setting organizations is hopefully useful for managers and advisors within the industry. The study supports previous research suggesting that while customer demand frequently is described as the major reason for why a quality or environmental management system is considered in the first place, organizational contingencies are important for how and to what extent the management system is integrated into daily operations. Our study contributes to previous research by taking the point of view of different actors into consideration when mapping the many standards and certifications within a specific industry. The cases contribute to the understanding of the role a management system can have for matters such as owner-manager well-being and identity.
construction as well as succession. The findings also contribute to previous research by demonstrating how industry specific quality and environmental standards and certifications might influence the attitudes to general ISO standards within an industry.

**Implications**: The study contributes to the understanding of management systems standards on the meso and micro level which is important since much previous research has focused either on micro or meta-level analysis. The discussion of the different standards, certifications and standard-setting organizations of relevance for SMEs within this industry adds to the understanding of the impact of standards on businesses and industries. The field material includes challenges related to implementing and maintaining management systems but also the benefits. While previous research on management systems has focused on its relation to performance in terms of profitability or the ability to innovate, this study depict positive consequences in relation to issues of importance for long term performance and firm survival such as owner-manager well-being, ownership succession and employer branding.

**Planned future work**: This report will be developed into two research articles. The first one will focus on the main issue in this report, i.e. management systems standards and certifications from the perspective of SMEs and the actors around them. The second article will focus on the dynamic between management system standards and business model innovation. The faculty engaged in this project have initiated dialogues with SMEs, auditors, consultants and standard setters regarding future collaborations for development work, education and research. During the Spring we are planning to submit one application to the Swedish Research Council (Vetenskapsrådet) and one application to the Swedish Research Council for Health, Working Life and Welfare (Forskningsrådet för hälsa, arbetsliv och välfärd) for continued research. The first application will be focused on the relation between the EU Directive 2014/95/EU on non-financial reporting and different management system standards as well as the possible implications of this relation for sustainability performance. The second application will focus on the new ISO standard for occupational health and safety management ISO 45001 which is replacing the national standard OHSAS 18001.
Introduction

During one of the opening interviews for the BOOST-project, a representative of a small business explained to us their company was facing a tsunami of requests related to the many quality and environmental management system standards and certifications used within the housing and construction industry. Continued discussions with SME representatives as well as actors around them supported this description. When turning to the literature and previous research we found that more than one million organizations in approximately 189 countries are certified according to ISO 9001, a standard for quality management systems (ISO, 2017). The ISO standards, certifications and their impact are therefore a common focus for research on quality management (Cai & Jun, 2018; Carnerud, 2018). Still, findings regarding the effects of quality management according to ISO 9001 are inconclusive and its bearing on performance and organizational development debated (Benner & Tushman, 2015; Benner & Tushman, 2002; Kakouris & Sfakianaki, 2018; Manderes, Vries, & Blind, 2016). Researchers seem to agree that the value of ISO certifications depends on several organizational conditions, such as the motives for seeking certification and prior experience with quality management, as well as external conditions, such as the competitive intensity and the proportion of certified firms in an industry (Lo & Yeung, 2018; Poksinska, 2010; Su, Dhanorkar, & Linderman, 2015).

A complicating matter when discussing the impact of an ISO 9001 certification, is that an implementation is often combined with other organizational changes. Increasingly research findings seem to indicate ISO 9001 certifications need to be understood in relation to other management systems, standards and certifications (Sampaio, Saraiva, & Domingues, 2012). To begin with many organizations have implemented ISO 9001 in combination with other management systems such as for example ISO 14001 and OHSAS 18001, i.e. the implementation of and the certification for quality management is combined with the implementation of environmental and occupational health and safety management standards (Matias & Coelho, 2002). The micro-level adoptions and implementations of a standard like ISO 9001 or 14001 are thus heterogeneous phenomena (Boiral, 2012b; Heras-Saizarbitoria & Boral, 2015; Sandholz, 2012). Furthermore, the development of standards is ongoing and new standards, addressing new areas, are constantly developed (Boström & Hallström,
2013; Hallström, 2008). As one example, OHSAS 18001 was recently replaced by ISO 45001 (Gasiorowski-Denis, 2018). As another example, the latest revision of ISO9001 and especially the importance of a risk-based approach has been discussed by practitioners as well as researchers as important but challenging for many businesses (Rybski, Jochem, & Homma, 2017). Making the picture even more complex is the fact that there are, local and global competing management systems (see for example FR2000.se) as well as complementing management systems (see for example fsc.org or fefc.se) beside the many management systems issued by ISO. A researcher or auditor with broad knowledge on the matter, might argue many of the latter are often second party certifications only while ISO are third-party certifications. To managers and owners of SMEs, however, it is not necessarily straightforward what the implications of these differences are for their business.

As a response to this, researchers have among other things studied the parallel implementation of for example ISO 9001 and ISO 14001 (Stanislav Karapetrovic & Willborn, 1998; Llonch, Bernardo, & Presas, 2018) and management system integration is a growing field of research (Bernardo, 2014; S Karapetrovic, 2002; Llonch et al., 2018). Still, we lack studies taking a holistic approach to all the management system standards and certifications which might be relevant for organizations to consider within a specific industry as well as the different actors involved. As suggested by Gustafsson (2016) standards and certifications could be understood as part of a complex control regime which has developed over the last 40 years and continue to do so. For businesses in most fields, the question which management system standards and certifications are worthwhile to consider is therefore a constantly changing matter which might or might not be related to their prerequisites for doing business.

To contribute to this knowledge, we adopt a holistic approach in order to find out how significant actors within the industry reason and motivate their choices in relation to the different management system standards and certifications. This study is thus a study of the management system standards and certifications which were considered relevant by different actors irrespective of them being considered complementing or competing management system standards and/or certifications. Our empirical material includes interviews with managers of SMEs, professionals engaged as advisors, auditors and members of committees developing standards for management

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1 Some would argue FSC as well as FEFC are certifications of products rather than certifications of management systems. For the label to be used, certain management practices are however needed and to the owner-managers in our study FSC and FEFC respectively represented “another standard”.
systems, observations of an audit process as well as the standard texts and information material related to these standards. This approach could be understood as inspired by the multi-layered embeddedness perspective (Welter, 2011) as it includes the micro as well as meso level (Cappelli & Sherer, 1991; Dopfer, Foster, & Potts, 2004). With this approach, our study contributes to a context-sensitive understanding of management system standards and certifications.

Previous research on management system standards relevant for SMEs

The research on standards is a growing field since it to an increasing extent is not enough for businesses to provide products and services of good quality to a sensible price. Many organizations today face the demand to demonstrate that the production process has been conducted in a responsible, sustainable and appropriately organized way. In many contexts, standards and certification systems play an important role for this purpose (Boström & Hallström, 2013; Brunsson, Rasche, & Seidl, 2012; Gustafsson, 2016). As an example, it is often required that suppliers participating in public procurements in Sweden are certified according to ISO 9001, ISO 14001 or equivalent frameworks.

For small and medium sized businesses, certification according to a management system standard often represents a major milestone in their development but it also demands time, effort and knowledge (Boiral, 2012a; Brorson & Almgren, 2009; Mangiarotti & Riillo, 2014). Researchers have therefore investigated to what extent adoption of a management system standard is worthwhile, for businesses in general, in SMEs and in different industries. Most studies focus on ISO 9001 since this is the most common management system certification. Taken together results indicate a positive impact on cost, waste reduction, quality and in line with this productivity and profitability (Aba, Badar, & Hayden, 2016; Boiral, 2012a). Studies have also indicated improved relationships with stakeholders such as customers, suppliers and employees (Boiral, 2012a; Javorcik & Sawada, 2018; Poksinska, Dahlgaard, & Eklund, 2002). Still, findings regarding the impact are inconclusive and it is worth noticing that research tends to be more focused on detecting the positive impact rather than potential problems (Boiral, 2012a).
As pointed out in the introduction, researchers seem to agree that the value of ISO certifications depends on several organizational conditions, such as the motives for seeking certification and prior experience with quality management, as well as external conditions, such as the competitive intensity and the proportion of certified firms in an industry (Lo & Yeung, 2018; Poksinska, 2010; Su et al., 2015). Earlier studies indicated that SMEs to a larger extent implemented ISO 9000 as a response to market or customer demand (Chittenden, Poutziouris, & Mukhtar, 1998; Sun & Cheng, 2002). In the cases studied by (Poksinska, Eklund, & Dahlgard, 2006) this meant that ISO 9001 was implemented with a minimum of effort and lead to few improvements in operations. In a later study, however, (Heras-Saizarbitoria & Boiral, 2015) found that firms tended to adopt ISO 9000 symbolically in response to a variety of internal contingencies, rather than adapting to external pressures. They argued that adoption of ISO in SMEs, as in any organization, is a complex issue shaped by for example the leadership and legitimacy of middle managers, employee involvement and the role of consultants.

Another issue frequently discussed in relation to ISO certifications, is innovation (Manderes et al., 2016). In correspondence to the findings regarding the relation between management system certifications and profitability, Manders, Vries and Blind (2016) point out that the relationship between management standards and innovation in a specific organization is likely to be influenced by how a standard has been adopted and the motivation of implementing the standard. There are studies indicating a positive relationship between management system standards and innovation (Merrill, 2018; Pekovic & Galia, 2009) while others show a problematic relation between management system standards and innovation (Benner & Tushman, 2015; Benner & Tushman, 2002). Brenner and Tushman (2002) studied ISO 9001 certifications as an indicator of to what extent a firm engaged in process management. They found that ISO 9000 could be associated with exploitation (i.e. improvements) crowding out exploration (more radical innovation). In a later, award winning, article, they drew on the concept of ambidexterity and argued that process management activities must be buffered from exploratory activities for an organization to develop strength both in terms of exploitation and exploration (ibid, 2003). Possibly in line with both sides of the debate, Terziovski & Guerrero (2014) found certification according to management quality standards to have a negative relationship with product innovation and a positive impact on process innovation. It has therefore been argued, standard setters and researchers need to separate between different types of innovation and to be careful as to what processes are standardized and certified (Mangiarotti and Riilloo, 2012; Terziovski and Guerrero, 2014). In relation to this
“debate” it is interesting to note that actors within the standard and certification industry are increasingly embracing the concept innovation. For example, the CEO of the Swedish Standards Institute in 2016 described the role of standards in relation to innovation:

This is an acknowledgment that standards facilitate innovation. Previously one sometimes missed out on the opportunity to use standards for making products available on the market. […] There is still a thriving myth implying that standards are inhibitive to innovation. (The CEO of Swedish Standards Institute in a comment on a state agency funded research project, 2016)

Another example is that since the revision of the quality management standard ISO 9000 in 2015, the concept “innovation” is now included in the standard, although defined as an example of improvement (SIS, 2015, section 10 Improvement, 10.1 General). Furthermore, consultants and writers engaged with the ISO 9000 standard argue the structure of ISO 9001:2015 will “fit perfectly” (Merrill, 2018) with the new ISO 50501 Innovation Management System Guidance, published in 2018. This corresponds to the historical and more general trend that while standards to begin with were focused on physical and/or technical objects, standardizing now increasingly address organizations and organizational processes (Brunsson and Jacobsson, 2002; Gustafsson, 2016).

As pointed out in the introduction, management system integration is another growing field of research (Bernardo, 2014; Karapetrovic, 2002; Llonch et al., 2018; Rebelo, Silva, Santos, & Mendes, 2016). The most frequent focus is the parallel implementation of ISO 9001 and ISO 14001 (Karapetrovic & Willborn, 1998; Llonch et al., 2018; Simon, Karapetrovic, & Casadesús, 2012). Even though this focus is logical since those two are the most commonly used ISO standards, there is a need for studies with a wider approach. In a Swedish context, the two standards mentioned above are frequently combined with the occupational health and safety management standard OHSAS 18001, which was recently replaced by ISO 45001. Furthermore, there are standards and certifications specific for certain industries and competing standards integrating several ISO requirements (e.g. FR2000 which will be discussed below).

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We will next map the competing as well as complementing management system standards relevant for SMEs within the housing construction industry, with a particular focus on businesses working with wood and/or glass.

Management system standards (and the standard setters)

ISO standards (ISO 9001, 14001, OHSAS 18001/ISO 45001 and ISO 26000)

There are several definitions of management system standards. ISO, the International Organization for Standardization, which is the largest organization developing and publishing standards, writes that management system standards (MSS) are:

ISO standards that set out requirements or guidance to help organizations manage their policies and processes to achieve specific objectives. MSS are designed to be applicable across all economic sectors, various types and sizes of organizations and diverse geographical, cultural and social conditions. Many ISO MSS have the same structure and contain many of the same terms & definitions and requirements. (ISO, 2019, on their web-page)

The International organization for standardization was founded in 1946 by delegates from 25 countries “to facilitate the international coordination and unification of industrial standards” (ISO, 2018). Besides the general management system standards (e.g. ISO 9001 for Quality Management Systems and 14001 for Environmental Management Systems), ISO issues sector specific management system standards, (e.g. Quality for the medical sector ISO 13485), management system related standards and implementation guidance (e.g Food safety management system auditing ISO 22003) and management systems “that may support the implementation of specific aspects of an organization’s management system (e.g. Social responsibility ISO 26000).

Among the 22,000 international standards published, the ISO 9000 quality management system standard series, sometimes referred to as the “ISO 9000 family”, is the most well-known. At present there are more than a million companies certified according to the requirements in ISO 9001 worldwide.

The ISO 9000 family addresses various aspects of quality management and contains some of ISO’s best known standards. The standards provide guidance and tools for companies and organizations who want to ensure that their products
and services consistently meet customer’s requirements, and that quality is consistently improved. (ISO, 2018, https://www.iso.org/iso-9001-quality-management.html)

While ISO 9001 is the standard specifying the requirement necessary for certification, ISO 9000 specifies the “fundamentals and vocabulary” (SIS, 2015). The 9000 series further include ISO 9004 Managing for the sustained success of an organization - A quality management approach and ISO 19011 Guidelines for auditing management systems (ISO, 2019).

ISO’s different standards are promoted and sold in Sweden by the Swedish Standards Institute (SIS). SIS (2015, p ii) present themselves as “an independent non-profit organisation with members from both the private and public sectors”. In correspondence to ISO they describe standards in the following way:

Standards consist of documented knowledge developed by prominent actors within the industry, business world and society. They promote cross-border trade, they help to make processes and products safer and they streamline your organisation. (ISO, 2015, p ii)

In a Swedish context, certifications according to ISO 9001 are frequently combined with certifications according to ISO 14001, Environmental management systems – Requirements with guidance for use, and OHSAS 18001, the occupational health and safety management, which was recently replaced by ISO 45001. Another standard often discussed is ISO 26000, Guidance on social responsibility. Among other things it has been argued it is a good support for organizations facing new requirements according to the EU Directive 2014/95/EU on non-financial reporting. A representative of a Swedish Company group new to sustainability reporting but included on a national list of the best sustainability corporations, explained during an interview that she was not into-the details with the content of ISO 26000 but held ISO 9001 and ISO 14001 as useful in relation to their corporate work according to the directive.

FR2000

While ISO and SIS could be described as the major standard setters in relation to the Swedish market (Boström and Tamm Hallström, 2013; Gustafsson and Tamm Hallström, 2013) there are other standards relevant for the population of businesses in focus during this project. The Swedish economic society, FR2000, issues a standard which has been proposed as an alternative to some of the ISO standards. It
was developed to integrate the requirements of ISO 9001, ISO 14001, ISO 26000, and local requirements for competence management, occupational health and safety assessment management, systematic work environment management, and systematic fire prevention. The precursor of FR2000, MVR-Q, was developed in 1994 by the Swedish organization Mekaniska Verkstärdernas Riksförbund (an organization gathering small and medium sized businesses within the engineering industry) and a local chapter of the Swedish Federation of Business Owners. The point of departure for the development of the FR2000 standard was that the system should be "cost efficient and not demanding extensive consultant support. Furthermore, it was considered important that the cost for certification should be reasonable" (FR2000, 2018).

A management system is nothing odd. It is a work description helping you to bring structure and uniformity in the control of the business. With a simple and logical construction, a management system can give you more time – instead of more administration. (FR2000, 2018, https://www.fr2000.se/ledningssystem/)

Another important instruction to the FR2000 standard setters was that ISO should be "guiding the addition of requirements" (FR2000, 2018). The standard is thus formulated to correspond to ISO 9001, ISO 14001, ISO 26000, SS 624070, OHSAS 18001, AFS 2001, AFS 2015 and SRVFS 2004. In other words, it includes quality management, environmental management, social responsibility, competence management, occupational health and safety assessment management, systematic work environment management, and systematic fire prevention. The latest version of FR2000 was published early 2017.

Most auditors working with FR2000 are also certified to do revisions of at least a couple of ISO standards. One of those auditors working with ISO as well as FR2000 explains the benefits with a management system in the following way:

I believe that the biggest advantage is that you understand more about your operations. That during the certification process, issues that you did not really understand before are brought up. You get a holistic view of how processes in your own business is connected. That I would say is one of the big advantages. Another big advantage is that you feel you have everything in order, not just the documentation and the structure. You get your organization in order. You know who does what. You know how to realize changes in your organization in a good way. That I would say are the big advantages. Then of course you will also improve the efficiency. Most often this will lead to the adoption of a more efficient way of working.
which in the end will lead to improved profitability of the business. But I believe that often, this new order and structure make the organizations that are certified questioning “Wow, how did we actually control our operations before? How did we manage without this structure?” (FR2000, 2018, https://www.fr2000.se/)

Today FR2000 emphasize that the certifications are always performed by an independent auditor from a certification body. An auditor we interviewed who was engaged only with ISO standards, nevertheless considered the FR2000 certification to be a second party certification “only”. Perhaps more important is that the auditors we talked to, including those working mainly with FR2000, emphasized that while FR2000 might be relatively well known in Sweden it cannot compete with the ISO certifications when doing businesses internationally. Another area of debate is how useful FR2000 is for public procurements (FR2000, 2019; Upphandlingsmyndigheten, 2017). While representatives for FR2000 refer to the court decisions ruling that FR2000 should be considered equivalent to ISO, legal experts at the national agency for public procurement point out this is dependent on how the requirement for each procurement has been formulated.

FSC and PEFC

For some businesses engaged in the construction industry, the standards promoting sustainable forest management are important since their customers demand a chain of custody certificate on their products. In Europe, 60% of the forests are certified either via the Programme for the Endorsement of Forest Certification (PEFC), the Forest Stewardship council (FSC) or both (Hammar, 2019). FSC was founded in 1994 in Mexico to promote environmentally, socially and economically sound forest management. PEFC was founded in 1999 by forest owners’ associations in eleven European countries mainly representing small- and family forest owners. While possibly seen as competing standards, FSC and PEFC describe their principles of chain of custody certification as closely aligned to allow for dual certification in “an efficient and straightforward manner” (Carstensen & Gunneberg, 2010). Auditors working with both certifications agree.

The relation between FSC and PEFC, on the one hand, and ISO on the other is not always easy to understand. An example of their close connection is that FSC auditors often attend ISO courses for auditors as part of their training for becoming FSC accredited. An example of their opposition is the situation when ISO initiated their work to issue an ISO chain of custody standard for wood and wood-based products.
FSC and PEFC issued a joint statement recommending ISO members to vote against the new work item proposal. Both organizations were still involved in a liaison group during the later formulation of the ISO Standard 38200 Chain of custody of Wood and Wood-based products. FSC has, however, stated on their homepage that "the ISO Standard is not an appropriate alternative to the FSC CoC standard" (FSC, 2019). Representatives of organizations engaged in wood and paper-based industries describe the overlapping rules and terminology for certified wood products as “one of the longstanding frustrations” within the industry and debates the decisions by different actors (MixedWood, 2019). While the standards promoting responsible forest management are successful in many ways, this also illustrates the fragility of non-state authority among the organizations setting standards and requirements for certifications (Boström & Hallström, 2013; Gustafsson & Hallström, 2013; Hallström, 2008). It is also an illustration of the complex web of organizations engaged in the development of standards and certifications.

Other standards and certifications

To many of the SMEs interviewed, the product certification CE marking (Conformité Européenne) is important. CE marking is obligatory for products for which EU specifications exist and require the affixing of CE marking and thus applicable to many products within the construction and housing industry. The CE marking means that the producer or importer guarantees that the product has been assessed to meet the EU safety, health and environmental requirements. The CE marking is applicable to products but in some cases the certification also includes inspection of production facilities. RISE, owned by the Swedish State, is a major notified body for construction products in Sweden, but there are also non-government organizations delivering similar services. Among the issues debated in relation to the EU regulation on CE marking is how some third party certifiers in some contexts exploit their position between several standard setters to sell services related to voluntary certifications when they are working with legally required certifications (Galland, 2017).

Within the construction industry there are several other organizations promoting certifications related to the sustainability of products and/or buildings. Among the ones most often discussed in Sweden are Miljöbyggnad, BREEAM, Citylab, LEED and GreenBuilding. Even if these are not considered management system standards, they have implications for what construction companies and other customers demand from suppliers. The association Sweden Green Building (SGBC) offers training and support
in relation to the certifications mentioned above. SGBC was established in 2009 by thirteen large construction and housing companies and has more than 350 members. Besides training and support in relation to certification they work to promote sustainable buildings and areas. At SGBC webpage he chairman of the board at the time for the foundation describes the development in the following way:

In 2009 there were no politicians – neither in government nor in opposition – who were willing to work with these questions. We were thirteen businesses and organizations who decided to take on the leadership role in this area. […] It takes a holistic approach, a continuous dialogue and determination to think before you act. In this way, many expensive experiments can be avoided. […] Now we have over 300 members and about 20 employees which makes us the fastest growing organizations for sustainability in Sweden. Our members are passionate about sustainable community building. We are developing and supplying tools in the form of certification systems – for example environmental certifications of buildings, urban districts and plants. (retrieved from sgbe.se/om-oss/ 2019-11-11, translated from Swedish)

The above discussion hopefully helps by mapping the major management system standards and certifications possibly relevant for SMEs working with glass and wood in the construction and housing industry. The text also serves to exemplify how the development of standards and certifications within important areas is ongoing and that this development is taking place within a complex web of organizations (Boström & Hallström, 2013; Gustafsson, 2016; Hallström, 2008). We will next describe the work during the project related to management system standards and describe a couple of cases illustrating topics of general interest.

**Different approaches to management system standards among SMEs**

This part of the BOOST-project started out when the CEO of a small business interviewed regarding their business model and the possibility of business model innovation, started describing the tsunami of requests they faced related to the many quality and environmental management system standards used within the housing and construction industry. Continued discussions with business representatives and
advisors to SMEs supported this description. After our review of previous research, we found that the impact of management system standards and certifications are inconclusive. A repeated argument, however, is that the impact on operations is related to the motives for introducing a management system. After our investigation of what standards and certifications could be considered relevant for an SME working with glass and wood within the housing and construction industry, we therefore directed attention to how different actors within this industry reason on the many standards and certifications. Parallel to this, we followed the debated regarding standards and certifications within the industry and talked to representatives for three major housing construction companies and four representatives of housing companies. It was clear that they all considered especially a management system standard related to quality as important to SMEs but also standards related to sustainability and working environment. As one of them put it “I can’t exactly describe the relation between certifications and the actual quality delivered but I think there are sound reasons for why businesses applying to be classified as one of our approved suppliers answer few questions if they are certified and face many questions if they are not.” The auditors interviewed confirmed they had seen important improvements over time in companies certified in line with specifications to one or several standards even though the management systems might look very different even if certified according to the same standard. Although there was a general agreement on this part, the use of consultants when introducing a management system according to a standard was debated. While auditors are accredited and to some extent scrutinized, consultants are not. A couple of auditors suggested that while some consultants are engaged in contributing to organizational improvements, some of them could be described as “specialist in making sure an organization passes the accreditation with as little effort as possible”. One auditor, who worked with ISO as well as FR2000, suggested that the skepticism to FR2000 among some actors might be explained by a few consultants who translated the standard to be about documentation mostly.

As this project is a development project rather than research project, we needed to work with the investigation regarding different actors’ reasoning on the many standards and certifications in a way that was useful for the practical objectives of the project. After finding out that knowledge about management system standards
and certifications used in the housing and construction industry were considered crucial by many customers of SMEs we arranged a seminar on the topic. The BOOST-project leader, who also had experience as a business advisor, delivered a list of a little more than 40 companies considered a relevant target group for the seminar. Before the seminar, we visited two businesses already certified in order to get more in-depth knowledge.

The first business cannot be considered part of the population in focus during BOOST as this business is not working in wood or glass. We decided to include this business in our work anyhow since they are working in the construction industry serving similar customers as many of the SMEs in focus during BOOST. Also, they were expecting a visit from the auditor and open for a BOOST project member to observe the process. Furthermore, the owner manager agreed to several dialogues over phone as our project developed and new questions came up.

The business employs 20 people at two different work sites and sales estimate 120 million SEK yearly. Both work sites were certified according to ISO 9001, 14001 and AHS 18001 during the summer of 2017. The CEO, who was the sole owner since a year back when he bought the shares of his previous partner, explained that initially they decided to go for the certification because it would “smooth the process” when delivering to the major construction companies. However, he also gave examples of improvements related to the certifications of the management system. Among other things he said the certification process had made him understand the importance of delegation. He and his colleagues were also more aware of the importance of making sure tasks were not performed and understood by one individual only. “Everybody in this firm should have a guy in the mirror, somebody who knows what needs to be done if he or she is away or ill.” When talking to the auditor during the site visit, she confirmed the improvements made in relation to the certifications.

When the CEO was asked about the certification in relation to sales and profit, he laughed out loud. “I have no idea. But I do know, I sleep better at night”. He continued talking about the importance for all managers in this industry to know they had done what is required in relation to quality and safety. Furthermore, it was obvious he and his colleagues took pride in their certifications. “When new
employees come here, we can all feel proud about how we organized thing. It is really nice to see that."

The other business we visited before the seminar is a special carpentry, certified according to FR2000 since 2003. Sales 2018 were above 45 million SEK and the number of employees 22. In correspondence to the first business studied, managers started to discuss a quality certification because of requests from customers. During this time there was a development project run by a governmental agency which made it possible to get some support in terms of consultant hours if introducing FR2000. The carpentry was part of a group of businesses who sometimes collaborated in projects who all signed up for the certification project. The carpentry was, however, the only firm to follow through. Although the initial choice of FR2000 to some extent was dependent on the consultant preferring this standard, this business is now a firm supporter of FR2000. The CEO showed how the system has consequences for business operations “from order to finalized delivery” during our site visit. Furthermore, as this business was in the process of succession in both management and ownership, the documentation of processes had additional benefits. In this case, the two brothers who founded the company were to transfer management and ownership to two younger co-workers. As part of this project we had contact with a larger company group which multiple times have acquired middle sized family run businesses. The CFO of this company group not only confirmed that management systems according to a standard often made the acquisition process easier but also that it made the management of the acquired business better prepared to be part of a company group. Her examples included among other things the fact that this company group since 2017 were required to report on their sustainability work according to the EU Directive 2014/95/EU on non-financial reporting. She explained that their daughter companies who were used to ISO were less worried about the directive then those at the headquarter who were not:

We were maybe not thrilled to begin with. We cherish our entrepreneurial drive in the group, and our initial reaction was this meant more administrative work. [...]

Many of our daughters are certified according to ISO 14001 so they were used to this before.

In preparation for the seminar, all companies got an e-mail invitation and we also tried to reach all over phone. As this list included firms with very few employees, we
did not get a chance to talk to everyone. The invitation clearly communicated that
the BOOST project included researchers from the university participating but that the
main part of the session would be taught by a representative from one of the major
certification bodies. Among the businesses we talked to many were interested but
said they did not have the time to engage with the issue right now. Several said over
phone they would sing up, but later declined because they did not have time to
attend. (A conclusion after the project is that it was wise to collaborate with
practitioners. However, many of the business representatives we talked to would
most likely be happier to receive a visit from project representatives on their own
sites rather than traveling themselves to the university. For future projects we
consider it important to include budget expenses for researchers to visit SMEs rather
than the other way around.)

A few invited businesses which we called were clearly annoyed by just thinking
about management system standards and certifications:

ISO or the other thing you said are never mentioned by our customers. All our
products are CE marked by the supplier and that’s it.

We are not interested in things we do not have to do. It is enough with PEFC and
such things. Do you know how expensive it is? The other standards are never
asked for.

We face that question every day. But this is a small business. It is impossible to
produce furniture in Sweden and carry that type of expenses for administration.

I can not see how this is relevant for us, a small business. But it is always nice to
hear from the University so please send an invitation.

Among the businesses who attended the seminar, it turned out three businesses
were considering implementing a management system. Two attendances
represented a business who already was certified but since they both were new at
their positions, they attended to get the possibility to discuss different versions of
management systems in relation to standards. Out of the businesses in which
implementation of a new standard was considered, one business was already ISO
9001 certified but considered to start using ISO 14001 as well. Because of a heavy
work load this process has not yet been initiated eight months after the seminar. The
business school and the quality manager are however in contact and will formulate a
suggestion for a student internship assignment related to this work. The second business has been in contact with the auditor who lectured during the seminar to initiate the certification process of ISO 9001. The third business was during the seminar most interested in an FSC certification. Their customers were interested in the chain of custody certification and the owner considered FR2000 or ISO as possibly useful as a preparation for the FSC certification. After the seminar and discussions with an FSC consultant, the decision was made to "only" go for an FSC certification. When we discussed this case with an FSC auditor, she confirmed that even though a quality or environmental management certification might be useful for an FSC certification, it is certainly not necessary.

Another interesting issue brought up during these dialogues is the relation between general standards and the requirement of specific customers. One of the businesses invited to the seminar was engaged in the process of quality certification according to ISO 9001 and ISO 14001 approximately ten years ago. During the process they concluded it was better for their business at the time to follow the quality requirement of their major customer. While this could be understood as making them more dependent on their major customer, the CEO still considered it a good decision.

Conclusions and plans for further research

The mapping of the major standards and standard setters is hopefully useful for SMEs working with glass and wood within the housing and construction industry as well as relevant to their advisors. While the ongoing development in relation to standards has brought about improvements in many fields, it is also possible to understand the CEO who described the many standards and certifications within the industry as fairly overwhelming.

In general, our findings support previous research suggesting that while customer demand frequently is described as the major reason for why a quality or environmental management system is considered in the first place, organizational
contingencies are important for how and to what extent the management system is integrated into daily operations. Our study contributes to previous research by taking the point of view of different actors into consideration when mapping the many standards and certifications within a specific industry. The cases contribute to the understanding of the role a management system can have for matters such as owner-manager well-being and identity construction as well as succession. The findings also contribute to previous research by demonstrating how industry specific quality and environmental standards and certifications might influence the attitudes to general ISO standards within an industry.

The discussion of the different standards, certifications and standard-setting organizations of relevance for SMEs within this industry adds to the understanding of the impact of standards on businesses and industries. The field material includes challenges related to implementing and maintaining management systems but also the benefits. On a general level, the study contributes to the understanding of management systems standards on the meso and micro level which is important since much previous research has focused either on micro or meta-level analysis.

Drawing on the further material collected during this project, our plan is to develop this report into two research articles. The first one will focus on the main issue in this report, i.e. management systems standards and certifications from the perspective of SMEs and the actors around them. The second article will focus on the dynamic between management system standards and business model innovation as a couple of auditors have brought the interesting dynamic between organizational structure (represented by standards and certifications for management systems) and agile practices. Based on research on standards and innovation, it has been concluded that managers, standard setters and researchers all need to separate between different types of innovation and to be careful as to what processes are standardized and certified (Mangiarotti and Riilloo, 2012; Terziovski and Guerrero-Cusumano, 2014). When the concept innovation now is being embraced in the rhetoric around ISO 9000 and other standards it is relevant to investigate the rhetoric used on innovation in relation to different standards. As standardized management systems are increasingly important for many organizations, the rhetoric on innovation in and
around standards can be seen as important for how we organize for innovation (or at least believe we can organize for innovation).

The faculty engaged in this project have initiated dialogues with SMEs, auditors, consultants and standard setters regarding future collaborations for development work, education and research. During the Spring we are planning to submit one application to the Swedish Research Council (Vetenskapsrådet) and one application to the Swedish Research Council for Health, Working Life and Welfare (Forskningsrådet för hälsa, arbetstv och välfärd) for continued research. The first application will be focused on the relation between the EU Directive 2014/95/EU on non-financial reporting and different management system standards as well as the possible implications of this relation for sustainability performance. The second application will focus on the new ISO standard for occupational health and safety management ISO 45001 which is replacing the national standard OHSAS 18001. While ISO 45001 is discussed as potentially having a major impact globally, there are Swedish auditors arguing that with the occupational health and safety regulations in Sweden a ISO 9001 certification might have more impact for employees and their everyday work than a certification to the new standard in some local SMEs.

References


Carstensen, K., & Gunneberg, B. (2010). Joint Statement by the Forest Stewardship Council (FSC) and the Programme for the Endorsement of Forest Certification (PEFC) recommending ISO members to vote against the New work item proposal Chain of Custody of Forest Based Products - Requirements. In F. a. PEFC (Ed.): FSC.


Gustafsson, I. (2016). Organising av standarder, certifiering och ackreditering som en global styrregim. (Doctoral ), University of Gothenburg, Gothenburg.


Upphandlingsmyndigheten. (2017). Requirements for environmental management systems in ISO 14001 and EMAS (Krav på miljöledningssystem i form av ISO 14001 och EMAS).
