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Social Networks

Creating Organizational Benefits out of
an Online Conversation

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Abstract

Social Networks - Creating Organizational Benefits

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Scania is increasing its production by improving its efficiency. The company is striving to achieve its new productivity goals without making large investments. In large organizations such as Scania there are many competent and skilled employees. However, since many of their offices are located worldwide communication is not always efficient and optimal. The purpose of this thesis is to show the potential benefits when implementing and operating online social networks within global organizations including Scania.

Through empirical studies of global organizations which have utilized online social networks for a relatively long period this study intends to collect information which can help generate knowledge about the implementation and operation of online social networks.

Our research revealed that important aspects of the implementation of an organization's online social network are knowledge management, dissemination, social ties and links between micro-and macro-networks. Thereby we concluded that online social networks lead to the creation of benefits for the individual as well as for the organization.

Based on the theoretical framework and empirical evidence gathered in this study, we have concluded that an implemented model of an online social network fosters such benefits as improved communication channels and increased efficiency in the workplace.

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Sammanfattning

Scania söker att öka sin produktion genom att höja sin effektivitet. De vill därmed öka sin produktivitet utan större investeringar. I en stor organisation som Scania finns då naturligt en stor kompetens men där många enheter är spridda över ett globalt område vilket gör att kommunikation är avgörande för att ta vara på den kompetens de faktiskt besitter. Det studien ämnar till att göra är att utforska allmänna potentiella nyttor för organisationer och inte enbart för Scania.

Genom empiriska undersökningar hos externa organisationer som har arbetat med sociala nätverk online en längre tid, avser denna studie att samla in så många erfarenheter som möjligt rörande implementering och driften av sociala nätverk online. Dessa studier kommer tillsammans med interna empiriska undersökningar rörande Scanias organisation, samt teori inom området, länka samman de olika elementen som ett socialt nätverk online, kan bestå av. Genom att kombinera olika typer av kunskap och processer kan det sociala kapitalet så småningom utvecklas och omvandlas till innovationer som kan identifieras som en affärsnytta för organisationen.

Det som förefallit vara en viktig del vid införandet av ett socialt nätverk online i en organisation är kunskapsledningen, de sociala banden kopplingen mellan mikro- och makronätverk och kunskapsspridningen. Som i sin tur skapar både en nytta för individen och en affärsnytta för organisationen.

Utifrån det teoretiska ramverket och det empiriska materialet har denna studie kommit till slutsatsen av parametrar vilka direkt är tillämpbara i en modell, som påvisar en potentiell nytta för organisationer som söker ökad effektivitet genom förbättrade kommunikationskanaler.

Nyckelord: innovation, kunskapsspridning, makro- och mikronätverk, sociala nätverk online

Distribution of Work

In this examination paper, Jonatan Rörsch, Master student in the programme in Industrial Management and Innovation and Mikael Johansson, Civil engineer Student in the programme System in Technology and Society, collaborated to conduct this study.

The allocation of work has been equally divided between the authors and all the parts have been carried out mutually. In the preparation of the report Jonatan had a greater focus on the theoretical part and Mikael had a greater focus on the methodological part as well as the introduction. The empirical data has been compiled largely collectively but a greater focus on internal studies can be noticed from Jonatan in the mean while Mikael has had a slightly greater focus on external studies. Analysis, conclusion and discussion are summarized entirely collectively through an iterative work process which was parallel to the rest of the compilation of the report's different parts.

Acknowledgement

This report is the result of our master thesis work at Uppsala University during the spring semester 2013. It has been conducted in collaboration with Scania, and makes out the final part of our respective education.

We would like to thank: our topic examiner David Sköld at Uppsala University for his guidance and his support of our academic work; our supervisors Niclas Lillman and Karin Gustavsson, along with the ICCS-group at Scania, for guidance in the area of online social networking and for granting us access to the organization. A big thank you, also, to Henriq Hellström, consultant at Scania, who contributed with various information and essential contact information regarding external respondents.

We would also like to thank all the respondents in the study, who have participated in the interviews and discussions, and in the survey, which made this work possible.

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1 Introduction

The following introduction will attempt to offer a perspective of Scania's vision and future plans and how an online social network can play a part in their strategy and ability to accomplish these goals.

Scania's goal is to increase its production to 150,000 vehicles per year by year 2015. It would like to achieve this by working smarter. The vision was presented during a presentation in 2008 and is the target of Scania's efforts to streamline its production. In seven years, Scania should almost double its vehicle production with the same infrastructure, personnel and with only minor investments (Scania, 2008).

*"We have a challenging period ahead of us, but it is quite possible to do."*¹

The target for Scania is 100 000 units in 2010, which means ten vehicles per year and employee - this is double the amount compared with year 2000. When their vision is reached in 2015 the goal will be that every Scania employee produces 15 vehicles per year.

*"This will be done as it always does in Scania, with small steps. We will harness the hidden resources that exist in our organization and in this way we will increase production by 10,000 vehicles each year."*²

To achieve the vision of 150,000 vehicles continuous improvements in the daily production is crucial, the lead time must be shortened between order and delivery.

*"This does not mean that you should work harder, but it is about that you should work smarter."*³

Scania understands that employees' ability to find information and knowledge and share it is a key part to their current and future success and is a way to work smarter. Scania believes that all its employees are smart and want to continue achieving and making positive improvements. Day-to-day work provides inspiration and new ideas while at the same time enhancing employees' skills. Scania trusts that this can result in improved quality and efficiency as well as job satisfaction. Creating a comprehensive learning organization is viewed as the only sustainable competitive advantage in a fast-paced and fast-changing technical environment (Scania, 2008).

Online social networks can be a communication channel that could offer new opportunities for sharing information and knowledge both among colleagues closely bound by shared interests and also among those with whom we seldom interact.

¹ Leif Östling, former CEO Scania.

² Leif Östling, former CEO Scania.

³ Per Hallberg, Executive Vice President, Production and Logistics, Scania

However, because of the ease with which information can be disseminated, organizational control of information is threatened and could increase the risk of loss of intellectual property and proprietary knowledge. It could therefore be important for organizations to operate in a manner that takes advantage of the benefits of social software technologies in a way that create business benefits for the organization and enable efficient knowledge management.

Scania is a company with over 35,000 employees spread across approximately 100 countries. It has approximately 20,000 people working in an independent sales and service organization, an organization with a large social capital spread across the globe. The company is divided into various departments, individual profit centers, operating in their respective fields such as IT, Production and Logistics, Finance and Business Control, Sales and Service Management, Research and Development, Purchasing, Human Resources, Franchises and Factory Sales. In order to create a global conversation in such a large company and take advantage of the knowledge the company possesses more effectively, it is important to find solutions to tie together all the units within the organization, thus also creating a more effective knowledge management (Scania, 2013). To achieve efficiency, Scania prefers to work methodically. Its philosophy is based on the idea that efficient methods and processes bring good results and are an asset for Scania. This philosophy has been collected in a model they call the Scania Production System (SPS), which embodies their basic values.

SPS is an instrument that Scania utilizes to increase its productivity, reduce their investments and increase the efficiency of the same number of employees. The purpose of the SPS is to enhance production and to eliminate wastage of resources in the business. Scania believes that the tool is well established in the organization because it has been well integrated into business processes (Scania, 2012).

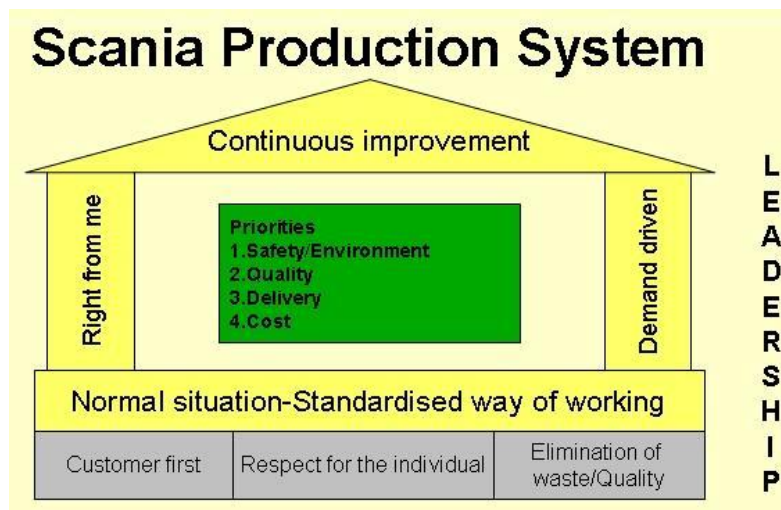


Figure 1: Scania Production System (SPS) (Scania, 2012).

SPS is based on three core values: Customer first, respect for the individual and the elimination of waste. In addition, there are four main principles of the SPS, these are:

- **Normal mode:** Normal working methods/conditions that will prepare employees to detect discrepancies.

- **Right from me:** No deviations are accepted and should under no circumstances be included in a final product to the customer.
- **Demand-driven production:** Nothing is manufactured without an existing need.
- **Continuous improvement:** The whole time challenging normal mode and correct deviations so that they will not occur again at a later time.

SPS is a tool to streamline operations and is based on a constant effective knowledge flow within the organization. To streamline production, Scania has a well-developed tool it uses today. The next step may be to create a tool that streamlines the SPS by satisfying the need for effective communication channels to ensure that the flow of knowledge and experience does not hamper the work of SPS (Scania, 2012).

Increasing productivity by being more efficient is not an isolated event at Scania. Many organizations before and many organizations today are struggling with the same issue and have faced the same problem of working smarter and trying to make use of their full potential. On a competitive market, organizations need to seek higher productivity without making large investments for being competitive. This leads automatically to lower costs in relation to the higher proceeds increased productivity can bring. Being more efficient without making large investments then requires re-allocating, prioritizing and streamlining the resources that the organization already possesses which can help to identify competitive advantages but it often demands a change in the organization's structure (Alvesson & Sveningsson, 2008). By changing the structure of the organization, the human capital of the organization needs to accept the change or accept that they themselves need to change. Then different organizations can be more or less willing to adapt to the changes since the culture of the organization sets the rules on how to act and the culture differs between organizations (Holmblad Brunsson, 2002).

*"Organizations are social units (or human groupings) deliberately constructed and reconstructed to achieve specific goals."*⁴

Organizations are to be seen as social arrangements where the culture can differ. The culture of the organization is a product of time and something that does not change overnight. Because of that, organizations that seek change need to have in mind that large scale bureaucratic changes do rarely succeed. Instead, organizations need to see change as a small scale continuous project over time (Alvesson & Sveningsson, 2008). Seeking higher productivity by being more efficient with resources which are already part of the organization is then a continuous process. To work smarter with already acquired resources, organizations need to find competitive advantages within their own human/social capital. They must learn how to establish better social relations in order to administer the knowledge capital they possess and learn how to disseminate that knowledge to everyone. Tools for finding competitive advantages can vary, but with social networks as a platform for human/social capital to disseminate knowledge, organizations can begin to implement those advantages successfully. The social network should have access to the organizations' resources. As a result, if the organization accepts the change, new knowledge can emerge from improved knowledge management in a changing organization (Holmblad Brunsson, 2002). New knowledge or innovation can

⁴ Etzioni, A., 1964, Modern Organization, p.3.

help improve existing methods, processes and routines of daily work and of how the organization operates its business.

Currently there is an initiative in progress that aims to provide all employees at Scania with online social networking capabilities. This initiative anticipates to make the organization more efficient and smarter. It will also decrease deviation while at the same time improve the communication across the organizations' borders. Some of the current problems Scania has encountered deal with employees who do not fully understand the benefits of a social network and how the utility can help them in their daily work. In general, most of the employees within the organization use means of communication that have existed in today's society for a long time, such as email, phone and group meetings. However, Scania's goal is to create a global conversation among employees throughout the organization, in the most simple and efficient manner as possible. The potential to work more efficiently through better communication already exists among employees, since a majority of employees already use online social networks during their free time and are familiar with the private benefits of online social networks. This must now be attributed and implemented to a business advantage for Scania employees so that they can discover the relevant connections between knowledge, communication, innovation and efficiency.

1.1 Problem

This section seeks to clarify the conditions during which this study was conducted. It will also include the purpose of the study and questions that are intended to be answered within the boundaries of the report.

1.1.1 Purpose

This study aims to investigate how online social networks are structured in terms of social capital, social relations and how a social network disseminates its capital of information and knowledge. Furthermore, the goal of this study is to investigate the integration of the online social network within the organization and if it is possible to relate the online social network's flow of knowledge and information to the innovation of new processes, methods and routines which can help the organization to be more efficient. The final product of this study is to generate a model which can show possible benefits of an online social network within an organization. This model is consistent with Scania's goal to develop a tool which can help measure the possible benefits of an online social network.

An important issue that can be expressed here is based on the introduction and the purpose of this paper. Can an online social network contribute to greater involvement or commitment within the organization, which in turn leads to an improved distribution of information and knowledge, and thus increase competence and productivity? Even though this particular issue will not and/or cannot be answered entirely in this examination paper, we can still take it into account when investigating and answering the other research questions.

1.1.2 Research questions

With information from selected organizations whose names are mentioned further in this report, and earlier studies, represented in this thesis, the following questions needed to be answered to serve the purpose of this study:

- What environments are suited for using an online social network?
- How can an online social network have a positive impact on an organization?
- How can a model be constructed that displays and proves benefits of an online social network within an organization?

1.1.3 Boundaries

The study focuses on theories about the sociological aspects of online social network. This is because the research will study a technical system from a sociological point of view. The study will focus its empirical and literature research on knowledge management and flow of innovation within an organization which has implemented a system that disseminates information and knowledge.

Furthermore, the research will have its focal point on the positive effects of an online social network, although possible negative effects will be acknowledged in the concluding discussion. The demographic range of this thesis is limited to organizations within the Swedish borders, which are operating on a global market.

1.2 Disposition

The disposition of this report follows the implementation of the study. The introduction seeks to gather enough background information to motivate why this research is being made and is followed by our problem and research questions which are intended to concretize our research. The method of this study is to explain how and in what way we have reached conclusions which can answer our research questions. This will be further explained in the next section. The method of the study is followed by our theoretical framework and selected by the need to find theories that describe the fundamentals of social networks, namely, how and which benefits can be gained/derived from it by implementing them. The observations from the empirical data are then to be compared or contrasted to the theoretical framework of this study. By using the tools from the theoretical framework we intend to provide a more nuanced and deeper understanding of the issues identified in the work and can thus in the analysis section, which follows after the case studies of the essay, apply and connect theory to the empirical material. The empirical studies which follow the theoretical framework have been carried out through five different case studies in organizations similar to each other in terms of size and geographical spread. Four of these organizations, Ericsson, SEB⁵, IBM⁶ and Electrolux are currently working with online social networks and one of the organizations, Scania, is in the startup phase of the implementation. The aim is to investigate how the four organizations that use online social networks today can relate their implementation to some kind of benefit for their organization and how they integrated the online social network into the organization for reaching that benefit. The organization that does not currently use online social networks, Scania, contributed to this study because we can investigate how the organization is structured in terms of

⁵ SEB - Skandinaviska Enskilda Banken

⁶ IBM - International Business Machines

culture, communication routines and dissemination of knowledge. In the analysis, our intention is to develop a base of knowledge which can help us derive conclusions from our observations. These observations are then presented as conclusions formed by our purpose and research questions. The final part of this research, the product, is to gather all our conclusions together and construct a model that shows how organizations in general, and Scania in particular, can relate opportunities with values of an online social network and connect it to some type of benefit.

2 Method

This section clarifies how our methodological framework can serve the purpose of the study and how it has been designed to make use of the tools from the theoretical framework.

After completing a review of the literature we concluded that most of the literature dealing with topics of knowledge management, innovation and social networks for organizations is only general and not implemented in certain organizations. The lack of studies at Scania regarding online social networks motivated us to try to find out if there was a need or necessity for such. Looking at similar organizations within the same operating range gave us a possibility to find the answer.

2.1 The method of the study

The study consisted of interviews with employees at Scania and with employees at other organizations working with collaboration services. This provided insight into Scania and other comparable organizations considering their structure, culture and communication related to their online social network (Andersen, 1998). By analyzing the structure, culture and communication routines we were able to relate this to our research about the types of environments where online social networks can develop and what positive effects can be connected to them.

The first issue, which refers to the first of our three research question in our examination paper, concerning investigating favorable environments about online social networks will be answered through empirical studies at Scania about organizational culture and structure. Empirical studies at the other four organizations concerning integration and the theories of social capital, social relations, dissemination of knowledge, tacit and explicit knowledge will also be addressed. The second issue, concerning potential benefits of online social networks will be answered by: the Nonaka's knowledge management theory, Druckers sources of innovation, the theory of organizational innovation and vision, and from findings during the empirical studies at the four organizations concerning benefits and integration. The third and final issue will be answered by analyzing the answers of the first and second issue and gathering the conclusions from those to use in a generic model.

This study focuses on the analysis of Scania and the perspective of its organization. As we want to study the various factors in a selected event or individual event and then place it in relation to its environment, a case study is the preferable tool. Currently it is beneficial to perform a case study, with the purpose to investigate why an organization has acted in a certain way (Yin, 1994). The aim of the study is to find reasons for the organization to act in a certain way and how they can relate it to surroundings in their current environment. Conclusions made in the study must be drawn from a local to a more overall point of view that can be used to serve the purpose of the study. When we examine the subject of a specific case, it does not mean that the material can be used to draw general conclusions. However, the specific extent of the case must be borne in mind when generalized conclusions are made (Kvale & Brinkmann, 1997).

2.2 The data collection of the study

With Scania as the main object of this study there is a need to understand its organization in terms of culture, rules and routines. Further it is important for the purpose of this study to find similar and related organizations, both geographically and industrially related to Scania. In this study, we have concentrated on literature studies when searching for theoretical frameworks. Interviews and surveys set up the foundation for the empirical collection of data. By collecting documents regarding information from scientific papers, interviews with actors and independent surveys with anonymous respondents, we gain an understanding of the area of study.

2.2.1 Secondary sources

A review of previous studies on the subject social networks has been conducted in order to connect empirical material to previous studies, comparing the previous studies to see if there is a consensus between our empirical material and previous cases. In addition to the review of previous studies a series of theories regarding knowledge management, innovation, and social networks was conducted and compiled by various authors. The research for these theories was derived from studies in relatively knowledge intensive environments such as various business areas and universities.

We focused on intra-organizational online social networking sites that are either integrated into the intranet or connected as an external client to the organization's communication platform. The emphasis is placed on organizations that focus their research and development on producing new products (Andersen, 1998). The theoretical framework serves as a basis for the rest of the study. Our sources for literature were the Uppsala University library, articles in various scientific journals and information provided by Scania.

2.2.2 Primary sources

Interviews and surveys made it possible to get an idea of the organizations, their cultures, their communicational routines and their experiences.

2.2.2.1 Interviews

The interviews were of a semi structured character since the purpose of the interviews is to let the respondents ventilate all their thoughts on the subject (Bryman & Bell, 2005). The interviews that took place were of great help to identify potential areas where the online social network could have an impact or effect on the organization. Also to get a deeper understanding of how the different departments of Scania are structured and how they make use of their present communication channels, their organizational structure and culture. The goal is to get a better understanding of Scania's communication channels across borders both internal and external. How employees disseminate knowledge within their departments but also between departments, domestically as well as globally. The purpose of the interviews was to clarify how the employees communicated in and outside their units. Respondents that were interviewed were either consultants, co-workers and managers at various levels and from different kinds of departments at Scania. Interviewing different people was necessary to get a broader understanding of how they could manage to find and develop knowledge within their unit and between units at Scania. Two respondents working with IT collaboration tools were also chosen because we wanted to develop a better understanding of what they had

in mind regarding organizational culture, dissemination of knowledge and innovation related to their expertise in IT collaboration tools.

2.2.2.2 Survey

The survey was a cross-sectional design, whereby the goal was to collect a set of quantitative or quantifiable data that was linked to or affected by a number of variables and factors that facilitated the analysis, which was aiming to find different possible relationship patterns regarding communication within the organization of Scania (Bryman & Bell, 2005).

A questionnaire was compiled and sent out to all employees at Scania through the intranet. The questionnaire was designed to identify communication routines and the extent to which they use online social networks in private. This was done to investigate the significance of the different communication channels and to identify potential problem areas. The survey contributed to an analysis of the communication within the organization and as a complement to the internal interviews for validating the findings.

The survey that was completed at Scania, had 24 questions which were divided into six different categories. The six categories are (the following number in parenthesis is the quantity of questions each category contains): demographic information (2), profession and experience (4), online social networking routines (3), dissemination of knowledge (4), communication (8), and commitment (3). Each question had different response options and the options could be answered either by checking a box; where only one single answer was possible, or by checking a box; where multiple answers could be checked. An interval response method between the numbers 1 to 7 was also used in some questions, where 1 reflected - a negative response - and 7 - a positive response. The number of respondents who completed the survey was a total of 212 individuals and the survey was available for about three weeks to everybody on Scania's intranet news feed. The number of responses in relation to the number of people working within the organization and having access to the intranet was relatively small since Scania has over 30,000 employees.

2.2.2.3 Case studies

We used multiple case studies, which were derived from a comparative perspective. The purpose of these case studies was to gain a broader perspective and deeper understanding of the different factors involved in the introduction of an online social network within an organization. This type of survey method is preferable to facilitate the development of theory and in our case the development of the theory regarding social networking and its impact on organizations (Bryman & Bell, 2005). The organizations that we used for our study had all different conditions, developing skills and various business areas, though they had a common denominator, namely online social networks. By using multiple case studies we were able to identify potential benefits and problem areas with the introduction of an online social network within their organizations, multiple case studies provided also the possibility to develop a theory about social network within organizations which up-to-date is relatively young and unexplored. The choice of respondents was from a convenience sample (Bryman & Bell, 2005). Through a respondent at Scania, we received the contact details of companies that have implemented online social networking within their organization and have obtained a certain knowledge concerning that area. These five companies represented the theoretical saturation in our study needed for our research. We

considered the chosen organizations to be interesting as a result of the fact that some had been world leaders in the field of online social networking for a long time. Some respondents had and still have a similar organization in terms of size and geographical spread and some, respondents had been working with internal online social networks for a long time. Only one organization however had recently started to look into the possibilities of online social networking in their organization.

Scania is one of the organizations participating in the case study since the company is the employer of this project and the findings of this study are to be put into context in Scania's organization. The respondents interviewed at Scania are the following: *Aras Kazemi* is an IT consultant at Scania since 2006 and works with the development of the intranet and the online social network Agora⁷ at Scania. His work includes both improving the functionality and ease of use of the various tools, but also to advocate and teach how to use the online social network in various units at Scania. *Nicklas Eriksson* works as a solution architect in the area of content and collaboration at Scania IT. Nicklas had previous experience as a software developer. Today he works with architecture but also with the management of the intranet Inline, Nicklas' role is project manager. He has been at Scania since 1999 and worked previously at WM data where he helped to develop the intranet, Inline. *Michael Johansson* is currently the IT administrator and joined Scania in 1989 at productions. Later, Michael worked with product coordination, development and IT coordination. His role is business architect and currently works with cross-functional matters. *Michael Müller* is new to his current position, where he is responsible for the IT infrastructure. He has worked at Scania for over seven years in the IT Department. His current department features End User Services, which entails everything from the workplace such as cell phones to e-mail accounts, e-mail systems, handheld scanners and printer solutions. They develop different concepts for global use, but also for very specific use. He also works with the Hosting Services. That part is much about how they assemble servers. They help design different networks to fit as many needs as possible within Scania. *Simon Karlsson* is a Human Resources Specialist and works with global development and coordination of the dealer network. He works with the spreading of knowledge between different geographical locations for a "best practice" or a standard for "how to work". *Helena Rydberg Granath* works as a manager for Human Resources for staff in terms of expertise functions. Helena is responsible for the HR's intranet which is an exchange of information between managers and Human Resources. *Mattias Söderholm* is the team leader for a group called Production Engineering Development. They work with Person Technological Development, trying to coordinate or synchronize people and activities. *Bertil Rengfeldt* currently works as a global buyer and has 30 years' experience at Scania. Bertil currently works with Supply Chain Development and has worked in quality control, logistics, process development and production. *Jeanna Tällberg* and *Karin Callin* are employed at Scania Academy where they work in leadership training. They both have extended experience at Scania and have worked in various departments.

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IBM was chosen because the company has been working with IT solutions for a very long time and must be seen as an industry leader in developing and offering online social networking solutions for organizations. The study conducted an interview with *Stefan Edqvist*, Technical Manager at IBM.

⁷ Agora is the name of Scania's online social network.

SEB was chosen because the company has been working with online social networks for a relatively long time. The company is a global company similar to Scania and does not have IT as their core business. The study conducted an interview with *Anna Lindström*, Collaboration Manager at SEB.

Ericsson was chosen because the company has been working with online social networks for a long time. The company is a global company similar to Scania but has IT as their core business. The study conducted an interview with *Andreas Rådlund*, IT Innovation and Management at Ericsson.

Electrolux was chosen because the company has been working with online social networks for a relatively long time. The company operates on a global scale similar to Scania and does not have IT as their core business. Something that they both have in common is a manufacturing department in their organization. To analyze possible benefits and use for an online social network within a global corporation the interview was conducted with *Ralf Larsson*, Collaboration Manager at Electrolux.

2.3 Criticism of method

The sources we have used in the theory and methodology are of scientific nature because they are published by recognized authors or approved by recognized institutions. Since the reliability of those sources have already been investigated by the institutions publishing it, we consider the sources as reliable.

The sources interviewed during the empirical studies at Scania are to be considered as reliable sources in terms of how they experience the organizational culture at Scania and what kind of communication routines they possess. Therefore it is not said that these experiences are of an objective character since the respondents are part of the organization they describe and may not be seen as impartial. This has been taken under consideration during the composition of the sources and by conveying a survey we aimed to complement the reliability from the interviews at Scania. It is possible to get an additional picture of Scania's organization if other respondents were chosen or if more respondents were chosen. Since Scania is a large global organization it is very well possible that there are differences in the way employees experience the environment of the organization. The sources which serve as the empirical basis for the case studies at the other four organizations consist of participants on the market that cannot be considered impartial in the study. Please bear in mind that these sources may affect the reliability of the study after assembling the empirical material. In order to maintain a high level of reliability of the empirical material we enhanced this with studies of the selected entrants. It is possible to get a different picture of the external organizations' experiences by interviewing other participants. Although, we do believe that we have gained appropriate and reliable knowledge from the chosen ones. All interviews must be seen as the individuals' view of the organization and under no circumstances be interpreted as the general opinion of the organization.

3 Theory

The theory section will start with a review of previous studies in the field for gaining knowledge on what is concluded by others. This is useful when analyzing our own findings because we can then compare our own study to previous studies and identify similarities and differences.

3.1 Literature review of previous studies

A series of articles and case studies has been revised to get a deeper understanding on what the possible benefits and impacts a social network can have within an organization.

One of the benefits individuals can gain from a social network is that they more easily can keep in touch with other group members and the connection between members inside the group became more efficient, but also the colleagues outside the group. That could be seen as a potential benefit for the individual and coincident the organization (Ferron, Massa & Odella, 2011; Cummings, 2012). As Cummings (2012) states in his article, a social network can pose a benefit in which the individual can create an impression of a person, just by visiting their profile and without any physical contact. Another important factor that can be seen as a benefit for the user is how intuitive the interface is of the software, in other words how user-friendly it is. It has a contributing factor for the individuals regarding how fast they can activate themselves and acclimate to the software. It is crucial that the platform does not inhibit the users from starting to disseminate information and knowledge and activate themselves with the tool. The product (social network medium) has the features of an already known social software e.g. Facebook (Cummings, 2012; Ferron et al., 2011).

DiMicco, Millen, Geyer, Dugan, Brownholtz & Muller (2008) conducted a research in which she wanted to see how the motivation and communication between colleagues and project groups could be enhanced through a social network within a large organization? The research revealed that connections within the organization between colleagues could be enhanced, both inside the company, but also on a global scale. To create a bigger network with more nodes⁸, more weak-ties and also strengthen the weak-ties between coworkers were an important finding. The significance and the value of weak-ties within the organization are to be prioritized, when it contributes to the dissemination of knowledge and the flow of information between individuals within that network (DiMicco et al., 2008).

The amount of knowledge and information can have a connection to the individual's area of expertise ergo the individuals will share more if they feel confident and secure within their area of expertise and if individuals' reputation will be improved (Wasko & Faraj, 2005). Furthermore studies have shown that the more you help other people within a social network, the better reputation you will receive within that network. Which in turn will generate the individuals' better reputation on a professional level (Wasko et al., 2005). When disseminating knowledge and information within a social network, a certain feeling of security and confidence can be found within the walls of an organization rather than outside (Wasko et al., 2005). Organizations that are not in possession of a direct software tool for communication between colleagues at their

⁸ Node - a node resembles a hub that includes many threads or roads that are connected / linked to it.

workplace, can find benefits with a social tool in the communication between individuals and groups of individuals. The social tool can give them an opportunity to simplify the communication and to use it as a tool for reaching out to new individuals whom they did not know or had the possibility to interact with without the new social tool. These were conclusions that Ferron et al. (2011), Cummings (2012) and Wasko et al. (2005) have drawn from their studies. A social tool can contribute to expose patterns of communication inside an organization and let employees visit each others' profiles when searching for knowledge and to imitate each other. (Ferron et al. 2011) This study, about collaborative networks, conducted by Ferron et al. (2011) also shows that organizations who have not used social networks before tends to adopt and adapt to the new communication tool quite fast. The tool helps individuals to interact with each other in a simplified way and helps creating weak and strong ties between colleagues.

Previous studies also show that management in organizations that implement a social network must be gentle as to what information employees are sharing on their profiles and within the boundaries of the social network, since the information is not verified and does not need to be true. It can lead to a misleading impression of the employee (Cummings, 2011).

Conclusions of previous studies show that participating in social networks helps to strengthen and improve the professional reputation of the organization and their employees. Improving the reputation is a strong justification for participating in the dissemination of knowledge (Donath, 1999). Doing this online helps to develop and extend the employees' professions (Stewart, 2003). These studies also show indications that collaborating online will provide better advice than searching for information on the internet. Another conclusion from these previous studies shows that social capital linked with relations did have a small impact on the dissemination of knowledge (Wasko & Faraj, 2005). One of the conclusions from this study was that individuals who use the social network are pleased to help others without gaining any knowledge in return. The more individuals who use the social network for communicating with others, the more they want to create new contacts inside the organization (DiMicco, Steinfeld, Ellison & Lampe, 2009). When a user applies the social network more frequently and visits the site more often, thus getting stronger associations with the network, generates more social capital. Findings show that the enjoyment of the network is vital and is the most influential factor for individuals to continue the use of the social network. The numbers of peers in the network and the usefulness are also important factors. Users have a bigger interest when it is possible to connect on a global level. Hence a larger access to more peers leads to a larger access to more expertise and specialists. Social networks can play an important role in helping individuals to retain and extend their network of contacts inside their organization. The social network can also aid people who do not possess the ability to form productive contacts within the organization (DiMicco et al., 2009). Individuals who use the social network will be motivated to use the tool from three different things; connect with others on a personal level, career advancement and promote their ideas and projects (DiMicco et al., 2008).

These previous studies are either generic or specific. Our ambition is therefore to place a similar study on our respective cases in order to serve our purpose.

3.2 Theoretical framework

Online social networking is about connecting with each other, building relations for using a combined social capital and trying to be more efficient by solving problems in a more collaborative way. The dissemination of knowledge is a factor in all kinds of social networks since it is one thing organizations often want to promote when enhancing their knowledge management process, hence expand their database of knowledge. The theory of social networks is important in this study because we want to know in what environments social networks thrive. To do that we need to understand how networks are built, what they are built of and what they gain momentum from. We also need to take knowledge management into consideration, since knowledge is often considered as an important component that exists throughout social networks and is often related to competence which in turn is closely related to success. Knowledge is a major contributing component today and therefore necessary to understand how the concept of knowledge management operates. Finally innovation has to be taken into consideration. Consisting of creativity, ideas and collaboration it is a potential benefit and a product of knowledge beneficial to many areas like efficiency and productivity. One possible innovation that we are seeking is the new knowledge which can arise from people collaborating and by complementing each others' knowledge create an end product who can be of interest for the benefit of the organization. The study aims to evaluate whether a social network can contribute to innovation and if so, how it manifests itself in the form of innovative flow. Our purpose is to investigate if there are any special parameters or factors that come into play in the diffusion of innovation within organizations that have implemented an online social network.

3.2.1 Social networks

When starting to dig into the theory of social networks it is important to have in mind that a network does not consist of nodes with equal conditions. Networks come with components with different kinds of conditions and a social network is not an exception. Networks can be seen and used as a tool to identify relationships between different nodes. Two nodes and their individual networks of social contacts or other nodes, may be a direct result of the relationship between them. Granovetter speaks of an overlap between these different networks of nodes and the overlap may represent a valuable source for broadening an individual node's own network, the overlap gives opportunities to make new contacts to new nodes. The existing local network that the individual node already possesses, Granovetter rates as strong micro-level relationships. The larger network the individual node gets access to through the overlap is to be considered as a network at the macro-level with weaker relationships (Granovetter, 1973).

This theory of micro and macro relationships with strong and weak ties will be relevant for this study, since it helps the analysis to identify fertile ground for a social network based on already established strong micro relationships.

3.2.1.1 Social capital

Social networks are useless without anything to fill them with, in this case the social capital. This is what defines the contents of the social network and what it possesses. Capital is generally known as an overflow from a produced product or service (Putnam, 1995). Social capital is defined by its function. It consists not only of a device but a variety of different entities, with two elements in common. They all consist of some sort of aspect of social structure, and they promote certain actions of actors, whether they are

individuals or organizations within the structure. Social capital belongs to the structure of relations between actors and among actors, who work in a network (Coleman 1988). Without the social capital a network loses its value, it is about creating and developing links between individuals and they build relationships within the network. It takes often place as a communication between the actors in Network. In the end it is established in the exchange of information / knowledge between stakeholders who are of interest to the individual or the collective (organization) (Burt, 2000). A more formal definition of social capital is also available, this time defined by Woolcock and Narayan (2000) who argue that social capital is a network's standard form to enable individuals acting collectively. This simple definition serves a number of purposes, it primarily allows us to focus on the resources of social capital (Portes, 1998), whereas we have in mind that the key elements of social capital, such as trust and reciprocity is developed by an iterative process. Second, this definition allows us to see the different dimensions of social capital and social forums, which may have greater access to more dimensions than individuals acting alone.

How does a global organization deal with social capital in an efficient way? As Lin claims social capital can be spread more easily and efficiently through a communication tool such as social networks (Lin, 1999). Networks bring the necessary elements needed to expose entrained hidden resources and without these networks, it would be impossible to identify these resources. As Leif Östling said during the presentation of Scania's vision, the hidden resources are vital for Scania to evolve (Scania, 2008).

3.2.1.2 Social relations

As Granovetter stated earlier social networks is heavily depending on the different types of relations that exist between the individual nodes that exist in and around the network. There are studies that show the benefits of large macro networks and how the small micro-relationships can lead to the development of large networks. Therefore Granovetter further explains that it might be important for organizations that intend to create large networks to understand the value of micro-relationships and how they can be exploited by understanding the relationship between micro and macro relationships. (Granovetter, 1973) The strength of an interpersonal tie is almost always measured in the amount of time, emotional intensity, intimacy and the reciprocal service which characterize the tie. The strength in a group consisting of three individuals is related to the specific ties between those members of the group. For example, if the group consists of individual A, B and C where A - B and B - C have strong ties the probability of A - C to develop a weak tie is imminent, the weak tie between A - C is depending on the strong ties between A - B and B - C but the weak tie is important for the group's ability to link different networks and thereby expand its own network (Granovetter, 1973).

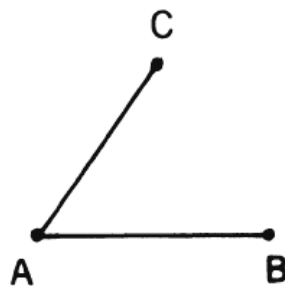


Figure 2: Strong ties in micro-level networks (Granovetter, 1973).

What is important to take into account in this figure is that the strong relationships are not the bridge between networks. It is those weak ties that act as a bridge between existing networks and it is those weak ties that will become the key factor in extending the chain of networks. If only there were strong relationships between all nodes in the network so that no bridge was necessary, the network should look to other external areas to expand their network by creating new weak ties (Granovetter, 1973).

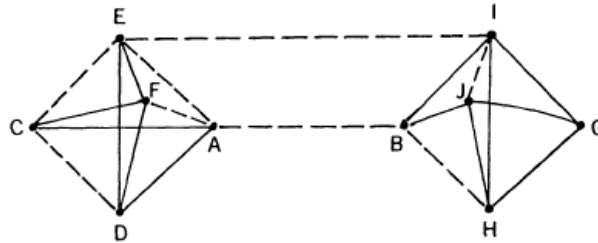


Figure 3: Weak ties in macro-level networks (Granovetter, 1973).

The general theory of these figures is that whatever is diffuse or weak may lead to reaching out to a larger group of individuals. This will then lead to the social distance is being reduced than if relationships only were linked by strong ties.

3.2.1.3 Dissemination of knowledge

When the fundamentals of social networks have been highlighted it is time to investigate what it can bring to its members. In the case of looking at its contents, in terms of social capital, knowledge is the main ingredient which we are seeking. So what can knowledge gain in social networks? Obviously it can reach out to more respondents and by that it can also gain momentum since it is an open language which can be improved by everyone qualified. Improving the dissemination of knowledge is a clear benefit of social networks and is to be investigated next. The organization and its social network's ability to absorb knowledge is very important when it comes to the skill to disseminate knowledge within the organization. Stimulate individuals to using the communication channels in the organization to take part in not only the sharing of information and knowledge but also to share the innovations and ideas across borders and units is necessary for the organization to develop and absorb its capacity beneficial for the organization's development of the dissemination of knowledge (Tsai, 2001). A motivated and appropriate question in this case would be to wonder how organizations can develop their ability to absorb and disseminate knowledge. An answer to this could be that a social network possesses those features that can enhance, assist and contribute to the organization's current communication system to be more efficient and help units to make use of knowledge outside their unit and between units, through an interorganizational system (Tsai, 2001).

These theories of social networks will be able to help us in our study to analyze and better understand how networks are constructed and operated. It will also help to identify fruitful ground for social networking sites and what stimulates these networks to evolve into a system that helps the organization to spread and absorb knowledge.

3.2.2 Knowledge management

After clarifying the fundamentals of social network theories we know now how social networks are structured and how they develop, we also know that the dissemination of knowledge can gain momentum from social networks but we do not know exactly how to accurately define knowledge and therefore we cannot know how to manage it properly. One of many short definitions of knowledge may be information, facts and skills accumulated through experiences and education, the combination and process of induction and deduction which results in knowledge. The interest of organizations to seek prosperity and efficiency may be based on the skills that the organizations possess. Researchers have realized that knowledge can be the key to success in this endeavor. As knowledge is seen as a source of expertise and advantage for organizations and their social network, it is regarded as a catalyst for an effective environment of these systems (Demarest, 1997; Karl M. Wiig, 1997).

Information is knowledge and the more information an organization possesses, the more knowledge it possesses. Organizations must however be vigilant about not filling communication channels with too much information than it can handle, which if so can lead to information overload that can lead to the opposite effect of what it is supposed to be. Today, there is a major shift in how large amounts of information and data is managed, which has led to exponentially increased data. To meet the increased processed amount of data procedures are required to distinguish the differences between knowledge and data (Quintas, Lefrere & Jones, 1997). A similar qualitative change is required in the validation of the data as of the management of data. In order for data to be managed as effectively by individuals as by those systems that store and distribute the data, this validation is fundamental for it to be able to derive data as knowledge. Such validation of knowledge should take into consideration where the user is located when knowledge is consumed, as well as under which circumstances it is consumed (Quintas et al., 1997). When such a validation of data is to be reviewed and distributed as knowledge to users it is required that this function takes the organization as a whole into account in terms of culture, people, processes and technology. When this knowledge is usually not stored in traditional databases but in the heads of individuals new databases, designed as the human brain, have to be developed. This new database has to be able to meet the requirements to manage, store, validate and distribute data as knowledge under all conditions and at all times when users might want to consume knowledge (Quintas et al., 1997). Organizations must be open to the possibility to store and distribute knowledge on a both formal and informal basis. To succeed in this transformation of knowledge it is important to realize that knowledge is a process or set of relationships (Quintas et al., 1997). Knowledge management in this regard is not about dealing with all knowledge that is known, it is instead about being able to design strategies and business processes that can contribute to a monitoring and evaluation of where knowledge is and how to effectively manage that knowledge.

These processes need to distribute knowledge on an intra-organizational and maybe even interorganizational way to increase the dissemination of knowledge between suppliers and organizations.

3.2.2.1 Nonaka's SECI-model

How can we form a knowledge management process or strategy that takes what we learnt about knowledge in people's minds rather than in traditional databases and put it into new kinds of databases that are inspired by the human brain? Maybe we do not

need to create a new kind of database, instead we could use our own minds and act together as a database. Nonaka has tried to define the terms we have to operate by when considering this.

Something that is or can be related to knowledge management is Nonaka's theory of organizational knowledge creation and how different modes and processes can help to develop individuals' and groups' knowledge absorption, creation, and dissemination throughout the organization. Tacit knowledge could be difficult to formalize since it is often time and space specific. Tacit knowledge can be acquired only through shared experience when spending time together or being in the same environment. Socialization typically occurs in a traditional apprenticeship, where apprentices learn the tacit knowledge needed in their craft through hands-on experience, rather than from written manuals or textbooks as explicit knowledge. As seen in the SECI-model formalized by Nonaka tacit knowledge can be an incubator for explicit knowledge in the process of knowledge creation and a constant combination and dialogue between these two knowledge "genres" that will aid the development and creation of knowledge within the organization, both old and new (Nonaka, 1994; Nonaka & Takeuchi, 1995).

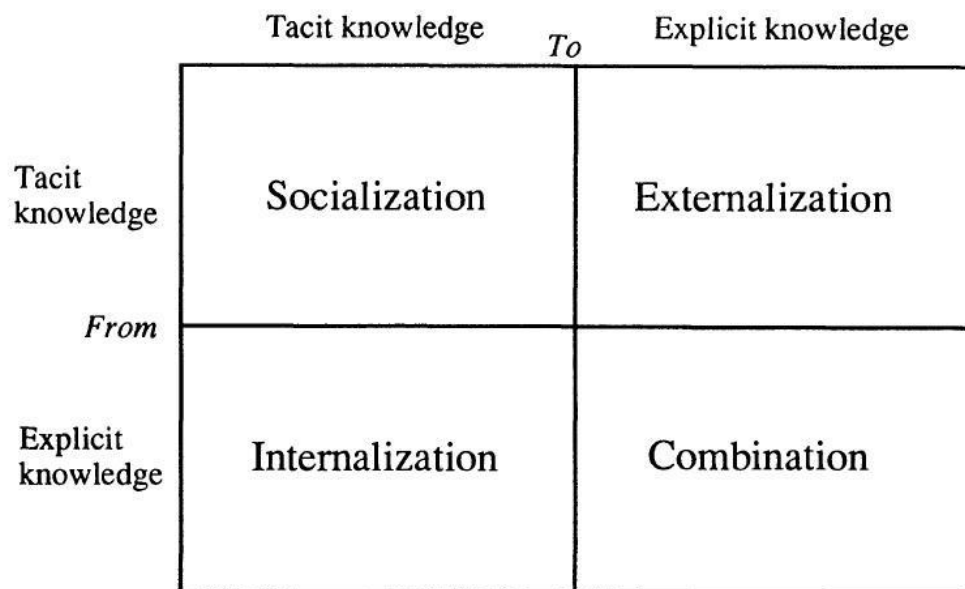


Figure 4: SECI - model of knowledge creation (Nonaka 1994).

Figure 4 above, demonstrates the four stages / modes of the SECI-model and the ever continuous process of the knowledge spiral.

Socialization: The spiral begins at the tacit knowledge *Socialization* which means sharing and creating tacit knowledge through direct experiences, walking around both inside and outside the organization and while doing so the individual is accumulating and transferring tacit knowledge, *tacit to tacit*, between individuals, through and by the means of their environment. Convert knowledge through the interaction of individuals.

Externalization: Leads to the next step in the process of knowledge creation and conversion, *Externalization*, articulating tacit knowledge through dialogue and reflection in groups spreading to individuals throughout the organization and to

different environments, thus translating tacit knowledge into facts and more manageable knowledge for the organization.

Combination: Third mode; the reconfiguring and systemizing of existing information through the gathering, sorting, adding, integrating, re-categorizing and re-contextualizing of explicit knowledge can lead to new knowledge. Groups are transferring, diffusing and editing explicit knowledge throughout the organization embedded by the environment. This process of creation of explicit knowledge from tacit knowledge is referred to as *combination*.

Internalization: Fourth mode of the SECI-model; the so called *Internalization* which is the conversion of explicit knowledge into tacit knowledge, can also be called as learning. Learning and acquiring new knowledge = tacit knowledge in practice. Individuals are absorbing knowledge by action and practice through the group, who are adjacent to the environment and the organization, the individual is within that area of knowledge conversion. The environment and organization are emerging and the individuals and groups are inside of that emerging field, where the learning process is taking place (Nonaka, 1994).

The SECI-model can assist us in the process between knowledge management to both the creation and the transition from tacit knowledge to explicit knowledge and vice versa, which is an important part of an organization that relies on all sorts of knowledge. It is a part of the development of innovations and inventions that can lead to a more efficient organization, retention of competence and tacit- and explicit knowledge within the organization.

This model can mirror the picture of how an online social network can in some way have the same modes, processes as the SECI-model, but on a digital platform.

3.2.3 Innovation

At this stage we have an understanding of how social networks can develop and operate, we know about dissemination of knowledge as a potential benefit from it and we know how to manage that knowledge we are to disseminate. But what can the knowledge bring in terms of value for our organization? Let us start by saying that by working together we are also combining all our knowledge and experiences together. We are in possession of a huge amount of social capital many times larger than if we were to operate on our own. Would it not be strange if we were not able to come up with more creative ideas than before? Can the flow of innovations gain from being more social and interactive? We believe so and many others agree that an online social network can in a way promote ideas and creativity and thus the flow of innovation through an online platform. Through such a platform we are aiding and keeping a more transparent and open conversation throughout the organization. Innovation can be defined as the application of new ideas to the products, processes or any other aspect of an organizations activities. To either refine a product, process or an activity.

3.2.3.1 Innovation - Druckers seven factors

If innovation is to be a value that can be related to social networks how do we stimulate the flow of innovation within the organization? Is it possible to do it through an online social network because of the possible increase of transparency and collaboration?

“Innovation is the specific instrument of entrepreneurship. It is the act that endows resources with a new capacity to create wealth. There are seven key sources of innovative opportunity: four within the business, and three due to changes outside the business.”⁹

According to Drucker the sources of innovation within and outside the organization are seven factors, but due to the difficulty to justify and apply all sources of innovation opportunities in our thesis, three of them have been removed: *unexpected occurrences*, *incongruities* and *industry and market changes*. Left are these four sources that follow below. When applying these sources of innovation opportunities in our thesis, we have set aside that the various sources either are applicable inside or outside the company. We will only see these sources as innovation opportunities, regardless of whether from inside or outside the organization.

Process needs: is a certain source of innovation, a restatement of the cliché that necessity is the mother of invention. This particular source takes advantage of how an organization or person can refine and improve a process by adding something or taking something away from either a component or an activity.

Demographic changes: it captures the trends, including changes in population size, composition, employment, educational status, income and age. It is according to Drucker the most reliable and least risky, when chasing innovation opportunities outside the organization.

Perception: another source of innovation opportunity is a change in perception, mood, and meaning. Drucker claims that the perceptions of seeing things from different perspectives is an important factor to create innovations. Managers that change their perception from seeing the glass half full to half empty open up tremendous innovation opportunities.

New knowledge: The final source of innovation opportunity is the superstar of entrepreneurship. New knowledge, both scientific, non-scientific, technical and social has a high ranking as innovation source. Drucker describes the features of this source, it has the longest lead time of all innovations but at the final stage it generates a lot of money. Like most superstars, they can be temperamental, capricious, and hard to direct.

The above innovative sources stated by Drucker (1985) can be applied and used to pinpoint advantages and disadvantages regarding innovation, finding, creating and absorbing innovation, when establishing an online social network within an organization. Drucker also claims that management has a big influence and importance in creating and absorbing innovation as well as how to manage innovation. Which makes his theory more tightly connected and correlated to the knowledge management theory.

3.2.3.2 Innovation - organizational innovation and vision

From what Drucker told us we know now how to stimulate innovations to gain momentum by knowing where to find the sources of innovations both outside and inside

⁹ Peter F. Drucker, *Innovation and Entrepreneurship*, 1985;2006 ,p.30-36.

the organization. Now it is high time to spread our new knowledge throughout the organization and create environments where innovations can thrive. How do we accomplish that? The adoption of an idea or behavior, in the form of either a new product, a new service, a new technology or a new administrative practice, which is new to the organization can be a definition of an innovation (Zammuto & O'Connor, 1992). A sense of purpose and meaning in our daily work needs to run an environment that fosters the development of innovations and creates an organization with a vision (Johannessen et al., 1999). For the climate of an organization to be conducive to creative individuals it needs to actively work to create an environment that takes individual's daily work environment in consideration.

‘‘Even when individuals have developed the capacity for innovation, their willingness to undertake productive efforts may be conditioned by beliefs concerning the consequences of such actions in a given environment.’’¹⁰

Organizational innovation is the relationship or tension between those processes or practices in which the organization is involved in and the goals the organization has set up with its vision. By keeping a high transparency in the organization, where managers clearly communicate and debate their vision with their employees, an increase of the flow of creativity and innovation can be obtained as well as an easier to maintain sense of ownership among employees. When a limited transparency may inhibit the creation of innovations, it is essential for organizations to maintain a global conversation that broadens employees' field of vision through for example social networks (Brynjolfsson, 1993). The leadership of the organization is of great importance and a major factor affecting employees creativity and effectiveness (Jung, Chow & Wu, 2003). Researchers believe that leadership can affect the creativity of its employees both in a direct and indirect way. Direct effects can be in the form of leaders setting an example, they take the lead and show initiative (Tierney, Farmer and Graen, 1999). More indirect measures of leaders to influence employees creativity can be as a result of creating a work environment that tolerates mistakes and undesirable results which may encourage employees to try different approaches without being punished (Amabile, 1996).

¹⁰ Mumford and Gustafson, Creativity Syndrome: Integration, Application, And Innovation, 1988,p.37.

3.3 Summary of theories

During this theory section we have reviewed previous studies for gaining knowledge about what previous findings in the field can bring to our study in terms of what is known and what is not known. Furthermore the theoretical framework of this study explains how networks develop and how they operate out of a certain perspective. We know that the dissemination of knowledge could gain momentum from social networks and end up as a positive effect from it. We know that a higher amount of competence can be spread throughout the organization as a result of better dissemination of knowledge and that the management of knowledge can help create better environments for the creation and flow of innovations within the organization. The innovation, which in turn can help create a value for the organization. This is because of its benefits in improving existing products, processes or services and even creating new ones. On top of that we also know how to manage innovations for gaining full effect from its possible values. In other words we have all the tools to fulfill this study's purpose to investigate if there is a potential benefit for organizations when applying online social networks.

4 Empirics

When studying the potential benefits of implementing a new system into an organization we need to know how the organization is functioning before the new system can be put in place. Therefore we have been interviewing employees at Scania regarding social relation, social capital, dissemination of knowledge, innovation and knowledge management. Studies at IBM, SEB, Ericsson and Electrolux which already use online social networks will describe their views on the integration of the online social network and the benefits they were able to derive from it.

The reason for the case studies is to put the general theories of social networks in a concrete context and verify if the theories are true in practice. The reason for doing multiple case studies, which in some aspects show the same results, is to verify that conclusions being drawn from them are not an isolated event.

4.1 Scania

When studying the potential benefits of implementing a new system into an organization we need to know how the organization is functioning before the new system can be put in place. Therefore we have been interviewing employees at Scania regarding social relations, social capital, dissemination of knowledge, innovation and knowledge management. By analyzing the environment at Scania regarding these factors, we could then move forward and compare the findings at Scania with experience gathered from IBM, SEB, Ericsson and Electrolux which already use online social networks. Studies at Scania have been carried out through surveys and interviews. The studies will be compiled in this chapter of the thesis. The empirical studies at Scania have been conducted to identify the employees' view of the organization and its culture, since we already know how upper management wants Scania to run through the SPS model, which was presented in the introduction. This part is for gathering knowledge about how it "really" works at Scania from the respondents' points of view.

4.1.1 Survey

The survey which was conducted at Scania had four different focus areas; demography, communication, dissemination of knowledge and innovation. Theories presented in an earlier chapter in this thesis show that social networks can have an effect on communication, dissemination of knowledge and innovation within an organization. Therefore this survey aims to identify the situation today regarding these aspects so possible future changes can be recorded and potential problem areas identified. Is there a desire or a need to improve communication routines or channels throughout the organization and, if so, whether an online social network can be a possible solution to the problem. Concerning the demographic aspect, we wanted to receive a better understanding regarding both age, position and profession at Scania and how it was divided across the organization. A presentation of the results from the respondents covering the four different focus areas will follow.

4.1.1.1 Scania demography

Scania consists for a large amount of technical skilled employees, in units such as R&D, IT and Production and Logistics. The technical skills of employees are important for the overall competence of the unit. The survey which we conducted at Scania consisted of 212 participants, 72 percent male and 28 percent female. The age of the respondents who participated in the survey were fairly evenly distributed across age groups.

However, there was a large majority of respondents in the age group between 18 and 48 years old. The majority of respondents were from technical units at Scania since 38 percent belonged to R&D, 18 percent to IT and 16 percent to Productions for a total of 72 percent overall.

Table 1: Demographic Information, crosstabs between ages and different positions and units at Scania

Count		What is your position						Total
		Manager	Group leader	Project leader	Consultant	Employee	Other	
Age	18-28	0	1	1	2	38	3	45
	29-38	6	1	7	4	47	1	66
	39-48	16	2	8	6	34	0	66
	49-58	6	0	5	0	16	0	27
	59-64	2	0	0	0	4	0	6
	65+	0	0	0	0	2	0	2
Total		30	4	21	12	141	4	212

Count		In which part/unit of Scania do you work?										Total
		R&D	P&L	Global Purchasing	F&F	Finance and Business Control	HR	S&S	Academy	IT	Other	
Age	18-28	22	9	3	3	1	1	1	0	3	2	45
	29-38	24	14	6	2	3	1	1	1	12	2	66
	39-48	25	6	3	1	2	5	6	1	16	1	66
	49-58	7	4	0	1	2	2	3	0	7	1	27
	59-64	3	0	1	1	0	0	0	1	0	0	6
	65+	0	0	0	0	0	0	0	0	1	1	2
Total		81	33	13	8	8	9	11	3	39	7	212

A vast majority of the respondents, 66 percent were in non-leadership positions while 25 percent were in leadership positions such as project leaders, group leaders or managers. Length of employment in this survey, was interesting in that 35 percent of all participants had been employed for 10 or more years at Scania and as many as 16 percent have been working there for 20 years or more. Among the majority or 64 percent, the total experience of employees was from one to six years.

Table 2: Demographic Information, crosstabs between male/female and different positions and parts at Scania

Count		What is your position						Total
		Manager	Group leader	Project leader	Consultant	Employee	Other	
Gender	Male	22	3	15	10	99	4	153
	Female	8	1	6	2	42	0	59
Total		30	4	21	12	141	4	212

Count		In which part/unit of Scania do you work?										Total
		R&D	P&L	Global Purchasing	F&F	Finance and Business Control	HR	S&S	Academy	IT	Other	
Gender	Male	60	28	11	4	5	3	5	1	32	4	153
	Female	21	5	2	4	3	6	6	2	7	3	59
Total		81	33	13	8	8	9	11	3	39	7	212

4.1.1.2 Communication

This section is designed for clarifying how employees at Scania are communicating today. By identifying how employees are communicating with each other we can find out how efficient the communication is and what needs to be improved.

Like many other corporations Scania uses e-mail, chat-applications, phone and face-to-face contact as their primary communication tools. Some of these communication methods are more effective and are used more frequently than others. There are issues concerning which tool is used the most or which one is the most efficient. More importantly, however, is the issue of searching and finding the right knowledge/skills for certain tasks and activities in an efficient and fast manner. When searching for an individual with a certain skill or to receive a quick response to a particular question, having an efficient tool is paramount.

The survey that was carried out indicates that 58 percent of employees (122 out of 212) are familiar with the online social network, Agora. The remaining 42 percent (90 out of 212) are unaware of this new communication tool.

When asked if they currently had an Agora account, 56 percent (118 out of 212) responded, "Yes", 24 percent (51 out of 212) said, "No", but they were interested in starting to use it and 20 percent (43 out of 212) answered, "No, not interested in using it.". This indicates that at least 80 percent of the respondents are interested in using Agora at the moment.

An important question regarding the purpose of this thesis was Scania's communication sufficiency. Thirty-three (33) percent (71 out of 212) of the respondents found that communication inside their unit was not sufficient enough and improvements could be made. There was also a high percentage in communication between units, where 55 percent (118 out of 212) of the respondents confirmed that it was flawed.

Table 3: Communication, crosstabs between different parts of Scania and the sufficiency of communication inside units

Count		Do you find the communication inside your unit to be sufficient?							Total
		No	2	3	4	5	6	Yes	
In which part/unit of Scania do you work?	R&D	3	4	18	15	21	17	3	81
	P&L	2	5	5	8	6	6	1	33
	Global Purchasing	0	2	3	3	1	4	0	13
	F&F	0	0	1	2	3	1	1	8
	Finance and Business Control	0	2	3	1	1	0	1	8
	HR	1	1	2	3	1	1	0	9
	S&S	0	2	2	2	2	2	1	11
	Academy	0	0	0	1	2	0	0	3
	IT	4	1	7	10	11	4	2	39
	Other	0	1	2	0	0	2	2	7
Total		10	18	43	45	48	37	11	212

Table 4: Communication, crosstabs between different units of Scania and the sufficiency of communication between units.

Count		do you find the communication between units/departments to be sufficient?							Total
		No	2	3	4	5	6	Yes	
In which part/unit of Scania do you work?	R&D	9	18	19	14	15	4	2	81
	P&L	1	5	7	6	8	5	1	33
	Global Purchasing	1	4	3	0	4	1	0	13
	F&F	0	0	3	4	1	0	0	8
	Finance and Business Control	0	4	1	2	1	0	0	8
	HR	1	0	3	3	2	0	0	9
	S&S	1	2	3	2	3	0	0	11
	Academy	0	0	1	1	1	0	0	3
	IT	8	7	13	5	5	0	1	39
	Other	1	2	1	0	0	2	1	7
Total		22	42	54	37	40	12	5	212

According to the survey findings, improvements could be made in different areas concerning communication. Improving communication within and between units with an online social networking tool would be a viable solution. 51 percent of the respondents (109 out of 212) affirmed the idea of the contribution of such a tool in their units. Also, 59 percent (124 out of 212) between units also agreed.

Table 5: Communication, crosstabs between different units at Scania and if a Social Network can enhance communication

Count		Do you think a Social Network could enhance the communication inside your unit?							Total
		No	2	3	4	5	6	Yes	
In which part/unit of Scania do you work?	R&D	9	10	8	15	18	12	9	81
	P&L	2	3	3	4	4	12	5	33
	Global Purchasing	2	0	3	4	1	1	2	13
	F&F	4	0	0	2	2	0	0	8
	Finance and Business Control	2	0	0	2	1	1	2	8
	HR	1	1	0	1	4	2	0	9
	S&S	0	1	2	2	1	2	3	11
	Academy	0	0	1	1	0	1	0	3
	IT	5	2	5	4	10	4	9	39
	Other	1	0	1	2	0	1	2	7
Total		26	17	23	37	41	36	32	212

Table 6: Communication, crosstabs between different units at Scania and if a Social Network can enhance the communication

Count		Do you think a Social Network could enhance the communication between units/departments?							Total
		No	2	3	4	5	6	Yes	
In which part/unit of Scania do you work?	R&D	4	8	13	12	17	16	11	81
	P&L	1	1	2	6	7	10	6	33
	Global Purchasing	0	1	3	1	4	1	3	13
	F&F	3	1	0	3	1	0	0	8
	Finance and Business Control	0	1	0	2	2	2	1	8
	HR	1	0	0	1	5	2	0	9
	S&S	0	0	2	1	3	4	1	11
	Academy	0	0	0	1	1	1	0	3
	IT	5	2	4	6	7	5	10	39
	Other	1	0	0	2	1	1	2	7
Total		15	14	24	35	48	42	34	212

When respondents were asked to answer multiple questions referring to communicating with colleagues outside their unit, 98 percent responded they used E-mail, 36 percent

used Lync, 82 percent used their phone, 74 percent communicated personally and four (4) percent used other methods e.g. Agora.

When asked if respondents believed that a closer integration between existing communication and knowledge sharing tools could enhance communication and knowledge sharing within Scania, 72 percent answered positively between numbers five through seven (5-7), using the interval one through seven(1-7).

Scania employees tend to use online social networks quite often, according to those who responded to this survey. Fifty-one (51) percent of all respondents said that they used online social networks at least several times a day, 70 percent of the respondents use online social networks at least on a daily basis and as much as 83 percent of all respondents said that they are using online social networks in some way at least on a weekly basis. Only 8 percent of all respondents said that they never use online social networks.

The most popular function of online social networks according to respondents at Scania is the news feed. Employees at Scania prefer their news in a social feed and also like the chat and email functionalities as well as the functionality to upload files. The main purpose for using online social networks is to keep in touch with friends and to keep updated on news. Some employees, 19 percent, also like to share their experiences with others on online social networks.

4.1.1.3 Dissemination of knowledge

According to the survey at Scania, one can surmise that there are many long time employees. However, it is also apparent that many change positions often during their employment. Although there was extensive experience among the respondents, there were not many employees in leading positions. That was an interesting observation considering the amount of experience among the respondents.

Our survey clearly indicates that many employees, to be specific 49 percent (102 out of 212), stated that they find the search for knowledge/skills/competencies inside of Scania to be difficult.

The respondents often search for expertise they do not have by searching for information outside their own network on the intranet. This is done by not using any of their already existing contacts at Scania and relying entirely on their own skills of searching and the availability on the intranet.

Employees of Scania also use their own network for guidance when searching for competencies, this is mostly done by using the traditional communication channels already in place at Scania such as phone, e-mail or personal contact. Almost none of the respondents used e-mail lists for distributing requests outside their own network of contacts.

Scania's intranet is the strong favorite in the dissemination of information at Scania. It surpasses, personal contact, e-mail, lync, phone, wiki and file servers. The intranet is also the most popular source when searching for people with certain skills, competencies and experiences. A close second is personal contact.

4.1.1.4 Innovation

The level of creativity, innovation and commitment is thought to be quite high at Scania since 72 percent of all respondents graded it “high” on the scale. If the creativity, innovation and commitment is considered high at Scania, the employees ascertained that improving the flow of information and the level of transparency at Scania would result in an even higher level of creativity, innovation and commitment. Survey results indicated that 75 percent of all respondents were positive on such an improvement.

Table 7: Commitment, crosstabs between different units at Scania and if a closer integration between CT could enhance innovation and commitment

Count		Do you think a closer integration between communications tools could enhance the knowledge sharing for Scania?							Total
		No	2	3	4	5	6	Yes	
In which part/unit of Scania do you work?	R&D	2	5	6	14	21	17	16	81
	P&L	0	2	1	5	6	11	8	33
	Global Purchasing	0	0	4	1	4	2	2	13
	F&F	1	0	0	1	3	1	2	8
	Finance and Business Control	0	0	0	1	2	3	2	8
	HR	0	0	0	3	3	2	1	9
	S&S	0	0	0	1	2	5	3	11
	Academy	0	0	0	1	0	2	0	3
	IT	2	1	2	4	12	8	10	39
	Other	0	0	0	1	1	3	2	7
Total		5	8	13	32	54	54	46	212

The respondents also believe that an online social networking tool could enhance innovation, creativity and commitment. A total of 59 percent were positive to the idea that implementing such a tool would enhance the above stated factors and improve the flow of knowledge and transparency throughout the organization.

Table 8: Commitment, crosstabs between different units at Scania and if a Social Network can enhance innovation and commitment

Count		Do you think a social network could enhance creativity, innovation and commitment by improving the flow of information and transparency of the organisation through this tool?							Total
		No	2	3	4	5	6	Yes	
In which part/unit of Scania do you work?	R&D	4	13	10	14	17	16	7	81
	P&L	0	3	2	5	6	11	6	33
	Global Purchasing	1	0	3	3	1	3	2	13
	F&F	3	1	0	1	3	0	0	8
	Finance and Business Control	0	1	0	0	4	2	1	8
	HR	1	1	0	3	2	2	0	9
	S&S	0	0	1	2	3	4	1	11
	Academy	0	0	0	2	0	1	0	3
	IT	5	2	2	1	9	9	11	39
	Other	0	0	0	4	1	1	1	7
Total		14	21	18	35	46	49	29	212

4.1.2 Interviews

A series of qualitative studies were also executed during the internal studies, consisting of twelve interviews within the company. This section emphasizes the view of the respondents toward the organization and under no circumstances is to be considered as the view of all Scania employees.

4.1.2.1 Areas of interest

During interviews we focused on communication routines and dissemination of knowledge as well as transparency in terms of organizational culture in order to acquire a picture of how Scania is functioning in these aspects. This is because we want to identify Scania's organization in the terms of the theories of social capital, social relations and dissemination of knowledge. By identifying strong micro level networks we know it is possible from Granovetter's theory of strong and weak ties to create larger macro level networks. The culture inside of Scania today is important when studying the potential effects with an online social network.

How is the current communication flow working/operating inside their unit? Are there any issues, any aspects that could be improved? Which tools do they use to communicate? What are their thoughts and opinions regarding the three factors mentioned in the previous section above about innovation, transparency and dissemination of knowledge? These were some of the questions that were asked during the interviews in order to acquire a better understanding and perspective of how an online social network could improve their everyday work in terms of communication and flow of knowledge and information.

4.1.2.1.1 Communication routines

Respondents stated that employees at Scania prefer speaking to fellow employees when they are looking for information or expertise. Alternately, they prefer calling or sending e-mails to see if and how others may have solved similar problems. Much of the communication within Scania is done through e-mail, some use email more than others, however it is still a longer lead time on email than other communication channels at Scania (Eriksson, 2013; Johansson, 2013).

Scania does not have an official communication plan on how communication channels should be prioritized. Employees think this is both positive and negative. It may be positive because everyone can be involved in influencing how they will communicate and negative because communication may be slow (Kazemi, 2013).

4.1.2.1.2 Dissemination of knowledge

Respondents ascertained that Scania lacks a mindset on how to manage information. The information platform is fragmented because it is difficult to adapt to new information channels. Many areas within Scania have to consider how to streamline their information channels. Today, you might say that the louder they shout the more important is the information they want to convey. Shouting and hope the information will arrive is the method today (Kazemi, 2013). Coordination of information is the key. Internal communication is very traditional, from manager to manager and then filtered down from the hierarchy. Scania's intranet has several communication channels but these are not addressed to a specific audience, rather are more of a general nature (Johansson, 2013). E-mail can be a very good information channel, however problems occur when the same information needs to be sent multiple times. Organizations suffer because of the amount of information sent through e-mail lists and are not addressed to

employees personally. E-mail addressed personally is mixed with the rest and it disappears in the crowd (Eriksson, 2013).

“It is exactly this part, everybody does not know everything and why they execute certain decisions[...]Scania can improve their knowledge dissemination across borders in a blink of an eye.”¹¹

Cross-functional work and communication across borders at Scania is not perfect. All operations are very tube-like, an island, that kind of challenge exists throughout Scania (Johansson, 2013). Respondents spoke about an ad hoc anchoring of information. People who work with a project become knowledgeable about it and are available to others who want information on how they solved problems (Kazemi, 2013). Those who have been around for a long time are in a better position to locate information because they already have an extensive network of contacts for finding the knowledge and expertise they need. Online social networks should be made available so the majority who desire to become involved can interest others to contribute to the network. By doing so, those with higher levels of experience incite activity and help to disseminate information. Looking at the situation from a product developer's perspective, it is important to receive feedback in their daily work, e.g. their 3D-CAD drawings. For example, we have this coffee cup and there are certain questions for which the developers want immediate feedback. Do you think that it will be easy to manufacture? Would a smaller ear/handle speed the production, will it decrease the costs? What do customers want/think, what are your thoughts about lifting the cup? This is precisely the dialogue that product developers need according to some co-workers. But then the question arises as well, which or what tools do we have to keep this kind of communication (Johansson, 2013)?

“The thing is, the people at IT come from a neutral environment within Scania. They come in sideways in general, and then offers this service, an online social network. But how does it relate to everything else that Scania has?”¹²

Some skeptics may become a bit puzzled at this type of approach and they have some doubts about that particular method when they talk about cutting-edge applications which Scania IT also offers. They take under consideration, what can this application offer compared to this online social networking tool or is this the application that we always should be using? These are some of the questions that respondents consider before they start or even think about starting using this new communication tool (Johansson, 2013).

4.1.2.1.3 Organizational culture

Employees who have worked for a long time at the company already have their network of contacts and know how to communicate. New employees however not having this experience require extra training and this in turn is implicated in the cost of recruiting (Rydberg Granath, 2013). Companies that have a greater focus on employees to produce faster generally base their theory on employees being easily replaceable. At Scania everyone is of course, replaceable, but in a more sophisticated way. Employees at Scania are more personally involved.. They tend to shift between roles/positions

¹¹ Michael Johansson, Scania IT, interview, 30-01-2013.

¹² Michael Johansson, Scania IT, interview, 30-01-2013.

within Scania but usually remain at Scania for a longer period of time. Respondents think the culture at Scania helps them to help their colleagues in solving problems, but the lead time can sometimes be long. This can mean that sometimes it is more efficient to find a new solution (Callin and Tällberg, 2013). The company prefers that employees be more creative and arrive at their own solutions to problems and not divulge the solutions per say. They proclaim that it could inhibit the ability to work methodically by only disclosing the method. Scania is split in that regard because some think the task is to push as much information as possible in order to increase collaboration and expertise but the Scania way in some cases can inhibit communication for the simple reason that they want to promote the methodical interest in employees at Scania (Rydberg Granath, 2013; Müller, 2013; Karlsson, 2013; Söderholm, 2013).

“However, the risk or the problem is if everything is visible, they will not be able to see anything. That is the next problem, they would like everyone to see it all so to speak. But at the same time, people will then drown in the information.”¹³

Optimizing with transparency, minimizing waste and reiterating work methods is important for Scania. There is very little original creative work. Employees learn from each other's work and utilize past experiences rather than to completely adopt a new solution. They affirm this creates a methodical approach by critically reviewing a previous solution and adopting it to their environment. The major challenge in this lies in the visibility of the method. They try to solve this by a desire to create more efficient channels and new ways for sharing, a better culture to promote dissemination of knowledge (Karlsson, 2013).

4.1.2.1.4 Transparency

Respondents stated that the company strives to attain a high level of transparency within the company as they attempt to have the same goals within the departments. They manage to do this by working with the same issues and goals throughout the organization and disseminating them through visual tools they believe contribute to good transparency (Müller, 2013; Karlsson, 2013; Rengfeldt, 2013). Scania's valuation management is a strong element of Scania's culture. Top management has developed this and has tried to anchor their values strongly in Scania's culture (Müller, 2013). They do not latch on to all trends without trying to be wise in their decisions and always seek stability. Respondents did not assume that Scania was necessarily slow with this, but that the company was thoughtful in their decision making. Those decisions are lengthy and they carefully prepare the information underlying the decision before any changes are made. The threshold for getting into and out of Scania may seem large when the organization is a little self-regarding about their work processes and methods. They think that this could be a result of Scania not being performance oriented but still wanting accurate methods to bring the desired results (Karlsson, 2013; Müller, 2013). In some departments at Scania it is determined that processes should and will work very similar but in other areas they are processed in completely different structures, which they think can be an internal threshold for moving around within the organization. Scania's standard depends on measures that there should be no errors, by minimizing costs they are maximizing results. They believe that the methods are efficient, but that perhaps some people find them to be tedious, especially for people who are very

¹³ Mattias Söderholm, Scania - TDE, interview, 06-03-2013.

creative and want to do things their own way, or people who want to find new methods to improve the efficiency for their particular own unit of the organization (Karlsson, 2013). For those who see the benefits of Scania standard and think it may be fun to work with improvements of its own methods, Scania will fill their requirements. The visual approach is a key element of Scania's philosophy of work processes and methods. This is a huge part of the daily record meetings, which are a vital part of Scania's business process (Söderholm, 2013; Rengfeldt, 2013; Müller, 2013).

4.1.2.1.5 Organizational hierarchy

Respondents assess there may be a problem with the hierarchy at Scania, which makes it harder to manage internal communications. They believe that managers must dare to let go of control over communication (Müller, 2013; Kazemi, 2013; Eriksson, 2013; Johansson, 2013; Söderholm, 2013). They think that they need to feel safe to start a dialogue and to find your own network in an online social network. There has to be a culture that makes it possible to grow networks (Tällberg & Callin, 2013; Müller, 2013). Users must also know that it is required to put time in this, from management and management must be aware that this contributes to the organization's efficiency by creating better products and services. Otherwise, it will not have the same impact across the organization, it is important that management are present and active on online social networks.

“For this particular area that you are talking about, social media, and how we flatten an organization and how we can get even more dynamic organization, to move away from this maybe traditional hard-driven Organization.”¹⁴

Organizations must become better at emphasizing problems and not concealing them, as it is often the case today. With a more open culture within the company, it will become rather difficult to conceal problems and then accept them into the organization's culture (Eriksson, 2013; Johansson, 2013). The respondents stated that organizations conceal problems because they are measured in deviations. This is perhaps somewhat strange in organizations who work with Lean Production since deviations are good for improving the efficiency of the organization.

4.2 IBM

Through an online social network, organizations and employees can reach a higher level of transparency. Edqvist asserts that it is an innovation just to make people aware of what you want and what you are doing. If online social networks are to be compared with the classic intranet, where information is press released, there is no way to give feedback on that kind of information (Edqvist, 2013).

At IBM they run their own version of Connections internally, where employees can post ideas of applications which can be tested and later in the process become a part of the product package if they are approved by internal standards.

4.2.1 Observed benefit

¹⁴ Michael Müller, Scania IT-Infrastructure, interview, 25-03-2013.

Edqvist claims that the main benefit with an online social network is to save time and to receive information that might not have been available otherwise. On-boarding of new employees is one factor that gains benefit from saving time in daily knowledge dissemination. It is easier to get to know people if they find each other useful in their daily work. The business benefit of a social tool is in gaining efficiency, which translates to time and money. Employees will be more effective thereby saving the company money. He stated that they also are more likely to be innovative. If a person has an idea, there is an avenue for that person to get the idea more visible and get instant feedback on it. Through innovation, they can get better solutions. It is quite valuable for the organization. Through this tool the flow of innovation increases and gets better. Edqvist can respond to their customers in a more competent way because he has a sense of security since he has a mass of employees behind him, who help him and support him with their knowledge in his decision making (Edqvist, 2013).

4.2.2 The integration for reaching that benefit

Edqvist says that the online social network must be business-related. The tool should not be an island, it must be in the business context. When IBM implements a new program they usually carry out business values first conducting workshops. They visit various businesses and look at how their business could do better using social tools and determine how they can improve. The purpose is so that employees continue to do their normal work, but in a way that it becomes transparent. Edqvist stated that online social networks need to be a *people* centric tool rather than a *content* centric tool. Another important aspect although not a goal, is to activate all employees on the online social network. It is not necessary to receive benefits out of an online social network (Edqvist, 2013).

Edqvist stated that it is important to take the community to the users and not vice versa. A large company may not settle for a product that is only an intranet with a little more CMS¹⁵. They want to emphasize applications, more like a portal and then it is incredibly important to integrate the intranet and the online social network. Edqvist said, "Organizations have to take the starting point with their intranet, the CMS portal, and feed the social functions into the intranet and eventually in a personalized manner to the extent that employees get the right information through this tool" (Edqvist, 2013).

Edqvist claims that It is extremely important that management support the online social network as an important product for their organization and for it to be well integrated into the organization. Management needs to emphasize online social networks as a tool to increase innovation and make employees feel comfortable in their workplace environment. Management cannot force people to be social, but there must be very clear support. Organizations must show where the benefits are greatest when using an online social network and look for places where there is information to be social about. What IBM does is search for *superusers*¹⁶ and why they are superusers (Edqvist, 2013).

¹⁵ Content Management System - is a software program which helps and allows editing, publishing and modifying content as well as maintenance from a central interface.

¹⁶ Superuser - is a user who is familiar or is experiencing no problems with becoming familiar with the software program that is presented. No major thresholds to start using the product for the given purpose. Superuser scope is partly to be a mentor to others, but also to enhance the activity of this particular product.

“We do this not to have a ‘facebook’ community at work, that is not the purpose. But we are doing this to increase innovation and want you to feel comfortable and that you will find experts and so on”¹⁷.

Superusers may have to spend a lot of time to help others, therefore, online social networks might be a way to relieve them. By putting the dialogue on the online social network, everybody can see and read the answers and relieve the superusers from doing redundant work. Organizations should not forget that there are many employees who like this as a method for them to advance in their career. There are many employees at IBM who have seen an opportunity to become involved and gain a reputation in the organization. Those individuals who are active, even though they do not contribute as much perhaps in terms of expertise, have a large network which they can use for gaining knowledge and thereby can become a superuser themselves (Edqvist, 2013).

4.3 SEB

One of the greatest needs SEB had to meet with the online social network was to be able to find staff and expertise more efficiently than before. Before the introduction of the online social networking functions, it was difficult to find staff with certain skills in an effective way. Today it is easier to keep their network updated and to expand as necessary. SEB updates their online social network every night with Human Resources information of staff and skills for it to be as accurate as possible. It is an effective tool to use. The challenge however, is and has been to maintain the quality of staff and skills data for it to be useful (Lindström, 2013).

4.3.1 Observed benefit

Blogs attract a lot of visitors and activity on SEBs online social network, popular disseminators create explosive increases in the number of visits and posts. Lindström stated that it is beneficial for employees to disseminate information to their colleagues by using blogs instead of emailing out information. By doing so information is stored in the blog and all employees can join in to discuss the topic and also to go back after some time and reflect on what has been done before (Lindström, 2013).

Lindström sees the availability of information on a blog as a potential catalyst for innovation. Since employees can bookmark and share the content with each other, instead of sending it around as e-mails, it becomes more available. Operations-related blogs and communities are according to Lindström seen as a strong business benefit of online social networking capabilities, where employees around the world can discuss business-related topics, share experiences/competence and together create new knowledge. This is something that is used frequently at SEB (Lindström, 2013).

4.3.2 The integration for reaching that benefit

SEB chose to silently launch IBM Connections because they think it is easier to convince employees about something's effectiveness by letting them study and individually identify the benefits with the system, which may be different depending on where you are in the company. SEB therefore never did any real launch of their online social network, but they let the system grow into the company. They did inform employees about the new search function by inviting them to information seminars to

¹⁷ Stefan Edqvist, IBM, interview, 2013-03-14

awaken an interest in the streamlined features being offered. IBM Connections is a service SEB uses that is partially integrated with the intranet but not nearly as much as they would like. This will be a challenge for SEB in the future as they look for opportunities to make the online social network more operational. Their intranet today is very outdated. It is 15 years old and was partially developed by themselves. SEB will in the future look at options to replace their intranet and also look for solutions to integrate it more tightly with their online social network, IBM Connections (Lindström, 2013).

Lindström sees an integration of the social network with their intranet as an opportunity to create online communities for workgroups and units where employees can share information and materials with each other a lot smoother than before. Lindström believes that an important business benefit with online social networks is the ability to shorten the introduction of new employees and by doing that they need their network to be integrated to their business. Lindström stated their current intranet can not develop much more and therefore their integration with IBM Connections is not as developed as they would like it to be. Most likely they will need to replace their existing intranet. Although IBM Connections provides good solutions to SEB for integration with Microsoft Office Suite and other common office software, however ERP¹⁸ becomes more difficult in the current situation. These are now dependent on self-made solutions for integrating with their online social network (Lindström, 2013).

4.4 Ericsson

Ericsson started to look at online social networking capabilities around the same time Facebook started to trend. Ericsson then had a structural problem with the fact that many employees were older and not that interested in online social networks. This made it difficult to get a user base, but they managed to find a few that could operate it. It all started when Rådlund who was responsible for operating the online social network at Ericsson and proposed the idea of an online social network in various forums in the company. He received support from management when they learned that employees were using external networks like Yammer (Rådlund, 2013).

4.4.1 Observed benefit

Ericsson is a large company with over 100,000 employees in 180 countries making their organization very widespread. They also have a very complex organization with different business units, different business models, different regions, etc. (Rådlund, 2013).

What Rådlund wanted to establish with Ericsson's online social network (MyNet) was a global conversation, which everyone could use for starting to connect with each other. He started getting together different tubes and silos where employees were working.

The premise was that if you have a global conversation, employees can be influenced by being exposed to the company's innovative ideas and creativity. It is a tool for the majority within the company where they can develop within the organization in a faster and simpler way. Rådlund discovered that it had been underestimated how an online

¹⁸ Enterprise Resource Planning - is business management software that allows an organization to use a system of integrated applications to manage the business.

social network can establish a platform for employees to be heard. Especially those employees who usually find themselves in the listening category by creating a communication channel where more employees can join the conversation, Rådlund mentioned that Ericsson has improved their flow of innovation in their organization (Rådlund, 2013).

There are many people who are very talented but that does not necessarily equate to having a high position in the company that allows you to make an impact with your thoughts and ideas. Rådlund states that this is a clear benefit they have seen with the launch of MyNet. They have seen that MyNet is a platform where talented people come together for sharing ideas, starting blogs etc. They have seen employees develop and acquire higher positions in the company because of their ideas through the online social network (Rådlund, 2013).

4.4.2 The integration for reaching that benefit

MyNet is not an integrated social tool to other platforms, as Rådlund wants it to be. Ericsson is very Microsoft-powered in the field and Sharepoint was installed from before. Rådlund did look at some open source alternatives. These would have been easier to integrate with the existing infrastructure because of the possibility to change open source software from the basic and adapt it to other software. For various reasons the other alternatives were not chosen and Rådlund stated it was a major reason for MyNet not being integrated with other platforms (Rådlund, 2013).

Ericsson created goals for interaction and engagement and recorded the results to try to meet the targets set for the integration of the online social network into its organization. The targets were set by day, week, month and year, to continuously monitor developments. They did eventually come up with the 1, 9, 90 theory to fit their goals and to be applicable on Ericsson. The theory consists of:

- 1% uploads content.
- 9% interacts with content.
- 90% is just there and take part of the content.

MyNet has approximately 4,000 active users per week where western, central and northern Europe are very active. The Mediterranean and India are also starting to be more active on MyNet however, the United States continues to utilize Yammer instead (Rådlund, 2013).

With this in mind, Rådlund stated the approach was wrong to buy an external solution for a company like Ericsson, where there is already much expertise in the field of software development. He affirmed that they could have found a better solution themselves. That is why they have started a new company in India that has been granted permission to build IT-solutions from the beginning. They built a system that absorbs keywords from many other external systems such as Twitter and Facebook with internal systems such as SAP¹⁹ and the internal informal system, MyNet. These systems will collect information about employees and their properties, which will be included in

¹⁹ In June 1972 Hopp et al. founded Systemanalyse und Programmentwicklung (System Analysis and Program Development), which later changed to Systeme, Anwendungen und Produkte in der Datenverarbeitung (Systems, Applications and Products in Data Processing).

their profile. This is at an experimental level right now, but it is a vision that is under development and something Rådlund asserts can help the integration of the online social network into the organization in the future (Rådlund, 2013).

4.5 Electrolux

Larsson wanted a more Facebook-like discussion area on the intranet for Electrolux. They performed a study on what social capabilities they were missing on their intranet site and submitted a specification for those needs. It was not conceived as a social intranet from the beginning but it was a domain where people could ask questions and receive quick answers. The management did not want a social intranet. It was mostly Larsson who wanted a "bottom-up hierarchical tool" where "regular employees" could be heard. He finally achieved what he desired and E-gate is today a social intranet (Larsson, 2013).

4.5.1 Observed benefit

The social dialogue consists of shifting informal characters. Big and small questions have their space on the E-gate which is the intranet of Electrolux with social capabilities. Larsson is adamant that they do not have any rules for how the dialogue should be displayed, but it is the company culture at Electrolux who sets the bar. Larsson has received strong indications from Electrolux employees that they want to try to keep it as business-related as possible since many feel that they do not really have time for a stream of unrelated information. Of the 20,000 employees there are about 15,000 to 16,000 users every month who log on to the intranet and see all types of social feeds (Larsson, 2013).

Larsson sees the direct benefit of a social intranet as a channel that can offer a more social environment, where the dialogue feels more informal and authentic and thereby inspires employees to be more creative. Electrolux does not refer to the social functions as social functions but as collaboration functions to validate functions as utility functions. Electrolux analyzed that according to research they have conducted, employees who have found their own advantage or personal value in E-gate have also found connections to business value. "Business value can differ depending on the range that it operates within, but the relationship between self-interest and business value is a crystal clear view," says Larsson. It is important to identify a self-interest with E-gate in order to take full advantage of its potential. Larsson states employees have been very creative when it comes to finding a self-interest in social E-gate and a large part of Electrolux employees state that it has helped them to keep up to date with news and new knowledge information. Electrolux was not aware they could improve their flow of news and knowledge in their organization before employees discovered it themselves, through their use of E-gate. Larsson stated that flaws are sometimes hard to identify until you discover something better and online social networks could be a shining example of a tool that could help organizations to identify flaws in their knowledge management (Larsson, 2013).

Larsson is sure E-gate has improved their knowledge management and developed the flow of innovation to be more efficient at Electrolux. He can not prove it though.

Larsson stated that it is not possible to calculate an ROI²⁰ on a social intranet they have attempted to do so. However, it is possible to show that an advantage exists. To evaluate the utility it needs to change the organization's way to do work and to allow it to operate in the new approach will take several years. Perhaps also, the benefit value will probably already be outdated. Instead, he asserted you have to believe in what you do. Larsson can see an advantage in introducing new employees to the organization and an opportunity to create a network faster. Larsson stated if you compare an employee who opts out of everything related to collaboration functions with one who is a collaborator, it will be very easy to measure and see the difference. By introducing new employees faster into the organization Larsson described it is a key component of expanding your social capital and thereby improving your flow of innovation in the organization (Larsson, 2013).

Larsson asserts that Electrolux has been good at spreading the formal information within the company, they have stopped mailing out formal information and transitioned to writing news articles on E-gate instead. "This has greatly relieved the inbox," says Larsson. When benchmarking the number of readers of news articles on the intranet before it became E-gate compared to E-gate, it indicates a more prolonged continuous stream of readers that peaks during cycles instead of an initial peak just after publishing, steadily declining for a week and then basically dying out. Larsson stated this is a result of the employees who see news information/knowledge as an interesting novelty and began to share, comment, like, and spread it so that it survives in the conversation at Electrolux for a very long time. This would not have been possible without the E-gate and it is a clockwork use case to prove a benefit of a social intranet in terms of making formal communication interesting, creative and innovative. Also, the comments regarding the formal information are a good case to keep informal information such as blogs that are linked to the formal information and make them live longer in the conversation at Electrolux and make the information/knowledge even more social, creative and innovative (Larsson, 2013).

4.5.2 The integration for reaching that benefit

Larsson admits that implementing online social networks takes time, Electrolux has been doing this for two years now and have not finished yet. Larsson asserts that it is important for managers to encourage their employees to be social so the individual feels a connection to business values, this can be in the form of encouraging blogs. It is important to be more transparent in the communication, use the social intranet more and e-mail client less. You risk to share material in a completely different way, then you open the online social network instead of enclosing the material in insulated channels such as e-mail (Larsson, 2013).

Electrolux uses three different platforms, it is EPiServer, IBM Connections and SharePoint. EPiServer handles the editor-rate portion of the Intranet, IBM Connections runs the social add-ons and SharePoint are running the shared workspaces. Electrolux does an abundance of multimedia on its intranet, there are a variety of colors, images, videos, etc. that make E-gate become more user friendly and nicer to use. Electrolux has not succeeded in any business close integration yet but it is on the agenda. They have managed to integrate Connections, EPiServer and Sharepoint with each other but the

²⁰ Return On Investment - a certain way to measure how well the investment pays off in the long run, the relation between investment cost and economical gain of investment.

activity near the system remains. They have many different business-related systems such as SAP. Travel systems operate their own department's budgets and needs which make it harder to get organized but it is a vision in which Larsson would like to succeed (Larsson, 2013).

Electrolux today runs Lotus Notes which will become fully integrated with Connections. However, Larsson has not managed the full integration to work for them. It is a shame when the e-mail client is a place where you usually spend a lot of time during a workday and an integration would make their social intranet more operational. E-gate however has a mobile app that runs on all major operating systems and offers the same functionality directly in the browser of their mobile phones. This is something that Larsson stated is important concerning their work and being close to business with their social tools. Bear in mind that Electrolux has not been able to integrate E-gate into ERPs, Larsson claims this is just as good, since all their employees are carrying mobile phones at all times (Larsson, 2013).

4.6 Summary of empirics

Based on our observation from the studies we conducted, we have acquired an overview of how our respondents at Scania understand their organization is operating and how it could be improved regarding communication and dissemination of information and knowledge. From the survey we conducted at Scania with over 200 respondents we do know that employees tend to use online social networks outside of work. Employees in general at Scania do use online social networks on a daily basis and they prefer using them as a channel for news updates and as a communication channel for staying in touch with friends. The survey further indicates that one third of the respondents find communication not to be sufficient inside of their own units for their work and that improvements can be made. Over half of the respondents thought that there were communication flaws between units.

During the interviews at Scania, the empirics demonstrate that there are thresholds that employees find disturbing regarding communication during their everyday work activities. Respondents at Scania see their lead-time for information is in some way lacking for employees to reach higher efficiency in their work. The respondents believe that if the communication channels can be improved at Scania it will somehow lead to a more efficient dissemination of knowledge. Regarding Scania's organizational culture, respondents do believe that they need to be more liberal in their management of communication and knowledge in order to gain a higher transparency through their organization. Scania does focus on knowledge before responsibility. They do say that knowledge does not come for free and that is why their on-boarding time for new employees is relatively long compared to other organizations.

During the interviews at SEB, Ericsson, IBM and Electrolux the studies have revealed a perspective from these organizations in terms of how the flow of innovation can be affected from an online social network and how it can be integrated into the rest of the organization. In fact, one of the denominators this study identified during the interviews is that an online social network has to be integrated close to business processes in order for it to succeed and reach its potential. Other benefits these organizations have identified are the reduction of on-boarding time for new employees as they get introduced faster to the new organization and its culture. There were also revelations

that the lead-time for information is shorter when using online social networks as a global conversation enabling a greater number of persons to participate in the dialogue.

During the case studies we were able to collect information from organizations already using online social networks. We also gathered information on Scania's organization from their employees which identified thresholds and problem areas in their daily work. Now, we shall take these observations into consideration with the tools of the theoretical framework in order to gain enough knowledge about the cases for making conclusions. This conversation is discussed in the following section.

5 Analysis

This section's objective is to analyze the empirical material in our conversations with the respondents to the theoretical framework. By doing so this study will collect and assess the knowledge gathered and derive conclusions that serve the purpose of the study and also answer the questions formulated by the problem section.

This analysis will focus on environments, innovation and integration of the online social network. By analyzing environments suitable for creating fertile grounds in which online social networks can prosper, this study attempts to locate those environments and find the common denominators within the organizations.

Further, the focus on innovation is adopted because it is an end product of knowledge and can thereby be seen as a potential benefit from online social networks. In the final analysis the integration of online social networks is necessary because it has to function in its own context.

5.1 Environments for online social networks

To analyze the technical maturity of an organization for a new technology we need to take into account the demographic distribution of the company. Since this case is about a technical system which is widespread outside of industry and used by society in general, the demographic spread is perhaps of less important character.

Scania is a technically strong company with many employees who possess advanced technical skills. This could easily lead to the conclusion that employee development is crucial for a new technical system, but the question remains whether this is the correct solution to problems faced by the company.

An online social network should maybe not depend on the users technical expertise or an interest in technical applications. In such cases, the product may have failed to fulfill its purpose. The aim is to create an online social environment by extending the conversation to an online forum.

5.1.1 The maturation of organizations for online social networks

In previous studies, the focus had been placed on what environments an online social network can create and not from what environments it can be created. This focus from previous studies makes it even more relevant for our study to focus on what environments are the most advantageous for online social networks. Since the goal of the online social network is to create a more social online environment in the organization it is then more important to measure the maturation of the company in terms of the organizational culture. In order to determine whether an organizational culture has the preferences required for employees to be confident in using an online social network at their workplace, it is easy to start by examining whether employees use online social networks in their private lives.

While conducting surveys at Scania we discovered that the majority of employees have derived benefits from online social networks. Also, by using an online social network fairly regularly, there are strong indications that an interest in being social online is high among the employees. The question is whether it is sufficient to say that there is a

culture at Scania in favor of online social networks. According to our research, it is not quite that easy. There must be a management culture in the company that creates an acceptance to share information freely and that managers throughout the organization are willing to relinquish control over the information they possess. Organizations with a hierarchical structure tends to have a solid hub for communication with the responsible managers, this often creates a bottleneck in communication and does not contribute to an organizational culture that is suitable for online social networks. In order for employees to feel comfortable using online social networks, they need to feel support from management.

5.1.2 Taking advantage of the social and intellectual capital

In order to justify the value of a tool that facilitates the creation of online social networks, it is important to be able to explain what online social networks can contribute in knowledge management within the organization.

In order to do this, Scania should begin to take stock of the social capital that the organization possesses. Scania does not need a deeper analysis to be able to say that there is a depth of technical expertise within the company since Scania holds a leading market position, carries a large amount of original research, and it operates with its own human capital in all processes that are required for its business. When an organization has a large social capital in terms of breadth and depth, it is time to look for opportunities to take advantage of these in the best and most efficient manner possible.

According to the theory of online social networks and social capital, it is advantageous to spread social capital through appropriate communication tools. Such a tool can be an online social network. Networks contribute to those necessary elements needed to take advantage of the resources available in the organization's social capital if used in the right context.

5.1.3 The importance of relations

Companies that are divided into different units within the company such as Scania tend to maintain stronger social relationships with those units than with other units outside the organization. This could be compared with the macro and micro-scale of social relationships. In Scania's case micro-relationships develop internally within the units and macro-relationships develop between those units.

The internal micro-relations at Scania tend to be strong as studies show that employees at Scania have stronger relationships with colleagues within their own unit. Granovetter mentioned and proposed this in his theory. The studies also show that employees at Scania experience some difficulties with staying in touch, or keeping an overview over the remaining business units unless it is a formal business-related contact.

This could be interpreted as tools for formal communication between devices do follow the required standard but the informal communication that are not business critical have fallen behind. This has proven to be a known phenomenon from case studies at Electrolux, SEB, Ericsson and IBM. These organizations have sought tools to improve their organizations global conversation when they have had a desire to utilize their social capital more effectively in the organization. To create a global conversation, it is fundamental to improve the relationships at the macro-level. This can reasonably be made only by utilizing the already strong micro-relations and by creating opportunities

for relationships between those strong networks. In other words, creating macro-relations with weak ties. These relationships will not be of the same strong character but they have a significant role in that they act as bridges, or weak ties, between already created networks.

5.1.4 The case of Scania

In Scania's case, this would mean that if they manage to find a tool that can provide new opportunities to maintain and create new macro-relationships between units within the organization they would be able to contribute and build bridges to expand the online social network within the organization. By creating the conditions for a more widespread and efficient online social network, they can also create an opportunity for a better climate for disseminating knowledge. The results would be a more efficient way to take advantage of other people's expertise within the organization without the benefit of meeting them.

Through studies conducted of the Human Resources functions at Scania, some frustration was detected when employees perceived the information and knowledge was there but it was difficult to distribute it, since they experienced too many bottlenecks with the current information channels. This could be of interest to relate with case studies at the other organizations which have demonstrated that by communicating with online social networks, they have effectively created forums where employees can sort through substantial information and knowledge and choose what is relevant to their work. Case studies have also shown that the features of online social networks contribute to important current information to be disseminated within the organization and that it is updated for a larger time period.

The effectiveness of online social networks at Scania depends to a large degree by the already established networks within Scania and the conditions prevalent to create an extension of these networks. We observed the current conditions which are to be the environment of the future online social network are at least as important when calculating the benefit as the environment created from it, since the online social network needs to develop fully for organizations to identify its full potential.

5.2 The potential benefits from an online social network

This section of the analysis aims to evaluate the potential benefits from an online social network out of the theoretical framework and the empirical findings from the case studies. Benefits in our case are often formed and expressed as innovation, the collaboration and use of information and knowledge.

Our case studies indicate that online social networks can or do contribute to innovation that is captured through various forums, groups, topics, chats, or other features made available on these online social tools. This platform makes it possible to disseminate information and knowledge in a new, more effective and open manner. It has increased innovations within the organizations such as improving work processes, activities and changes in applications. When implementing an online social networking tool within an organization, its success can be applied to different sources that can be crucial to advance towards an innovation. An organization that wants to be or to continue to be successful has to develop their current and future sources of innovation. In the analysis described below, the online social network is depicted as both an innovation and a

catalyst for innovation opportunities that can clarify the benefits or the default of benefits when setting up an online social network within an organization.

5.2.1 Knowledge management in collaboration with innovation

In previous studies it was possible to envision common conclusions about social networks contributing to the conversation within the organization. Researchers asserted how these social networks helped people connect with others they did not know or had the opportunity to interact with. Further, the previous studies stated that these new communication channels could help create a better flow of knowledge in the organization and that they could help people interact and create new contacts. These previous studies, as far as we determined ended their research at that point. What we intend to do in this part of the analysis is to continue their studies and try to connect the improved flow of knowledge in the organization to a more specific product, as new knowledge or innovation. To do this we are declaring that a significant factor to innovation processes is management, managing the human intellect and capital becomes a more crucial part in future organizations claims both Quintas et al. (1997) and our research.

Our case studies confirm that a more profound and guided road-map is needed to optimize business activities and processes. With the aid of these online social networking tools management can help to create and absorb the knowledge and innovation within an organization both on a micro- and macro level. This is done by creating e.g subjects, topics, groups and micro blogging, using the means of different functions that are embedded within the platform, which in turn will draw attention from other coworkers. When employees are searching for a certain competence or information, they can take notice of information and competence in a new and more effective way than before. They can find and absorb ideas and information that could contribute to a solution of their problem or question. These situations may be difficult to diagnose when observing the flow of communication from an external point of view, but as Larsson (2013) from Electrolux said, "You have to believe in that a network where people collaborate will bring something in return even if it is hard to measure." A social network often can motivate persons to share their ideas and knowledge in a more open forum. To create a more open dialogue, managers have to release the reigns of control and security in order to activate the dissemination process. A minor change in leadership patterns is therefore needed if the organization wants to implement a new communication tool such as an online social network. The results could lead to a more candid dialogue between co-workers and micro- and macro-level relationships.

An organizational vision gives the employees a purpose for their work at the company and will help boost the flow of creativity when guidelines are explained and they feel motivated. The guidelines can most likely be executed by the manager within the organization and by the means of an online social network. Our studies and previous research underlines the proposition that an online social network can, when established within the organization, empower the flow of innovation and communication and make the working environment and tasks more transparent to other co-workers when management is in favor of such a change in the organization and affirms that an online social network can have a positive impact. Case studies based on the collection of information received from users within the organizations affirm that an online social network can solve issues and facilitate communication between departments.

The organizational innovation and vision is in some aspects intended to motivate employees to perform better and increase the flow of creativity. Our studies indicate that employees can and are getting more confident through the use of different kinds of online social networking tools. This is in great part due to the opportunity that has been afforded them to help others in a more transparent manner.

5.2.2 The importance of efficient processes

Scania is a fairly process intensive organization that tries to refine and improve their processes on a regular basis. They want to lower their costs, eliminate waste and be more productive and efficient in reaching certain goals in different departments. Processes are time consuming activities. If you are able to reduce or eliminate a process especially one that is detrimental to the final product or task then it is of great value to the organization and to the employees.

Communication is an important continuous process that many organizations struggle with and sometimes even fail in the process. According to our studies an online social networking tool could enhance processes and activities within a corporation. More effective collaboration between departments could reduce the lead-time of information within the organization and accelerate certain decisions. However, this is in relation to the working environment and maturation of the culture within that part of the organization as well. To improve the communication process through this social utility the organization needs to enhance the social culture as suggested previously in the environment section decreasing the threshold towards such a change. Respondents during our interviews at Scania mentioned that the on-boarding time for new employees was quite extensive (between three to six years) and they thought that such a utility as the online social network could hasten that process. This could result in a wider network of coworkers, who have the skill and their own network of competent colleagues, and who are able to connect with them in a more effective way than before. These needs could be supported by Nonaka's theory of tacit and explicit knowledge. Tacit knowledge often leads or can be converted to explicit knowledge. In tacit knowledge people must create social relations, both within their department (on micro-level) and also outside their department (on a macro-level). Currently at Scania, employees use the intranet to find and locate persons with certain knowledge, skills or abilities and of course documentation. This is not always an easy task for a new employee. Through the use of an online social network which has the feature of serving as a catalogue this utility will simplify certain issues regarding search and finding competence.

5.2.3 From micro-level networks to macro-level networks

How people perceive things depends on the person and the point of view they have on certain matters. A change in perception does not alter facts. It changes their meaning, though and very quickly (Drucker, 1985). One reason that an online social network could help with "changes in perception" is that different parts of the organization collaborate and share experiences, information and ideas with each other in a completely different way than what they previously did. A more open and free way, making it more transparent and easier to create, and evolve these innovation opportunities. Through the case studies that were conducted during this period, evidence revealed that collaboration can be done in a more transparent manner by using an online social network and thereby changing the current way of thinking and working. Studies have shown that transparent communication across borders can aid the perception process within an organization by activating different kinds of perspectives from

different environments within the organization. It can be important with diverse opinions on certain matters. Using the tool as an open conference and meeting room can boost interaction within the organization.

Many employees at Scania do not know the facts about the benefits of an online social network - the self-interests and the business-interests. They do not know if it is somehow going to simplify their everyday work or if the online social network will overwhelm them with information which may affect them adversely. A clarification is needed to change their perception and meaning towards this phenomenon called online social networks if the organization is in search of and wants to develop and use a different way of communicating between departments. Management and work leaders are probably the most capable ones to approach the issue and attempt to change their perception.

5.2.4 New knowledge

New knowledge is the superstar of innovation, knowledge, new knowledge, scientific, non-scientific, technical or social knowledge. It is as Drucker (1985) states, “temperamental, capricious and hard to direct.” The meaning of that statement is knowledge in relation to innovation is erratic but certain after a period of time and the innovation will generate money. This source of innovation can most likely be improved through the dissemination of knowledge, because it is dependent on knowledge. Our studies along with other scholars’ empirical studies show that knowledge can be shared and reused with the help of an online social networking tool. However, the organization should not place more emphasis on reusing but more on the dissemination of knowledge, which may sound peculiar because they relate to each other. The online social networking tool is not supposed to be a content centric utility but more of a people centric utility. When online social networks disperse newly accumulated knowledge they are not able in the same way as a CMS to store knowledge in terms of documents and files. The online social networking tool can be seen as an ever changing bank of knowledge and information especially through the continuous updating news feed, new subjects and/or conversations. Every individual already possesses acquired knowledge and experiences that can be disseminated through this utility and this tool is there to simplify the process of the absorption of knowledge and information. The relation between reuse and new knowledge are in some way closely related. They work in a symbiotic relationship where reuse of knowledge can lead to new knowledge. This indicates that an online social networking tool may be best used as a *People Centric Platform*, rather than a *Content Centric Platform*. It also indicates that perspective and new knowledge are related. We therefore believe that an increased flow of knowledge in an organization through a social network can be connected to a more specific product such as a new knowledge or innovation. The flow of knowledge and information are dependable on the number of users and how active the users are within the online social network.

5.3 The integration of online social networks

By analyzing the fundamental social aspects of a social network that is the basis of how well a network can function within an organization, we can create a picture of how the online social network is to work for them. As previously mentioned, it is important to see the online social network in its context and formulate a view of the function of the online social network. The road to achieving this purpose may seem less clear but the

fact that the vision is there is important. Previous studies do not look at the integration of social networks into organizations. That is, as stated in the method section, because most of the previous research treats the subject of social networks in a more generalized fashion. Our focus of finding integrating aspects of social networks in organizations, are therefore appropriate as an addition of previous research and are becoming more concrete when we apply our findings on the organization of Scania.

5.3.1 Efficiency and the relation to business

During the studies we have conducted, there has been a clear common factor from all respondents that an online social network will help to create a forum where employees can share their experiences and knowledge in business-related areas of the organization. There was a common vision of creating an information highway in a less formal way that enabled them to communicate with each other in a more effective way than previously possible. To encourage such behavior, one first must determine the placement of competence in the organizational hierarchy, and the location of employees during their working hours. There is a common feeling among all respondents that if the online social network is to be effective, it must be available within the organization's core business and should be available wherever the employees are located.

5.3.2 Expanding the network and weak ties

According to Granovetter's theory of social relations, it is important to be able to create weak ties between already created strong relationships in order to extend the established networks. Within an organization such as Scania which has offices in varying different geographical locations and many different environments, the challenge is in finding a flexible solution that works in all these different areas. By creating solutions for the integration of nodes in the network in those different environments, the platform can connect all these strong networks and thus create an opportunity to expand the organization- wide network.

After completing interviews with external organizations, there are clear indications that it is precisely in this sense that these organizations have not succeeded yet. Their online social network has had a clear objective to integrate the central platform, the intranet, and in some cases their e-mail clients. It has been argued that in these platforms employees are moving almost daily, and it is in these environments that the online social network will find its most fertile ground. These organizations have however not yet found solutions to integrate the online social network into perhaps even more business close platforms such as ERPs. This is something that most external respondents admit is a weakness in their network and which includes prioritizing in future development. In Scania's case the situation is different because they are a manufacturing company with many employees who rarely use the intranet, and do not use an e-mail client at all. With such a large number of employees who are not connected to either intranet or e-mail clients on a daily basis, it is even more important to find integration opportunities that fit their environment. We are not suggesting they should not look for integrations into intranets and e-mail clients. However, extending that integration with something else is critical for organizations like Scania.

5.3.3 The tools of integration

One of the internal respondents claimed during an interview.

“...a better integration must be executed of the social networking tool for it to be more attractive and different than the other communication tools.”²¹

Comments from interviews with external organizations claimed they did not need any new operating system that was different. Instead, they used existing channels but unfolded new opportunities by integrating them to business-related processes and thereby extending the conversation of the same type of communication and naming it an online social network. As business-related social functions that bind the existing ERPs with the online social network is preferred by respondents at Scania, *integration* may be the key word in organizations to succeed in finding an advantage in social tools. But where the integration is to take place given the organizations' different environments may be easier than it appears.

5.3.4 The purpose of online social networks

All respondents during our interviews anticipated it would be easy to use an online social network and declared it should be something you do without thinking about doing it on purpose. They mentioned It should be fun, inspiring and accessible and above all it should allow everyone to be able to contribute to the global conversation in their organization.

Internal respondents claimed the mobile phone already performs all those functions regarding online social networks outside the business area and it is a proven platform for engaging people to be more social and create new relationships. The integration may not be completely business-oriented as some claim. It has to be business oriented in order to ensure employees are involved in a productive manner. Perhaps though, it should focus instead on being employee-oriented. Respondents in the field commented that there were many opportunities with online social networks as a tool for fast real-time communication and that it is a vital the tool when it is people-centric, accessible and mobile. Why not use an already existing mobile platform to build on? The mobile phone is one of them, it is already proven and almost everyone uses them daily. This platform may perhaps be mostly useful out in the field where Scania' business core lies. Online social networks' strength is in that it could remove the reporting type of communication during work hours and instead conduct a real-time dialogue between employees and managers. Online social networks can lessen social distances and by integrating sideways into business operations they may be enough to fulfill their purpose.

²¹ Michael Johansson, Scania - IT Administrator, Interview, 30-01-2013.

6 Conclusion

The findings in this study have achieved the goal of comparing an analysis of the theoretical and empirical material presented in this study. The conclusions satisfy the purpose of the study and answer the questions asked in the problem section.

6.1 Environments

- What environments are suited for embracing an online social network?

The maturation of online social networks in organizations should focus on factors that are not related to technical competence. An online social network's focus is on the social aspect given that this is the main function of an online social network. An online social network that has a steep learning curve due to technological expertise has lost its purpose.

An organization with a social capital that has found an advantage in using online social networks in their private lives has thus created a good foundation to build an online social network within the organization. This is because employees have already identified a benefit of using online social networks and thus can more easily relate this to an internal online social network within their organization.

In order to foster a good environment for online social networks, it is important that the organizational culture and its management allows employees to feel comfortable with free usage and that management feel comfortable in refraining from controlling communication.

6.2 Positive effects

- How can an online social network have a positive impact on an organization?

Online social networks can have a positive effect when searching for and creating knowledge, through the gathering of individuals from different types of professions and departments throughout the organizations on a more open and transparent platform. This makes it possible to keep a conversation on both a micro- and macro-level and to be able to receive different perspectives on certain issues, which in turn can provide a boost in the innovation process. By allowing individuals a better chance to combine social and collaborating opportunities through this online social network, they can find the right competence and the right individual to solve a particular problem.

According to both external and internal interviews a clear positive impact that an online social network could have on an organization is on-boarding or organizational socialization. The benefit is that the employees get a quicker introduction to the company and to respective co-workers that could be of aid in their work. This also widens the network of expertise and relations for the newly employed and makes it easier to find a certain skill and competence. That would be seen as a success for the organization, which in turn would indirectly lead to decreasing the costs and making the organization more efficient. You could also claim that this would give the newly

employed a more closely business related environment, which is needed if they want to work as efficiently as possible.

Another positive effect is reducing the lead-time of Information, questions and answers, making information more transparent to more employees and different departments. This translates across borders which many respondents say is an area that is in need of improvement and sometimes an essential part of their core business. Another is being able to disperse resources more effectively across departments and employees within the organization, both to save time and money. The online social network is the virtual coffee room in one way and a formal conference room in another way. By reducing lead-time of information, employees can focus on making use of that information instead of searching for it. This will obviously lead to a more efficient way of spending precious work time which will make the organization more efficient, this in turn increases the flow of innovation and thus indirectly the productivity.

6.3 Modelling the benefit

- How can a model be constructed that displays potential benefits of an online social network within an organization?

To construct a model that displays the benefit of an online social network within an organization it is vital to identify important factors that could play a part in both the implementation and operation of the online social network. It is important to look at factors that form the opportunities of implementing the online social network because without success in anchoring the online social network in the organization there is no need to look at possible value benefits.

As stated before the micro-level networks, the organization culture, the leadership acceptance and the possibilities for integration are a vital part of the maturation of the organization. The organization needs to be mature and open to a more transparent way of communicating to take full effect of an online social network. That is why this study has reached the conclusion of placing opportunity factors as a vital part when modeling the benefits of an online social network. Alongside the opportunity factors the values can also be measured. Value effects are factors that during the operation of the online social network can demonstrate some sort of effects that are to be interpreted as value effects and possibly identified as benefits. In this case this study has identified the value factors to be: on-boarding time, lead-time of information, need for new knowledge and informal communication as important factors of the model.

Following factors are representing each axis:

Opportunities (Y - axis):

Scores:

Micro-level networks

(0-1-2-3-4)

Are there already developed networks?

Organizational culture

(0-1-2-3-4)

Is the culture embracing social networks?

Leadership acceptance

(0-1-2-3-4)

Do managers want to control the communication?

Possibilities for integration

(0-1-2-3-4)

Are there platforms available for integration?

Values (X - axis):

Scores:

On-Boarding time

(0-1-2-3-4)

Are employees experiencing long on-boarding times?

Information lead-time

(0-1-2-3-4)

Is the lead-time for information high or low?

Need of new knowledge

(0-1-2-3-4)

Is there a great need for updated knowledge?

Informal communication

(0-1-2-3-4)

Are there already good opportunities in place for informal communication?

Factors can then be evaluated individually or through a mean value of the scores for each axis. Scores are then to be plotted into the graph. The graph consists of an X-axis and a Y-axis which represent opportunities and values. The graph is also divided into four blocks where each block represents one level. The different levels consist of either a high or a low score on opportunities and values. These blocks or levels are between 1 and 4, where level 1 represents an organization with low opportunities and low values and does have to improve on both factors to take full effect from an online social network. Level 4 represents an organization with high opportunities and high values and does possess high likeliness to get full effect from an online social network. Level 2 and level 3 represent organizations that have to work on either their values or opportunities to obtain full effect from an online social network.

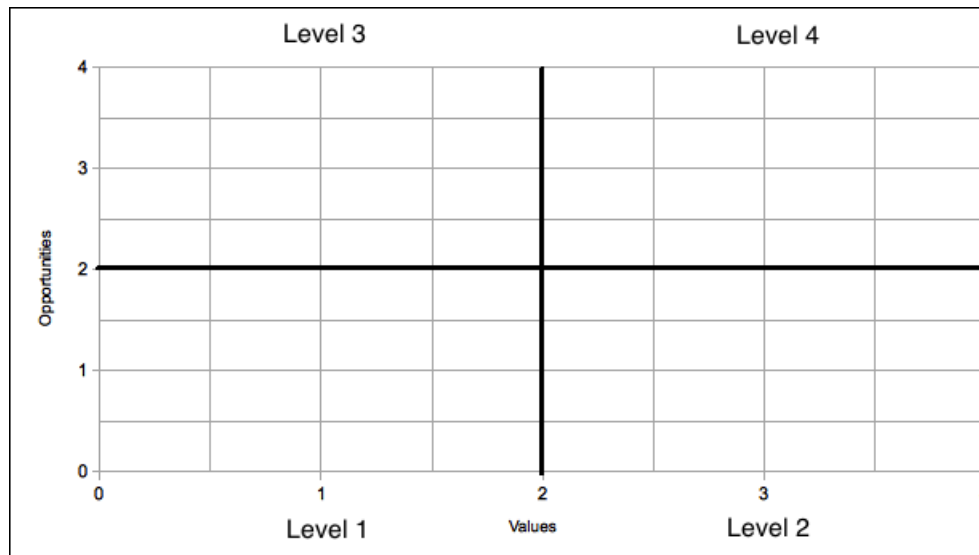


Figure 5: The Benefit Model.

Levels:

Level 1 (X - axis: 0 to 2, Y - axis: 0 to 2):

Low opportunities

Low values

Level 2 (X - axis: >2 to 4, Y - axis: 0 to 2):

Low opportunities

High values

Level 3 (X - axis: 0 to 2, Y - axis: >2 to 4):

High opportunities

Low values

Level 4 (X - axis: >2 to 4, Y - axis: >2 to 4):

High opportunities

High values

After plotting the values from the model in the graph it is possible to see a spread of results that the model has generated. These plots can then give an indication of how the organization is suited for implementing an online social network and how well benefits can be linked to the implementation.

7 Discussion

This chapter discusses the future development and use of an online social networking tool. A general criticism on the subject is made from results that emerged during the study. Moreover, this discussion section will generate suggestions for further study in areas that may be of interest to acquire a deeper insight regarding the “phenomenon” online social network and areas that are affiliated with it.

7.1 The relation to previous studies

This thesis has proven similarities to previous studies, but also includes additional relevant findings and differences.

Previous studies demonstrated that social capital and affiliations do not have a major impact on dissemination of knowledge. Our studies suggest otherwise, since the case studies show that creating social networks by expanding affiliations in terms of creating weak ties between already developed strong relations, organizations can create a stronger knowledge base which will become more accessible to users of the network.

Furthermore, the previous studies do not investigate the potential of creating more efficient channels for the flow of innovation whereas an online social network can do so. A probable cause for such may be that it is hard to detect and prove when creativity and innovation are being created through the means of an online social networking tool. During our investigation we have attempted to concentrate on that particular aspect, the flow of innovation. Regarding innovation, our studies have demonstrated and confirmed that an online social network will create and stimulate the flow of innovation, although there were only vague incidents.

7.2 Environments best suited for online social networks

It is fundamental for online social networks within large global organizations to utilize the already existing local micro-level networks and create interfaces between them to build a global macro network with global conversation. Is it also important to try to create a new conversation? Is it not instead more practical and perhaps cost efficient to use the current conversation and to extend it with new interfaces?

The effectiveness of online social networks exists in the prevailing culture within the existing micro-networks. Is the organizational culture dependent on the values of free speech and a strong philosophy in the sense that no individual or organization owns the communication or the information? Will we be unable to receive the same results by management and the organization when they decide that now we shall be social and whoever disagrees will suffer the consequences?

There are different views on how organizations can develop to create a global conversation and how they encourage employees to participate in it. It is most likely possible to achieve the same effect by different actions. The question remains which action suits which organization?

7.3 The impact of an online social network

When implementing an online social network into an organization the purpose is often to create a global conversation. To do that it is important that as many employees as possible are taking part in that conversation. But what about those that are not a part of it? Will they suffer from being left outside the new culture?

As external respondents claimed, it is not critical for the online social network to have everyone involved in it to be successful. However, if we are to measure the potential values from it in terms of on-boarding time and the lead-time of questions and answers, a vital factor is that employees participate in the online social network. If not, then it is not likely that they will gain the benefits from the positive effect. But then will the on-boarding time and lead-time questions and answers deteriorate or will they just remain the same?

In our conclusion of the analysis we stated that technical competence of the employees should not be an important factor when considering beneficial environments for online social networks. The question in this conclusion is whether that is correct or not, considering those who do not participate or are left behind. In the case of IBM, the majority of employees are highly competent in the IT area. So it is easy to conclude that IT competence is not an important factor because it will never be an issue for them and no one will be left behind. Therefore, organizations such as IBM do not take into account the effects resulting from those that may be left behind.

In the case of Scania, the majority of the employees are not IT professionals. Therefore, the risk of employees being left behind is vastly greater if the assumption of IT competence and online social networks is not correct. In Scania's case it may then be important to study the possible effects on employees at risk that are left behind?

External respondents stated that it is next to impossible to commit everyone in the organization to use the online social network. In fact, in most cases the majority is not using the online social network. Is it then not appropriate to analyze whether the organization will suffer from fragmentation?

7.4 Modelling the benefits of an online social network

The model presented in the conclusion of the analysis is of a simple character. Basically it is just a graph with two axis which relate to the opportunities for an online social network to develop inside an organization. The idea of this model is to put the value connection to the opportunities and when added together the result will demonstrate a potential benefit. For example, if the opportunities are low but the values are high, then the potential benefit will be somewhere in the middle.

The factors included in the model have emerged as important elements to determine if an online social network is suitable for an organization's different environments or if it is not suitable. Therefore, the chosen factors are there because we determined them to be important when considering online social networks in one way or another. When measuring the potential benefits from an online social network through this model, who is to conduct the evaluation? Is it the organization or the unit(s) inside the organization's task to evaluate themselves? In one way that may be wise, because they probably know themselves best as opposed to those that are external observers. Are they able to be

impartial to themselves? Is it not better to let several observers, including themselves, do the evaluation?

Further questions regarding evaluation of benefits must be asked if it be advantageous to even evaluate at all? What can the results contribute? Will we gain anything from knowing if this online social network tool will bring us any real benefits? The questions are many, but they need to be answered. Self-evaluations in terms of potential benefits from our activities are a vital part of our business strategies and they must be an ongoing process. This model can be a good start to begin thinking about what we really want to achieve with our online social networks. What are our visions? The model cannot permanently remain as it is now. It must develop in a constant and repetitive process and along with our organizations evolve to fit our future vision.

The limitations of this model are clear. It would be impossible to cover all types of organizations in every kind of situation and this model is not an exception. Our choice factors for this model are generic. Being more precise, we decided to split the generic model and scale the factors down to fit certain areas in the organization. Other limitations of this model were deciding the importance of the different factors. Some factors were more significant than others and the range of scores on the graph were adjusted to fit the responses.

7.5 Ethical aspects

When we think of private online social networks such as Facebook, there has been an ongoing debate about who owns the information being published. This is a debate that has to be taken under consideration when implementing an online social network within an organization. This could be viewed as a threshold for many users and why they are reluctant to participate in using an online social network. Is the content of the online social network going to be the property of the organization or will it belong to the organizations' employees? If the content is seen as the property of the organization are employees going to feel comfortable using the network or are they going to be restricted on what they can publish because it is not their property? It is also relevant to think of who is responsible for the content on the online social network. If the content is property of the organization they are also responsible for what is published on it so the organization is obliged to control what is published. If the content is controlled by the organizations' employees they may feel insecure using it. In addition, if the content is a property of the employees, who is to take responsibility for it? Also, employees may feel losing the power or right to access exclusive knowledge and information could lead to less content being published. This then diminishes the main goal of the online social network.

7.6 Further studies

In order to conduct further studies from this report, it is fitting to look for negative effects from an online social network. As mentioned above, the organization could suffer from fragmentation if the employees are split into two groups, one that uses the online social network and one that does not. Will the group that does not use the online social network fall behind?

Studies that complement this report deal with the extent the online social network should set its range. Is the online social network best if it is only letting employees

participate or should it be expanded to areas outside the organization for gaining larger amounts of social capital? It would be interesting to study the potential benefits of those employees collaborating with different organizations within the same business area or perhaps with organizations that are outside their business area, such as potential customers or even private online social networks such as Facebook.

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