The adaptation of CSR within the timber supply chain:
Attitudes, behaviour, and perceptions of practitioners

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Acknowledgements

I first would like to thank my family with all my heartfelt gratitude, for without their love and support none of this would be possible. With a special thanks to my overly supportive mother whose kind words aided me through the harder days, lastly to my late father for his wisdom he instilled in me, to never give up on your dreams no matter what the situation.

I would like to thank my supervisor Anders Roos from the Department of Forestry, Swedish University of Agricultural Sciences who displayed great confidence in me and my research throughout this process, your guidance was invaluable.

I would also like to give a warm thank you to all my friends both here in Sweden and back home in Ireland for their kind words and consideration, and for showing me that there is life outside my thesis.

Finally I would like to thank my loving fiancée, whose encouragement gave me the drive to follow my dreams, and whose patience and love sustain me through the last two years.

Abstract

It has been 40 years since the 1972 Stockholm conference and 20 years since Rio de Janeiro, Earth Summit in 1992. Since then the world of business has changed dramatically with the growth of NGOs environmental social movements, and globalisation has affected every industry in huge way. To cope with the ever changing demands on an organisation both from internal and external stakeholders companies have become more aware of their environment and their impact within it. To guarantee their products were up to standard, organisation started to reassure their consumers through certification schemes and developing internal values like code of conduct and CSR. These changes in strategies also had and are still having a huge effect on the timber industry especially now that globalisation has facilitated the growth of retailers' power within the supply chain. As companies engage further into CSR strategies it spread outside the borders of their organisation into their supply chain.

This research was intended to comprehend the individual managers' to better understand their attitude, knowledge and behaviour when it comes to SD and CSR aspects. Also to further determine if there is a unilateral adaption of sustainability practise along the timber supply chain and how it is being communicated. To study adaptation of sustainable business practices, specific emphasis on CSR and certification in the timber industry focusing on British hardware chain back to Swedish timber producers. A number of concepts and theory were applied to this research specifically sustainable development, corporate sustainability, corporate social responsibility, inter-organisation theory, social network theory, and theory of planned behaviour.

The research approach was qualitative interviews done face to face over the distance by telephone and email from representative organisation within the timber supply chain. The outcome of this research was that practitioners do have a positive attitude to CSR and SD and have shown a high level of knowledge around certification with in the chain. Furthermore, the participants also indicated a high willingness to continue working with CSR and certification more. However the research indicated that there was no unilateral adaption of sustainability practise or values along the timber supply chain as the each individual and their organisation addressed the problem in their own way. Furthermore the research did indicated that CSR is not following the supply chain directly but is being focused in specific areas by NGOS such

as FSC, which is creating a stimulating power dynamics within the chain that could be interesting research for further studies.

Abbreviations

U.N	United Nations
SBD	Sustainable Business Development
CSR	Corporate Social Responsibility
SSCM	Sustainable Supply Chain Management
FSC	Forest Stewardship Council
NGO	Non-Governmental Organisations
GFG	Global Forest Governance
ISO	International Standards Organisation
WCED	World Commission on Environment and Development
CS	Corporate Sustainability
SD	Sustainable Development
EU	European Union
UK	United Kingdom
TPB	Theory of planned behaviour
SNT	Social Network theory
WWF	World Wildlife Fund

Table of Contents

List of tables

List of figures

1 Introduction

The Rio de Janeiro, Earth Summit in 1992, brought together government, private, and non-governmental organisations (NGOs) under the banner of the UN (United Nations). The Earth Summit was set up to address the environmental impact humanity was having on the natural world. The summit was to address issues like right of indigenous people, water quality, deforest degradation to name but a few. One of the ambiguous outcomes from the Earth Summits was Agenda 21 which was to confront issues like sustainable business development (SBD), biodiversity, food security, climate change, and deforestation.

> *"The 1992 Earth Summit in Rio can be viewed as a pivotal point in the history of global forest policy, when world attention was drawn beyond tropical forests to include forests in the Northern Hemisphere"*(Levin, et al. 2008, p.541).

Hence to confront these issues NGOs like the Forest Stewardship Council (FSC) certification was developed to manage and reduce emission from deforestation and degradation worldwide. The FSC is an independent NGO established to encourage responsible management of the world's forests. Now twenty years on since the first conference, the Rio de Janeiro, Earth Summit is back. "Rio plus twenty", is to be combating some of the same issues than the previous conference. However, the situation is different now; organisations' and their managers in forest industries have been working with environmental and social aspects, one of the major tools used at present is corporate social responsibility (CSR) for about two decades in its current form. This is seen as a major tool in developing sustainable business practices. According to Carroll, (1979 p500; 1991 p283) CSR *"Encompasses the economic, legal and ethical expectations that society has of organizations"*.

1.1 Problem background

The fundamentals of business have changed. Companies are expected not just to do business but also to contribute to the society in which they operate and communities in which their products or services originate from (Porter, & Kramer 2002). This responsibility comes in many names; corporate citizenship (CC), sustainable development (SD), sustainable entrepreneurship (SE), corporate sustainability (CS), the triple bottom line, (TBL) and corporate social responsibility (Marrewijk, 2003; Andersen, 2009). Indeed one of the main sections of the Rio Earth summit plus twenty is focusing on forestry within a green economy,

due to its far reaching effects on society for both forest- and none forest dwellers, and has prompted the growth of Global Forest Governance (GFG) (Hoogeveen, & Verkooijen, 2011). From an organisational perspective, it has caused organisations to look at their impact on society and the environment some have even investigated the impact of their suppliers and their supply chain management. This shift has altered the strategies of most organisations, moving their focus away from competition between individual firms to competitiveness of supply chains (Andersen 2009). Furthermore, this has reassured the importance of the supply chain in the business world and the direction of organisation is to solidify its approach to sustainable issue with its chain (Harrie & Bommel 2010).

When an organisation wishes to address the issue of CSR they may choose from three options such as resign strategy, defensive strategy, and proactive strategy (Andersen 2009). A resign strategy is where a company simply does not have the resources to address CSR issues, while defensive strategy is where a company has the resources but only acts to defend its reputation or position in the market. Lastly, proactive strategy is where an organisation sees a need to address CSR issue and does so under its own initiative. The latter two strategies can have similarities and a company can conduct both proactive and defensive strategies at the same time on different product lines. A major similarity of both strategies is the reliance on auditing either by direct checking or by a third party. Third party certifications like ISO14001, AS8000 and FSC have been the most preferred courses of action of organisation as these standard auditing systems are general enough for most industries and help prevent opportunistic behaviour by suppliers (Haan, et al. 2003; Ciliberti, et al. 2009).

1.2 Problem

"For most companies, the question is not whether to communicate but rather what to say, to whom, and how often" (Kotler, 2003, p. 563).

While the current system of global governance of the timber industry has created internal redundancies and intrinsic inefficiencies that are exacerbate the impeding efforts to develop sustainable businesses practises world worldwide (Najam, Papa, & Taiyab, 2006).

"A lack of coherence in state approaches in the international arena adds to the failure of the current GFG. This also accounts for the lack of real involvement from the private

sector, civil society, and nongovernmental organizations in the negotiation and decision-making processes" (Hoogeveen, & Verkooijen, 2011 p503).

This situation is exacerbated by the scuffling of international organisations that wishes to supervise the governance of GFG (ibid). Although the state once occupy the dominant role in global governance, the emergence of other stakeholders to the world stage has amplified the inter-locking, and the complexity of the communication *"other actors, including international organizations, private sector, civil society organizations, and consumers, have also become significant actors in designing and implementing the system of GFG"* (Hoogeveen, & Verkooijen, 2011 p 503).

Progressively companies' environmental certification on timber products has increased as companies rely on certification generally as a risk avoidance strategy to avoid loss of reputation, sales, or market position. Although it was shown that a substantial section of ISO 14001 certification had not been granted to highest environmental accomplished organisations (Sarkis, et al. 2011). Negative consequents of this action are that an organization could use this information to portray an image of social responsibility to attract more buyers, a form of "green washing". Additionally, Klooster (2010) illustrated with the growth of neoliberalism and globalisation there is a potential for misunderstanding and abuse of certification as value chains becomes more global. Stereotypically, a supplier might choose not to disclose all the environmental information about a product or its performance, instead leaving it up to the client to experience it. Suppliers will accumulate a great amount of information about their products; due to the fact that they have more transition interaction, this creates a wealth of knowledge that can create an imbalance of information along the supply chain.

Information asymmetry within the value chain can be narrowed with greater interaction between parties (Simpson, 2010) and (Carter, 2002; Jennings, 2004). However, information asymmetry might not decrease when it comes to specific assets (Delmas, &Montiel, 2009). The motivation for this is that suppliers or buyers, depending on their power within the chain, wish to have better control over their transaction. This situation is hyped when products are specialised either by location, production, or specific knowledge (ibid.). Hence, if an organisation is primarily based around one product such as timber it would be logical to assume that timber producers would accumulate specialised information and use this knowledge to its advantage. However as society is placing demands on organisations for more

ethical behaviour and with the growth of sustainable business practises, coupled with external pressures from other stakeholders, a conflict of interest arise for managers and their organisations as a whole. Are these paradigms strong enough to create change in managers' knowledge, attitudes, and behaviours? This has importance because the interaction of individuals and their perspectives shape the direction and decision of organisations (Sarkis, et al. 2011). Hence it would be crucial to see how managers' adaptation and attitudes in a timber supply chain has developed over the last two decades and to create a better understand of where it is today. Indeed this information should lead to better understanding of how managers' timber supply chain interact when addressing CSR aspects.

> *"The lack of descriptive studies on the importance and role of the business case for sustainability (BCS) in companies was identified as the greatest gap in the existing literature"* (Salzmann, et al. 2005 p33).

1.3 Aim and delimitations

The aim of this thesis is to study the adaptation of sustainable business practices, specifically emphasising CSR and certification. To assist with the facilitation of this research the focus will be on a timber producer and retailer from Sweden and the UK respectfully. The intention is to probe a timber value chain, by looking at perspectives, focusing on knowledge, attitudes, and behaviour within an organisation trying to determine the awareness of CSR within a timber chain. Additionally, the paper will try to investigate if there a universal adaptation of CSR along the supply chain.

- How do managers in the timber supply chain perceive sustainable business development having affected the attitudes and behaviours within the forestry industry?

Related to the first question

- To explore if there is a unilateral adaptation of sustainable business practise along the timber supply chain how it is being communicated?

Delimitations

Empirical delimitations: Although no specific organisations supply chain was focused on within this study, the study does emphasis the timber supply chain in general with a further emphasis on UK hardware retailer, back till Swedish sawmills. The study focuses on only a few individuals within the timber industry. Although these individuals are not working with in the same specific supply chain they do represent the actors that are engaged with the supply chain on a daily bases at different stage with the supply chain. Due to limitation in time and in resources this study has not explored any specific behaviour of practitioners, but will rather investigate the general perception. Additionally, as the general layout of the supply chain that was fallowed from the UK back to Sweden raises an issue of culture as both countries do not share the same culture. Although this is an important issue it will not be addressed in this study due to constraints on the research.

Methodology delimitations: The focus of this study is on managers' perspective on CSR, a case study approach will be utilised. The cases will emphasise on three main organisations within a supply chain today the retailer, NGO, and the producer. The author is aware that the number of participants from each organisation is limited and due to this factor the findings could not represent a general impression of population at large. However this still should not affect the quality of the research as

Theoretical delimitations: The theoretical limitations were due to the scope of the thesis, and were formulated to best fulfil the purpose of this study. Moreover an emphasis on sustainable development and related theories was taken. There was on a general view taken when it came to most theories as it would help identify a holistic view of the supply chain.

1.4 Outline

> *"Research is a systematic process of collecting, analyzing and interpreting information in order to increase our understanding of the phenomenon about which we are interested or concerned"* (Leedy and Ormrod, 2005, p. 2).

In section one an introduction and delimitation and error as well as definitions of terms used in the paper are presented. Chapter two will be an in-depth literature review within the field of sustainable business, especially focusing on managers' in the timber industry. When it comes

to interaction within the value chain a theoretic framework will be illustrated and used for analysis purposes. Chapter three will illustrate the method that will be taken during the course of the paper. In chapter four the empirical findings will be shown. In chapter five the analysis and discussion will take place. Lastly, in chapter six there will be a conclusion and suggestions for the future research.
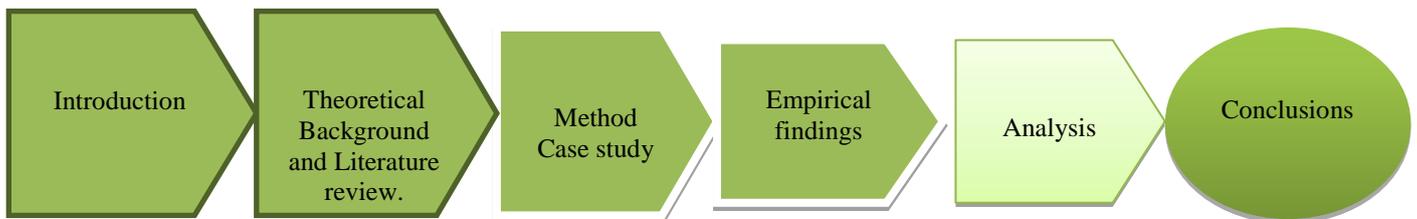
Figure 1: Illustration of the outline of the study,

1.5 Definitions of terms

In this segment there will be an illustration of the terms and definition that will be relied upon throughout this paper. Furthermore this will be done to establish a distinction, to bring into contexts the meaning of these terms.

Attitude; "*A psychological tendency that is expressed by evaluating a particular behaviour with some degree of favour or disfavour*" (Eagly and Chaiken,1993, p1)

Behaviour; "*An action that is carried out at a specified time and is described in terms of the action itself, its target and the context*" (Francis, et al p32)

Sustainable Development:

"*Development that meets the needs of the present without compromising the ability of future generations to meet their own needs.*" (The Brundtland Commission, 1987)

Sustainable supply chain management:

"*The management of material, information and capital flows as well as cooperation among companies along the supply chain while taking goals from all three dimensions of sustainable development, i.e., economic, environmental, and social, into account which are derived from customers and stakeholders requirements*" (Seuring and Muller 2008, p1700).

2 Theoretical perspective and literature review

In this chapter there will be a comprehensive literature review focusing on sustainable business practises. This thesis will focus on the adaptation of sustainable development, within the timber added value chain. With the dynamitic changes that are business facing daily basis there is a need to understand where we are when it comes to sustainability with the supply chain. Therefore an overview of corporate sustainability and corporate social responsibility is needed, particularly centred on sustainable supply chain management. The eventual goal is to illustrate the structure and cultural atmosphere that managers interact in.

2.1 Layout

This section starts with the concept sustainable development, as it is seen as the broader goal of the businesses and society. SD in a business context has been focused on resources and their usage with the goal to improve efficiency and waste reduction. Then there will be a focus on corporate sustainability (CS), and CSR as it is seen today. This is needed to illustrate the development of CSR in business and its importance to sustainable supply chain management. As expressed above the importance of the supply chain management to business has grown with the growth of globalisation (Andersen 2009). As the growth of globalisation has changed the face of business there has been a major interest in this area both for the business and academic world. Even civil society is weighing in on this issue as NGOs continue to hold companies accountable for their supply chains. This accountability has led to improved relationship between actors along the supply chain and has brought about a better cooperation. This is why there is a need to investigate the literature around this interaction. One such theory is inter-organisation theory which deals with the connection between organisations along the value chain (Jørgensen et al 2012).

However it does not just focus on improving the efficiency of the chain but also on environment, social, and communication with the chain. As inter- organisation focus on the connection of organisations there is a need to look at the micro level the individuals that help form the cogs in the wheels, because if the ideals of sustainable development is not adopted by managers then they are doomed to fail, (Li and Toppinen, 2011). Therefore this is why the theory of planned behaviour (TPB) was chosen to help shade some light on practitioners', understanding, and attitude behaviour and knowledge of sustainability. TPB theory is

frequently used to help predicted consumers behaviour towards environmental issues and it is felt that this can be transference from consumers to manager would not be a hard one. The figure 2 will help show the layout of the literature review. This model show the a graph depiction of the theoretical and literature review illustrating the societal goals of SD down till the theory of planned behaviour as a way to assess the individual managers perception within the timber supply chain.

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Sustainable Development

Corporate Sustainability

Corporate Social Responsibility

Sustainable Supply Chain Management

Inter-Ogranisation Theory

Theory of Planned Behaviour
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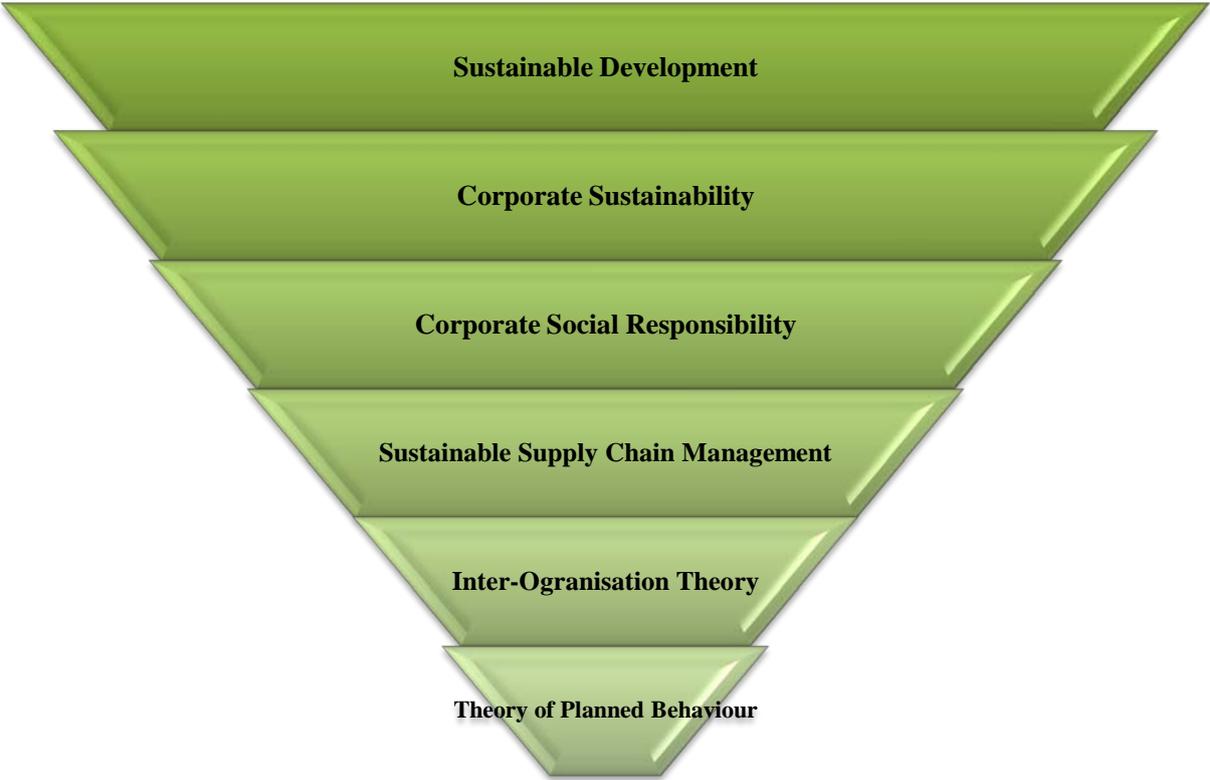
Figure 2 Layout

2.2 Sustainable development (SD)

In its most general form SD intention is to maintain a capacity over a period of time, which in itself is very close to the definition of sustainability (Sikdar 2003). In the business world context this means to maintain the current business environment without harming the ability for futures business. The UN defines SD as "*it is development that meets the needs of present without compromising the ability of future generations to meet their own needs*" (World Commission on Environment and Development), which is one of the most used within literature today. However there is still not a major consensus on SD as it is a far reaching concept (Walker & Jones 2012). The aim for businesses today is to balance the three main factors that are generally accepted as key criteria; social, economic and environmental

development (Wilson 2003: Rainey 2010). As companies increasingly shift away from solely economic goals, a focus purely on the bottom line does not make sense in todays this business environment. This has brought about a conceptual shift towards triple bottom line (TBL) (Elkington 1998). TBL paradigm encompasses all three targets social economic and environmental, a specific strategy that brings bearing to organisations focused on society and the environment issues (Sikdar 2003). Ghiami, & Sorkina, (2009) identify that when an organisation focus on those three factors and values are a sustainable organisation. It is important to epitomize that it's not just about "*improving efficiency, but should also include behavioural changes that entail empowerment of all societal actors*" (UNDESA & UNEP 2008). Table 1 illustrates but a few studies that have been conducted within the research field sustainable development and sustainable supply chain management.

Table 1 Articles on Sustainable Development

Area of study	Author name	Date of study
Corporate citizenship	Marsden & Andriof;	1998,
Corporate Sustainability	Marrewijk; Pogutz	2003,2008,
CSR	Carroll; Salzmann, et al. Jones et al; EC.	1999, 2005, 2007, 2009B
CSR in supply chains	Carter & Jennings; Maloni & Brown	2002B, 2006
Triple Bottom Line	Elkington;	1998
Business Ethics	Kilcullen & Kooistra;	1999
Sustainable Supply Network Management	Young & Kielkiewicz-Young	2001
Supply Chain Sustainability	Dyllick & Hockerts; Koplin, et al.; Ghiami, & Sorkina	2002, 2007, 2009
Environmental Management	Handfield, et al.	2005
Supply Chain Environmental Management	Lippman	1999
green purchasing strategies	Min & Galle	2001
Purchasing Social Responsibility	Carter & Jennings	2004
Logistics Social Responsibility	Murphy & Poist, Carter & Jennings	2002, 2004
Reverse Logistics	Hanafi, et al.	2008
Sustainable Supply chain management	Redkop	2011
Eco efficiency	Muyingo	2011

From this table above, it can be seen that there seem to be a large amount of focus on and around sustainability within the supply chain and also management literature. This is why it

will be considered in the following sections. It also shows the broad range of different topics within the theme of SD.

2.3 Corporate Sustainability (CS)

Pogutz (2008) relates CS to the long term competitive advantage of the firm as having the "ability of a firm to create value and continue operating in the long term". Hart and Milstein (2003) pointed out the development of a sustainable value for corporations and ways of integrating it into a business strategy. Hart and Milstein (2003,p58) also stated that there are a larger percentage of managers that still did see sustainability as "a one dimensional nuisance" failing to see the potential opportunities sustainability might bring. The Dow Jones sustainability Index, (2009) presented that the need for companies to adapt sustainability into the strategic preparation of organisation is an essential for the firm, rather than considering it as responsibility to society. Indeed they argue that it is a must for creation of long term shareholders value and risk avoidance strategy. Marrewijk (2003) proposed five interpretations of CS and the levels of motivation in which a corporation might be sustainable.

- **Compliance driven** CS: At this is point companies are focused on limiting its responsibility to society by only adhering to the legislation. However the company motivation to engage in some CS action is done out of a duty or obligation.

- **Profit driven** CS: Organisations at this level are focused on the bottom line and see CS as a way to integrate ethical, environmental, and social concerns, as long as it generates a profit for the corporation. The incentive is enhanced status in various markets.

- **Caring** CS: Organisations at this level try to balance economic, social, and environmental concerns. The incentive for CS is better care for the planet, humans, and social responsibility, which are important to the organisation.

- **Synergistic** CS: On this level companies are focused on striving to achieve win-win scenario where integrating CS into the corporate strategy to create value for both the business and society, and the environment as a whole.

- **Holistic** CS: is the entirely incorporated and implanted into every aspect of the corporation. The motivation is that all living organisms are the same so leaving

sustainability the only option, giving each organisation and individual responsibility to one another.

Thus these classifications can be useful as the concept of CS is abstract at times. However with the levels of ambition for CS this can provide a pathway for corporations wishing to integrate sustainability into business practices (Marrewijk 2003).

Another concept that relates very strongly to CS is Corporate Social Responsibility. Although the development of both concepts was independent from one another there are some authors that claim they are one in the same. Keijzer (2002) suggested that they are "two sides of the same coin" even though CSR is more centred on social segment. However there are some authors who believe the contrary, perceiving CS as a holistic concept where other concepts and approaches are evaluated (Panapanaan et al 2003; Wempe, Kaptein 2002). Furthermore Marrewijk (2003) recommends keeping a distinction between CS and CSR while the former is based around value creation and management, and production systems. The latter having a connection with communicational aspects of individuals and corporations, and focuses on issues like transparency, and dialogue. In figure 3 interruption of corporate sustainable, as an over view concept in which CSR is seen as a tool for organisations (Panapanaan et al. 2002).
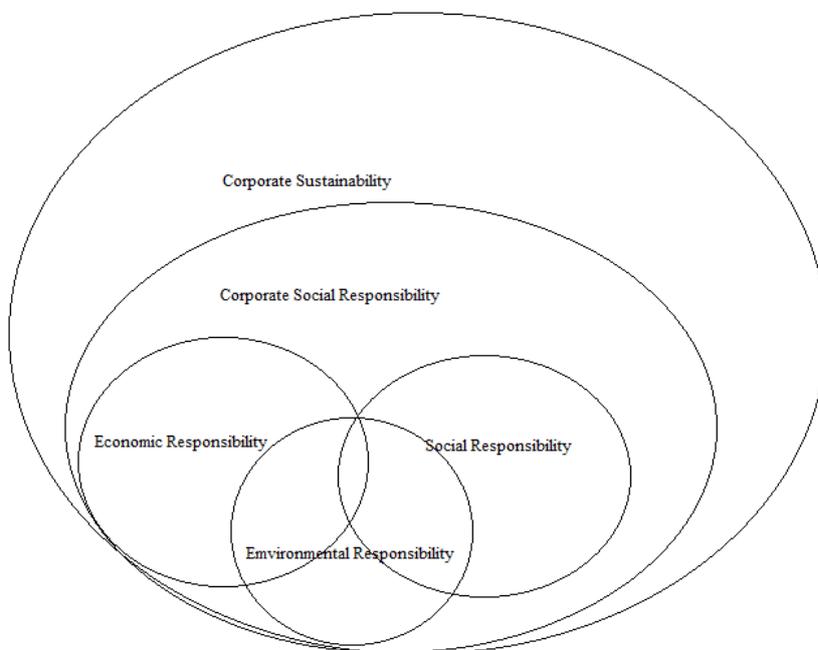

Figure 3: View on Corporate Sustainability, source: Adapted from (Panapanaan et al. 2002)

2.4 Corporate Social Responsibility (CSR)

CSR has been around in some form or another for a number of years. Carroll (1999) point out that the CSR foundation started in the 1930s with social responsibility. However this initial concept targeted business individuals rather than organisations in general. Bowen's (1953) book Social Responsibility of the Businessman, illustrates the responsibilities of a businessman and appropriate values and decisions that should be made for society. Bowen's book has been regarded as one of the founding literature for CSR, which has continued to develop over the decades. It must be noted that not all researchers agree with the standard ideology of CSR. Friedman (1970) offered the view that the only "responsibility of a firm is to increase its profits". This concept coincides with the theory of the firm (Spulber 2009) which helped managers define the borders of the corporation. Friedmans (1970) perception was that when managers engaged in social responsibility there could be a tendency to neglect their corporations and its goals.

However despite the criticism of CSR there are a number of authors meaning that CSR can be both beneficial to business and society a like (Porter M, & Kramer M 2002: Elkington 1994). In the evaluation of the CSR performance model, Wartick and Coghram (1985), focused on the management of societal dimensions like social responsiveness, public, and economic responsibility. The conclusion they reached was that CSR model was valuable to both business and society.

There are a numerous definitions of CSR and Dashlsrud (2006) identified 37 different sources of corporate social responsibility. Van Marrewijk and Werre (2003) present that an organisation should choose the definition that best fit their needs and abilities. In addition, Garriga and Mele (2004) characterised CSR into four clusters that focused on the interaction of business in society; economics, politics, social integration and ethics. Garriga and Mele (2004) take their inspiration from Parsons (1961) that these four groups can be observed in any social system based on adaptation to the environment, goal attainment, social integration or latency. Table 2 summarises some outlined approaches and provides a short clarification and important reading in the area of CSR.

Table 2 Theories on Corporate Social Responsibility, source: Adapted from Garriga and Melé (2004).

Types of theory	Approach	short description	Key readings and authors
Instrumental theories	Maximisation of shareholders value, and competitive advantages strategies	(Focusing on achieving economic objects through social activates) Long term value maximisation	Friedman (1970), Jensen(2000)
Political theories	Corporate citizenship corporate constitutionalism	(focusing on a responsible use of business power in the political arena) Social responsibilities of the business arise form the amount of social power that they have	Prahalad (2003) Hart & Chistensen (2002) Prahalad & Hammond (2002)
Integrative theories	Issues management, Public responsibility, Stakeholder management	(focusing on the integration of social demands) Corporate processes of response to those social and political issues which may impact significantly upon it Balances the interests of the stakeholders of the firm	Matten & Crane (2005) Carroll (1979),
Ethical theories	Stakeholder normative theory, Universal rights, Sustainable development	(focusing on the right thing to achieve a good society), Frameworks based on human rights, labour rights and respect for the environment	The Global Sullivan Principles (1999), UN Global Compact (1999) Mele (2002) Phillips et al. (2003)

The ambiguity of CSR can be both its strength and its failing with the ability to be conform to almost any organisations culture and systems. However as pointed out above there are many ways and drivers behind the enticing offer of CSR to create a more harmonious organisation which can confuse and panic most participators of Business. Due to this ambiguity there is a need to provide one definition of CSR. Elkington (1994) first coined the term triple bottom. His focus was on ethical behaviour in business which he categorized into economic, social and environmental considerations. Although businesses have been operating in these categories before, Elkington suggested with the help of stakeholder theory to integrate these three together instead of concentrating on them individually.

Figure 4 triple bottom line. Source: Adapted from Elkington (1998).

There are a number of definitions of CSR that are in line with Elkington's theory (McWilliams and Siegel 2001: Baker 2005; www,csr.gov.uk). They have all defined CSR as voluntary actions that area taken by an organisation that surpasses the legal obligations.

> *"a concept whereby companies integrate social and environmental concerns in their daily business operation and in their interaction with their Stakeholders on a voluntary basis"*(EC, 2001 p11)

Thus, the triple bottom line provides organisation with the focus and drive to fulfil the goals of corporate sustainability and ultimately sustainable development. Organisation must utilise all of its resources to achieve this goal, this includes current suppliers and future ones, both in their supply chain and in the industry as a whole. The timber industry is no exception there is even imperative need to due to is as its closer interaction with the natural world and local communities.

2.4.1 CSR within the timber industry

Klooster (2005) indicates that one dominant instrument forest companies are focusing on, when it comes to in CSR is forest certification. This is due to the fact that with the growth of external pressure on forest companies by the larger firms that dominate the purchasing of timber have clearly stated their support of certification. Forest companies that deal with paper, timber, and other wooden based products try to address these pressures by committing their

organisation with a variety of certification schemes. UK companies like B&Q and local governments and other organisations host public forums to advise on FSC and to promote its values. Matlainn (2012) wrote that in today's world CSR is an important instrument that creates a better level of trust, reputation, and attractiveness among stakeholders for an organisation. However, despite this premiums for certified timber in Europe is almost non-existent (UNECE/FAO, 2011).

There are three barriers to CSR certified timber based goods namely: supply barriers, demand barriers, and organisational barriers (Werndle et al 2006). According to Werndle et al. the barrier for supply chain stem from a lack of price premium to insufficient amounts of certified timber. Furthermore, complexities are inherent in today's global supply chain. The absence of good information and knowledge by the end user and a little or low demand for certified timber, coupled with the price sensitivity of consumers creates barriers in demand. The organisation barriers show limitations of companies that have commitment to CSR strategy, combining this with the insufficient staff skills, inadequate management system. Organisational barrier have slightly more importance due to the fact that the largest consumers are industry based and can affect the supply chain greatly (ibid.). The importance and challenges of certification will be addressed in the next section along with SSCM.

2.5 Sustainable Supply Chain Management

"*A set of three or more entities (organisation or individuals) directly involved in the upstream and downstream flow of products, services, finance, and/or information from a source to a customer*" (Mentzer, et al. 2001 p4).

To understand the concept sustainable supply chain management there is a need to first understand where it has developed from. As mentioned in chapter one and throughout this paper, companies have become more aware of the importance of their supply chain. Moreover, when producers have access to the market and to the end-user there can be multiple effects on the organisation being both positive and negative (Ghiami & Sorkina 2009). So when a producers' work closer with retailers it does not just make a supply chain, it also creates an information flow that makes available greater insight to consumer trends and fluctuations within the market. Furthermore, there are key examples where companies have generated their success predominantly on their SCM, e.g. IKEA, and Wal-Mart have accomplished this through efficient and effectiveness (ibid.).

As organisations create a greater interdependency in the supply chain there has been numerous examples where the supply chain and its management went wrong. This was exacerbated with the growth of globalisation and brought problems like agency problems, lower control of supply chain, and a possible effect on reputation, but to name a few. This can generate an adversary climate where there is low communication and a weak information flow.

An important factor of supply chain management has to be the concept of value chains which exist also in both SCM and SSCM. Porter (1985) first brought the concept of value with competitive advantage he defines values as "the amount buyers are willing to pay for what a firm provides" (Feller, et al.2006 p1). In the contexts of a value chain, Porter also gives us a definition "the combination of nine generic values added activities operating within a firm" (ibid.p1). Moreover in the present period the interaction of organisation occurs in greater numbers, with outsourcing and collaboration between corporations "Value creating processes has more commonly become called the value chain" (Feller, et al. 2006 p1). Indeed this implies the primary focus in the value chain is to benefit the firms that are along the chain, as each chain is different. This can mean that the value created for one chain may not be the same as another. Figure 5 shows and compares the value chains within a supply chains. The value shows information flowing directly back up the chain from consumer to producer, while the supply chain is product based and is flow is in one direction
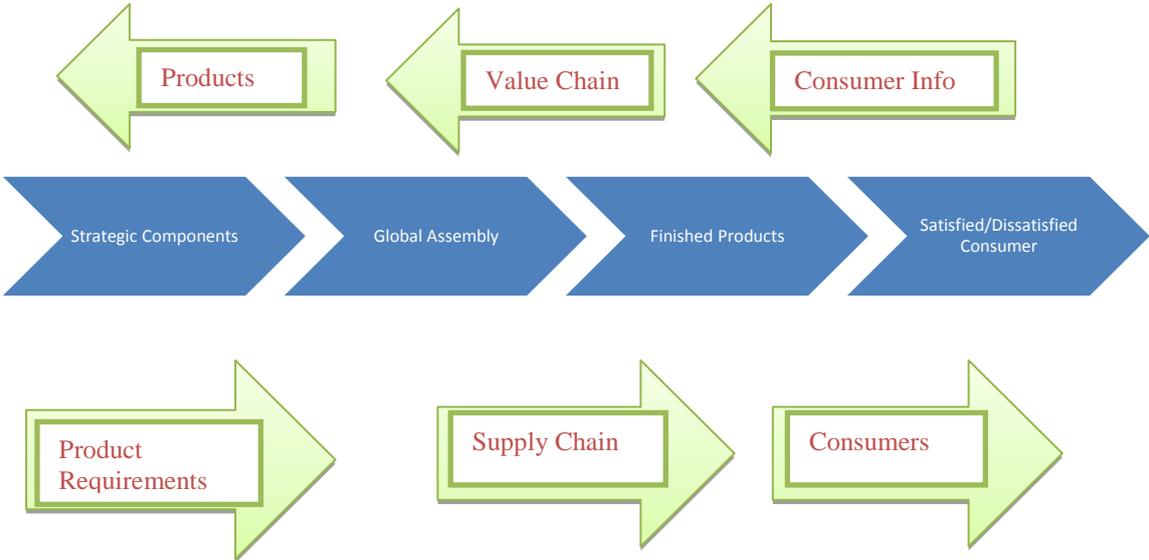
Figure 5, A comparison of a Value Chain with a Supply Chain, adapted from: Feller et al. (2006, p2).

Gupta et al. (2011,p235) defines SSCM as an established managerial practices that involves, "*environmental impact as an imperative, consideration for each product, and a multi-disciplinary perspective encompassing the entire product life cycle*". Although, this definition focus mostly on a business perception, it is somewhat lacking the perspective of communication, which is presented in Seuring and Müller (2008).

> "*The management of material, information and capital flows as well as cooperation among companies along the supply chain while taking goals from all three dimensions of sustainable development, i.e., economic, environmental, and social, into account which are derived from customers and stakeholders requirements.*"(Seuring and Muller 2008, p1700)

Other authors like Carter and Rogers (2008) embrace and emphasises the economic aspects. Carter's and Rogers', stance on organisational strategies focuses on sustainability as something more than just philanthropy, and when an organisation is engaged in the triple pillars of sustainable development, there is a need to reassure that this action do not harm the economics performance of the firm. As mentioned above Elkington (1998) formulated the three pillars (people, plant, profit,) which clearly guides managers to recognize those undertakings that create an economic value, while shining a spot light on the areas the societal and environmental that might have been omitted (Elkington 1998). Cater and Easton (2011) illustrated SSCM as a long term perspective of an organisation that develops and improves performance by concentrating on the real life accomplishment that will guide managers and facilitate growth in the foreseeable future. In figure 6 is an adaption of Carter and Rogers (2008) model by Carter and Easton (2011) consequently they emphasis four factors of SSCM as drivers (Carter and Easton 2011 p49):

- "*Strategy – holistically and purposefully identifying individual SSCM initiatives which align with and support the organisation's overall sustainability strategy;*
- *Risk management, including contingency planning for both the upstream and downstream supply chain;*
- *An organisation culture is deeply ingrained and encompasses organisation citizenship, and which includes high ethical standards and expectation (a building block for SSCM) along the natural environment;*
- *Transparency in terms of proactively engaging and communicating with key stakeholders and traceability and visibility into upstream and downstream supply chain operations*".
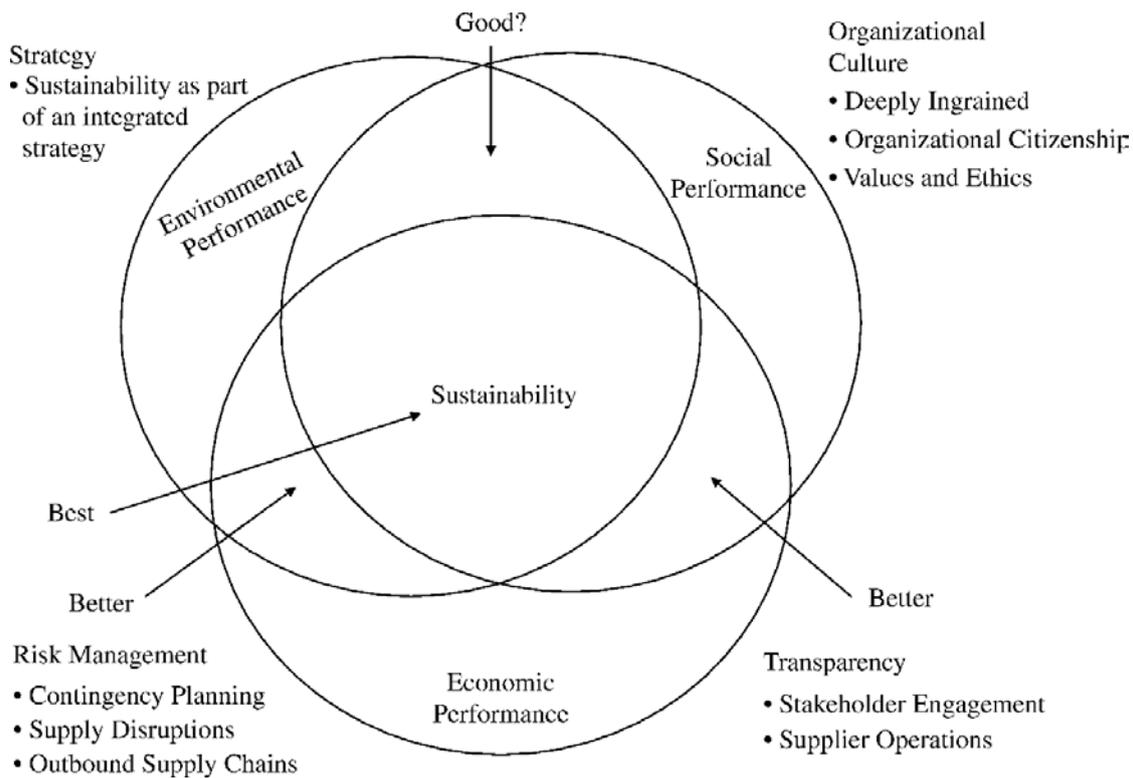
Figure 6, Sustainable Supply Chain Management (Carter and Rogers, 2008, p369)

However it must be noted that firms might focus on different objective and aspects in sub-areas for development of standards, strategies and agenda for incorporating sustainability in the supply chain (Ghiami & Sorkina 2009). This may affect the SSCM in a negative way. Indeed Pagell's & Wu's (2009 p38) study of sustainability and the supply indicated that the "*most are actually more sustainable than others in their industry*". Moreover, with their insight to this from a real world perspective on actually sustainable within the SCM context that the "*at worst do no not harm to natural or social systems while producing a profit over an extended period of time*" (ibid.p38). Thus, the rationale of SSCM is commonly established that collaborations and governance is highly important for improving environmental and social issues with the supply chain authors like (Carter and Easton 2011; Ghiami and Sorkina 2009; Pagell and Wu 2009; Seuring and Muller 2008).

2.5.1 Certification in the supply chain.

In this section, standards, guidelines, and labels will be presented that will be applied to both the firm and the supply chain. As stated above, collaborations within the supply chain is seen as the highest importance. Organisations generally focus on certification or in other words standardisation because it "*tells us what to do in certain situations. It indicates what is appropriate or permitted or, in a negative term, what we should not do*" (Brunsson, et al.

2005). Furthermore, certification standards entail an evaluation and tracking of procedures that establishes certification for forests and the green-labels for most timber products, from where it comes from. In a greater prospect this helps the creations of a chain of custody throughout the supply chain (Klooster 2005).

> Maser and Smith (2001 p2) wrote in their book about certification that..... "*an incentive for forestland owners to manage their lands in ways that will benefit their local communities economically (potentially, a premium price for logs to the local landowner and a greater market share for the local mill operator) and environmentally (a landscape that has greater ecological integrity and thus better protects the environmental wealth of the community, such as clean water and biological, genetic and functional diversity within the overall landscape)*"

FSC certified timber products comprised in 2005 an estimated five billion US dollars in sales globally (Forest Stewardship Council 2005a). In addition, the alliance of major companies, NGOs, and other social supporters, from around the global "*means that the commercial social and environmental impact of the FSC Trademark on timber-based products is going to be enormous and unavoidable*" (World Wildlife Fund 2004). Moreover from the FSC perspective standards certification can bring about a number of benefits:

- "Receive the public recognition which responsible forest management deserves
- Meet customer demands: UK retailers and specifies such as local councils architects increasingly ask forest managers for independent proof that their forest is well-managed
- Gain a competitive edge for your timber
- Meet internal policy: certification helps forest managers to demonstrate to owners, investors and/or themselves that they are meeting their objectives of responsible long-term management" (Forest Stewardship Council.2011 p1).

Thus, third party certification/standardisations features can help retailers become more credible in the eyes of the public and investors than with personal internal efforts (Klooster 2005). Additionally, with the large cooperation that dominate the timber Global Commodity Chain (GCC) vowed to only accept certified timber products, allowed the demand hit the roof (ibid.). The social, environmental and economic effectiveness of a standardised certification scheme does not only reside the stringency of the certification. "The degrees to which

environmental practices are accepted, internalised and utilised by e.g. subcontractors employed in the forestry operations" (Scylyter, et al. 2009 p382). However, certain authors feel that there is small proof that certification has substantial effect on managerial practices (Stringer 2006). While it must be said that there are other authors that feel the contrary and that there is a positive effect (Scylyter, et al. 2009; Cashore, et al. 2006). Looking further into the effect on corporate perspectives, certification provides retailers the implements to control their suppliers at a distance. Third party certification allows retailers to outsource the cost and the risk to the supplier by shifting the cost, management improvements, and finally certification fees onto the supplier (Klooster 2005). Moreover these cost which are "imposed discipline that makes certification a requirement for accessing the market, but without providing a price premium" to the foresters (Klooster 2005 p414).

2.6 Inter organisational concept

Organisational theory within business cannot be easily defined. There has been wide range of influences both within managerial contexts and business research areas of disciplines like: psychology, sociology, political science engineering and economics (Hatch 2006). Sarkis, et al. (2011, p3) defined organisational theory "as management insight that can help explain or describe organisational behaviour, designs, or structures". As this study primary focus is on the SSCM hence the focus organisational theory will be on the inter-organisational level with the interaction of the supply chain and the knowledge, attitudes, and behaviours, of practitioners.

Organisation theory there has numerous broad utilisations to the areas of management literature, its input on the supply chain management, and the environment which (Etzion 2007; Ketchen and Hult 2007) "separately is becoming more established" (Sarkis et al.2011 p3). However, the chief focus of organisational theory to environmental management has been to investigate initial implantation (ibid.).

In both Connelly, et al. (2010) and Sarkis, et al. (2011) several paradigms referring to organisational theory are discussed; the dealing with the interaction of firms and individuals such as: complexity theory, information theory, resource based view, resource dependence theory, stakeholders' theory, and social network theory.

Although all of these theories could bring a different insight to the interaction of firms and its individuals only one theory will be reviewed with more comprehension as it is felt that it can

better facilitate the purpose of this paper. Furthermore, only a very general view of this theory will be considered for this study. Jones, et al.'s (1997) Social Network Theory (SNT) contemplates organisational consequences as a function of social relationships between firms or individuals in a firm. In its simplest form SNT is a diagram of all the appropriate ties between firm and actors within an organisation. Moreover, SNT has been proposed as an appropriate theory to assistance comprehension of general sustainability developments (Connelly, et al. 2010). As individuals and companies in general, make decisions on the information that is available to them there can be a great leverage and sway from their social network (Wuyts, et al. 2004). The benefits a firm might achieve by bridging the structural holes that may have appeared in a social network are substantial (Ahuja 2000). Thus SNT can also additionally examine the network structures and its better understand its part in the diffusion of managerial practices.

There are several varieties of connections that exist both in the business world and in private life for example fragile and tough ties (Connelly, et al. 2010). The former one could be seen as ties to acquaintances or transaction relationships, while the latter can be seen as having much stronger ties like family, or legal contracts. Thus information for both sources can hold different weight for a manager (Wuyts, et al. 2004). Borgatti and foster (2003) have establish that an organisation social network constitutes a significant role in influencing the activities in which firms engages in. Furthermore, once an organisation initiates a sustainable strategy within their business practices, they may possibly influence other organisation that they have an alliance or other ties to that organisation (Gnyawali & Madhavan 2001). Indeed, there has been strong research which came out of the 90s that contributed to this area of study. They argued for an integrative approach to chain management, emphasizing benefits of holding solid collaborative partnerships with a few prominent suppliers rather that holding suppliers at a distance (Araujo et al. 1999). A reduced supply base where participants collaborate and have a better comprehension into each other's operations creates many potential advantages, such as the ability to have greater administration over what takes place in the supply chain with regards to environmental and social issues (Kogg and Mont 2012).

This insight into other participants' operations in the chain can also produce innovation for both environmental and social products (ibid.) (see appendix 1 of examples of legislative, judicial and executive value chain governance). It must be noted that some authors have argued against the lean approach and its merits for a supply chain. Their major dispute is that

there has been that fewer organisations are involved in comprehensive supply chain integration that can be seen to affect numerous tiers along the chain. Fawcett and Magnan (2002) points out that a considerable number of organisations do not even have a clear understanding of how their supply chain is functioning beyond the initial tier. This lack of knowledge can affect the strategy of the organisation leading it to a more defensive strategy to low risk (Harrie, and Bommel 2010).

Moreover, when a focal organisation are using conventional approaches within supply chain management and use these approaches to address social, environmental issues (ibid). It has been previously revealed by Fawcett and Magnan (2002) that purchasers / suppliers relationships may not be seen in the same light. The perspective of the purchaser or external researcher might be one of collaborations, while form the perspective of the supplier might share the same perspective. Therefore, a certain level of communication is needed and for it to be sustainable it must be of a higher level than what is commonly used. An important part of communication between actors is trust which is an important tool to have a successful inter-organisational relationship (Harrie, and Bommel 2010). Moreover, trust is based on the individual relationships, it has an influence on individuals as well as managers of a network and can be underestimated in research today (ibid.).

> "*supply and network management theories often focus on organisation, even though individuals and their decisions might be more influential on the interaction between different actors*" (Harrie, and Bommel 2010 p898).

2.7 Theory of planned behaviour

As identified above, the growth of social responsible companies' practices flourish in today's business world, so has the evolution of managers' responsibility and interaction with other stakeholders (Primmer and Karppinen 2010). How managers perceive these challenges or opportunities can have a great impact on how they might cooperate with their peers. Simon (1997) illustrated three points that are involved in the decision making process; one, the listing of alternative outcomes, two, the consequences of these strategies and the likelihood that they will occur, and finally three, the comparative evaluation and these outcomes. Simon also points out that the information that the individual draws upon is limited, as no manager could know everything about a situation. Within an organisation these interpretations come mostly from the individual professionals on their daily grind, especially when the

professionals are dealing with the area between organisational operation and consumer (Simon, 1997).

According to Papagiannakis, Lioukas (2012) there are astonish little research that has examined the links between managers' idiosyncrasies and a firms outcomes and its influence in relation to environmental aspects. However, there are a few studies that have used factors like managers values, attitudes, and subjective norms towards environmental behaviour, (Cordano, Frieze, 2000; Brust, Heyes 2010). In order to better understand the attitudes of managers the theory of planned behaviour (TPB) by Ajzen (1991) was selected to better facilitate the intention of this paper. Only a general version of TPB will be drawn upon as a holistic view of the supply chain, and the general interaction of managers within that chain.

The TPB has been use in numerous effective studies in which the authors have linked together attitudes and behaviour, most of the studies have focused on specific area when it comes to environmental issues like recycling, green consumer, and ethical behaviour (Mannetti, et al. 2004; Sparks & Shepherd 1992). Ajzen's (2002) theory of TPB has three fundamental variables that behaviour depends on attitudes, subjective norms and perceived behavioural controls. Furthermore, Francis, et al. (2004 p7) simplifies these three aspects, "To predict whether a person Intends to do something, we need to know:

- Whether the person is in favour of doing it (**attitude**)
- How much the person feels the social pressure to do it (**subjective norms**)
- Whether the person feels in control of the action (**perceived behavioural controls**)"

Attitude according to Fisbien and Ajzen (1975 p6) is a "learned predisposition to respond in a consistently favourable or unfavourable manner with respect to a given object". Furthermore, "our social behaviour is not always a perfect reflection of our attitudes because we are also subject to social influence" (Manstead 2011). Subjective norms indicate the individual's perception of social pressures to act or not to act in a certain way "and their motivations to comply with others'" (Sparks Shepherd 1992 p338).

Finally, Perceived behaviour control signify how an individual or individuals' comfort or discomfort in performing a specific behaviour. Ajzen (1991) presents, that this is not actual control over a specific decision, but rather the individuals self-efficacy and the practicality about the realisation of behaviour. The theory of planned behaviour was utilised to understand

attitudes and social norms that might be influencing biodiversity conservation of professional in the forestry industry (Primmer and Karppinen 2010). Furthermore, Papagiannakis and Lioukas (2012) investigate the values, attitudes and perceptions of managers for corporate environmental responsiveness. Figure 7, is an adaption of Ajzen (1991) TPB by Papagiannakis, Lioukas (2012) and further adapted for this paper. The figure illustrates the stage a manager might go through when addressing sustainability within their organisation and supply chain.
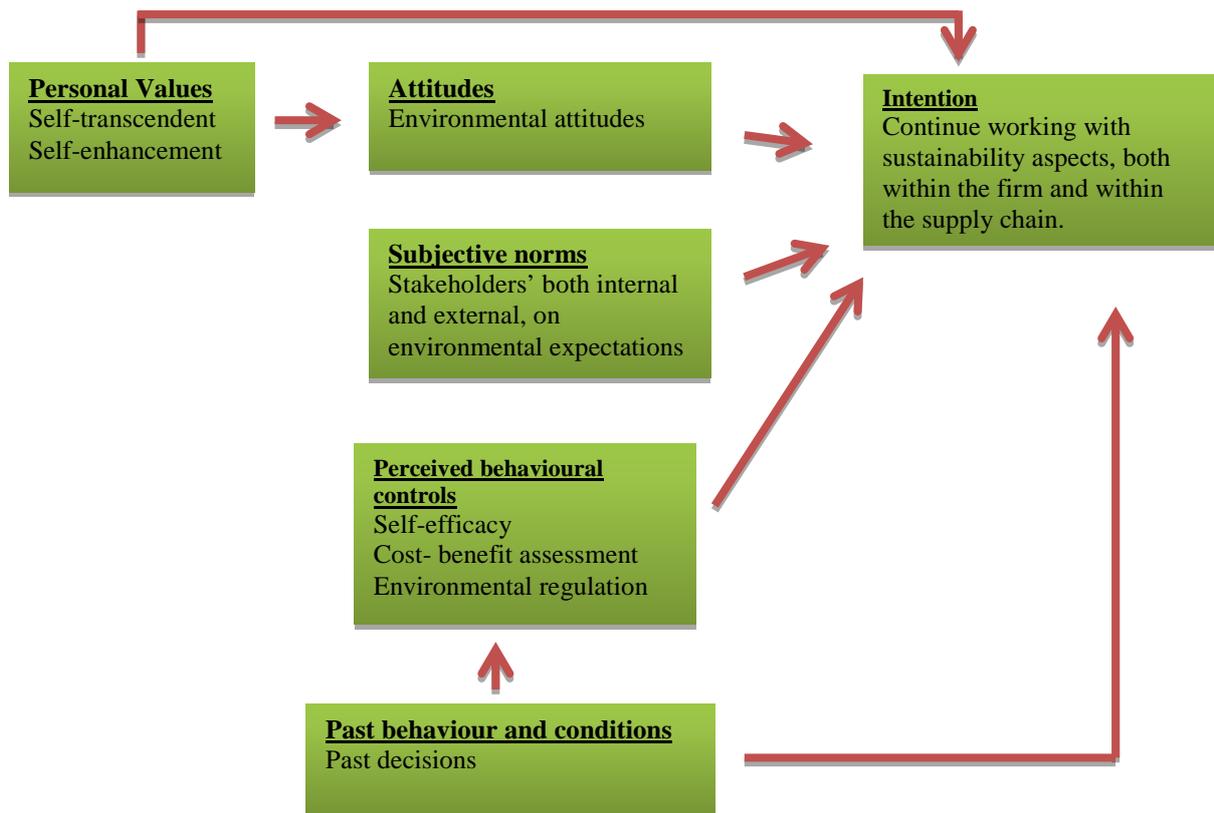
Figure 7, Theory of planned behaviour.
Source Ajzen (1991) and Papagiannakis, Lioukas (2012)

TPB brings a way in which to investigate how managers' feel about CSR and SD in general. However it must be noted that it TPB was first used in the discipline of psychology as a way to predict individuals' behaviour. Whetten, et al. (2009 p539) addresses this issue in their paper "organisations, after all, are comprised of individuals and thus knowledge about individual needs, identity, and personality, as well as judgement". Moreover, these organisations are also a part of the larger society and not just the business environment including socio-political context culture and markets which bring in influences for neighbouring fields of studies.

2.8 Summary

This section was an intensive illustration of the theoretical and literature review to demonstrating the societal goals of SD down till the theory of planned behaviour as a way to assess the individual managers' perception within the timber supply chain. Indeed the section uses a number of concepts and theory to identify a number of theories that might clarify why individuals and their organisation might behaviour in a certain way.

3 Method

Exploring the real world has a lot to do with what is possible (Robson 2002); it is focused around the choices made and their consequences. This study has been based on empirical findings, chiefly from interviews of companies along the forestry value chain, with the hope to improve interactions within the industry, strategy formulation, and society as a whole. Qualitative method was chosen to conduct the research, this involved a mixed method approach for data collection that includes case study interviews, document analysis and literature review. This method help create a deeper understanding of area of investigation. Furthermore, a comparative analysis between individual managers' perspectives' was conducted from the chosen companies. It must be noted that when dealing with individuals', attitudes and behaviours and knowledge which are highly reliant on the individual themselves and it would be very hard to generalise. In addition, there is a chance that individuals' perspective on an aspect for instance, "improvements" might differ with others within the forest industry. For these reasons again this reiterates the choice of qualitative study to better explain the issue from an individual level.

3.1 Case study

Robson (2002) wrote that a case study should contain empirical investigation of a certain recent occurrence of actuality with the use of multiple sources of evidence. The individual companies and their employees that were interviewed in this study, each signify a case in their own right, but together they represent a greater view of how the sustainability is developing. According to Eisenhardt (1989, p534) a case study is a "research strategy which focuses on understanding the dynamics present within single settings". Yin, (1984) pointed out that case studies can involve both a single and multiple cases with many stages of analysis. "The case study deals with the processes that take place and their interrelationship. Thus case study is essentially an intensive investigation of the particular unit under consideration. The object of the case study method is to locate the factors that account for the behaviour-patterns of the given unit as an integrated totality" (Kothari, 2004 p113). This area of sustainability within the supply chain has received a lot of attention in other areas, from both the academic and industry alike. However, with a lack of truly accepted definition and models leaves researchers focusing on a more general framework rather than specific one. This kind of approach carries an inherent risk of subjectivity with sub categories being descried as vague

or ambiguous. Alternatively, with a holistic view researchers might hope to identify areas of research that stand out and address them.

3.2 Choices for theoretical and literature review

The Theoretical perspective and literature review, on this study has been developed based on academic literature also derives a perspective from reports by international NGOS such as FSC and finally reports that originated form the timber industry. The internet and electronic searches were the primary source of information. However other such methods where used such as relevant literature from hard copy and suggest literature form colleagues and supervisor. Thus to construct the theoretical perspective and literature review the author focus around key words such as sustainability, corporate social responsibility, Timber, sustainable supply chain management, and theory of planned behaviour to name but a few. The search engines that were utilised were Science Direct, Web of Knowledge, Google scholar, Emerald, and Jstor. It also must be noted that all article that were identified as important to this study, their references more often than not were also used to create a holistic view of literature within area of study.

3.3 Choice of countries

The choice of countries is one of logical selection Sweden has been at the fore front of sustainable business development since the early 1970s (Sweden.se) Additionally Sweden is one of the world's largest suppliers of certified wood in the world with over 80% of the forests being certified (Bass and Simula 1999). The UK has a high demand for Certified timber due to the fact it is now currently the world's third largest importer of illegal wood according to a news report from the Metro (2012). Moreover, with new regulation for the European Union that focuses on illegal timer has created a high demand for certification. This high demand is been in a large part being filled by Swedish saw mills. Therefore, this creates an environment where the market is focused on SBD and certification which will fill the requirements for this study. This leads us to the companies that operate within these markets.

3.4 Choice of companies

"In the real world enquiry, in the contest between what is theoretically desirable and practically possible must be won by the possible" (Robson, 2002, p. 378).

B&Q is the largest hardware retailers in the UK and a subsidiary of Kingfisher that generated £ 3.9 billion in sales and 270 million in profit for the year ending 2011(www.B&Q). Also B&Q have been given a number of awards for the CSR behaviour in 2010, notable, the best green companies awarded by the Sunday Times, Observer Ethical awards (ibid.). Thus, for these reason the B&Q was chosen to be interview as it demonstrates the company's focus around sustainable business practices, also with that with B&Q long term commitment to SD there is a greater change that these values have become more integrated into the supply chain. For the Swedish market the choice was more difficult there, as state above the company must be exporting to the UK and have shown a commitment to SD.

To fulfil this requirement a number of companies were approached, however there was some resistance with a willingness to help which further narrowed the search field. Finally one company was identify as having a high environmental standard, and is distributing within the UK market. Södra was formed back in the 1920s and from then on has grown through number of mergers and this trend has continued since (www.sodra.com). Södra holds a number of certification schemes both FSC, and Programme for the Endorsement of Forest Certification (PEFC). Furthermore, Södra which is primary based in the south of Sweden but has operation in Norway and Denmark, has been working with SD values for a number of years, for these reasons the company was chosen to interview (ibid.).

3.4.1FSC

To insure a greater understanding of the supply chain it was felt that NGOs should also be interviewed as they and their employees interact with organisation within the supply chain on a daily bases. One such NGO that was chosen because of it prominent placing in both markets and also holding a lager quantity of companies that subscribe to their certification. The interviews were conducted in the same manner and around the same categories as the other interviews.

3.5 Interviews

"*The main task of the interviewer in case of a focussed interview is to confine the respondent to a discussion of issues with which he seeks conversance*" (Kothari, 2004.p98).

The interviewer can be seen as a catalyst for a comprehensive manifestation of the respondents, and their feelings, beliefs and create a frame of reference in which such emotions would bring forward a personal significance (ibid). Qualitative interviews hold a tenacity of going more in-depth of specific cases or issues. While there are other techniques like quantitative interviews which its main target of simplifying in statistical terms which does not fall into the desired field of study. The main aim was to understand the target group of this paper namely, managers or individuals employed within the chosen organisations, which generally hold positions that could shed some light on their attitudes and behaviour, and knowledge associated with sustainable business.

Furthermore, the criteria for this study was that these individuals would have worked for the chosen organisation for no less than five years or have specific knowledge of how the organisational culture, and stature is when dealing with sustainable business. This criterion was chosen as it was deemed that the individuals would be able to bring a time perspective of how sustainability has developed, and its current placement, also to identify if there has been an improvement in relations along the value chain because of sustainable business practises. The interviews were semi-structured interview and the area of topic was suggested by the interviewer some general questions in hope to leave as much room for the interviewee to bring their own interpretation. The areas of topics are shown in appendix 2. The interviews were conducted in a Variety of methods due to the availability of participants as there was difficultly with respondents so face to face telephone and email interviews were conducted.

3.5.1 Face to Face interviews

A number of interviews conduct where face to face, to lower misunderstandings and insure that the information was being understood. With the entire interviews that were conducted, the questions were short and made as easy as possible to understand to limit the misunderstanding bias. The interviews were conducted at the participants' place of business to insure that they felt comfortable to exchange information. All of the interviews were recorded, and transcribed word for word to insure accuracy, also during the interviews they

written down by hand for backup aims. The transcribed information was later sent back to the participants for their validation and validity of the interviews.

3.5.2 Telephone/email, interviews

Due to the unforeseen events a number of interviews had to be conducted over the phone or thought email. The participants where sent the question in advance to prevent misunderstanding or bias that might occur. It should be noted that there are some limitation to these methods of data collection name that the participants' might not feel the need to be as open as they would be in an interview. However as the participants' where given sufficient time to work with the interview question their answer should go deeper into the research area without all the informational fluff. In table 3 below is the date, time and location of the interview, also the verification form the participants.

Table 3 table of interviews

who	Type of interview,	Place of Interview	Date: of Interview	Date sent: for Validation
Participant A	Face to Face	B&Q headquarters, Southampton, UK	2012-05-29 11:45 – 13:00	2012-08-20
Participant B	Face to Face	B&Q headquarters, Southampton, UK	2012-05-29 14:30– 15:30	2012-08-20
Participant C	Via telephone	Kingfisher	2012-07-04 13:20-13:50	2012-07-05
Participant D	Via email	FSC headquarters, UK,	2012-06-20 Replayed 2012-07-02	2012-07-08
Participant E	Face to Face	FSC headquarters, Uppsala, Sweden	2012-07-13 10:00-10:30	2012-08-20
Participant F	Via telephone	Södra headquarters, Vaxjo, Sweden	2012-07-23 12:30-13:00	Not need

3.6 Ethical discussion

As previously stated the focus of this study was on managers' attitudes, knowledge and behaviour, within organisation in a supply chain. This created a number of issues for the respondents for instance the values or view of an individual might not coincide with those of their organisation. Moreover as sustainability is ever changing the views of one manager might seem counterproductive to an organisation and its reputation if it is against the status quo. This is why some of the participants chose to stay anonymous, to insure their anonymity

form their respective organisation there name, and position were removed from this study to maintain a high level of trust. Furthermore, over the course of the interviews a lot of private information about the organisations and their strategy for the futures was given although this information would be able to provide a great picture to this study the author felt it best to maintain this trust and omitted this information.

3.7 Analysis

The analysis was conducted by comparing that data form interviews, company documents and guided by the theories and the researchers own understanding of the issue (Denscombe, 2007). The categorisation of the participants' information was done to focus and filter this information also to enrich the understanding of the statements. Thus this categorisation of information was evaluated with other participants' information a group together, this was done to extract a pattern. Then the respondents were also matched with the theoretical models of this study, which lead to an assessment of common points.

4 The empirical Results

This chapter represents the essential part of the study as with most qualitative empirical studies. From hereafter the results will be presented in the same manner in which they were collected namely from the end stream (retailer) of the supply chain back upstream to the producer (sawmill company). This is reason was chosen due to that fact that there is no one specific focus or perspective of sustainability within supply chain in this study (i.e. retailer, producer, NGOs). The empirical data will be presented in a structured way with the three main organisation be give a section each explaining their background, and these section broken down into smaller section that correlate with the interview questions and the theoretical frame work. The following information does not contain all relevant information collected during the interviews due to large quantity of information collected. This categorisation of the empirically finding is to assist the readers in formulate an overview of this study and its results.

4.1 Company description

4.1.1 B&Q

In this section the participants' own organisation will be introduced more clearly to better understand their position. B&Q was founded in the later 60s by Richard Block and David Quayle. Their first store opened to the public in Portswood, Southampton. Over the next 20 years the company grow exponentially and with the change in ownership lead to B&Q being part of Europe's largest hardware company. As far back as 1991 B&Q had started to audit its suppliers on environmental bases. In more recent years B&Q have won the retail week awards in the category of corporate responsibility and in 2012 B&Q where the winners of the Queen's award for enterprise; sustainable development for their work on creating a sustainable business and improving sustainability of homes in throughout the UK. (www.diy.com)

4.1.2 FSC

The formulation of the FSC started back in the early 1990s with the growing concern about deforestation. The FSC was setup by a diverse group, from traders and environmental and human rights groups, to address the lack of well-managed forest and create a more

sustainability and responsibility for timber products. In the U. N. conference on the environment, which was held in Rio de Janeiro in 1992 had not come to any legally binding agreement however it did proved a forum for an international certification scheme (www.fsc.org). How FSC works is much like the three pillars of sustainable development is focused around economic, social, and environmental. Each chamber includes non-profit and non-governmental organisation to insure a wide range of issues are confronted (www.irishforestcertification.com). The FSC boasts as of the 15 June 2012, 156.121 million ha are certified and a further 23, 571 Code of Conduct (CoC) certification. In 2007 FSC released their global strategy with five major goals for the future that are:

1. Advancement of global responsible forest management
2. Ensuring reasonable access to the FSC schemes
3. To ensure transparency, reliability and integration of the FSC schemes
4. Generating business values for products from FSC forests
5. To reinforce the international network to deliver these goals (www.fsc.org).

4.1.3 Södra

Södra was founded in the 1920s its primary product area is the south of Sweden and is one of Sweden largest forest owners association with 51 000 members with a total area of 2.3 million (www.sodra.com) Södra trades to most countries within Europe including the UK, but likewise USA, Japan and the middle east they operate out of eight sawmills placed in various local around Sweden. Södra much like the other participant organisation within this study have long been proactive when it comes to SD aspects. The board of directors adopted environmental policy that encompasses aspect social and environmental issues as far back as 1995, and later reiterated these policies in 2000. Furthermore, they adopted policy to have greater protection for forests and the imported timber in 2009 the board of directors revised their policy to incorporate a section related to control of raw material (Södra, 2012).

4.2 Documentation review

From documentation collected form B&Q, FSC, and Södra all three organisation define CSR and SD in similar way, which could be coincide to be in line with Elkington (1994) TBL and the three pillars of SD economic, social and environmental. B&Q along with Södra have conveyed their commitment to a continuous drive for greater integration of SD into their firms, while FSC mission is to constantly help the spread the values of SD. Furthermore, both

B&Q and Södra have a Strong relationship with the FSC and rely on their certification scheme heavily in their daily transactions. However, once again, the study is focusing on the individual not the organisation, so while this information identifies that the organisation are working with SD and CSR it's not the chief attention of this paper.

The following section will focus on the interviews and presenting the information to the best of author abilities without skewing the information. The arrangement of information will focus around the five components that made up the interviews'. Moreover, when presenting the information obtained from participants it will be represented similarly with table 3 in the previous chapter, for the reason of clarity and to uphold the anonymity of the participants. Also as this has been a case study the participants will be grouped together as one case under the aforementioned categorisation.

4.3 General information, and interpretation

The first part of the interview was designed to identify how managers interpret SD and CSR. The reason for this was to comprehend is managers hand a positive or negative perception. This section was represented with such query as: perception of CSR, positive and negative effects of certification, and to follow on the questions by asking them to could give an example failed or success in the past.

> "*CSR is a mechanism if you like for delivering within a corporate environment the goals and aims and aspiration of an organization in respect of the environmental and ethical, agenda*" (participant A, B&Q)

This view was held and expressed by all respondents although it was articulated in different ways through, for example,

> "*CSR becomes increasingly important as public awareness of environmental and social issues grows. Certification schemes provide a risk management tool for companies, in terms of their sourcing, whilst also allowing them to communicate their commitments*" (participant D, FSC UK).

The respondents' views also held different perception on extent in which CSR has developed, "however it is still a teenager stage, CSR is at different levels in different companies and countries" (participant C, Kingfisher).

However there was one note able difference the participant from upstream Södra their within the supply chain in was not aware of CSR or SD "*to be honest I'm not sure about this corporate social responsibility, [...] I am not quite sure what this is to be honest*" (participant F Södra). However, when it comes to the question of certification participant F embraces the positive aspects of certification, "*for certification in general for the environment for social issues is quite good for us because that's a positive issue for us against our competitors*" (ibid.).

4.4 Communication of CSR

In this section of the interviews the main focus was on communication to identify how the respondents communicate and to whom that message was sent. The section also looks into the aspect of trust as this is a very important feature of communication. The propose for this categorisation was also to identify if the respondents felt that certification improved trust within the supply chain, it was felt with a greater level of trust the more socially acceptable the action would be. Furthermore, to whom they communicate has an importance this can also show who they feel they have control in the case of retailers over supplier with certain criteria or vice versa which facilitated a verity of responses from respondents. Moreover, this will also connect with the TPB model that was presented in chapter 2, figure 7. From participant B (B&Q) their perceptions on who they communicate with was that they:

> "*communicate every day, probable more around suppliers because they're the ones going to shape the how are we are going to go in the future we need them to come along with us and networking as well and understanding what's happening on the market place but there also it's I think important that you make sure that you in house your communication is very strong*" (participant B, B&Q).

Participant A (B&Q) expressed this view was also by stating;

> "*where I feel there is a huge opportunity so far from print for is example one we know that down our supply chain one two tears blow it's is ten time our own impact and whatever metric you want to look at, at a B&Q operational level if you multiply that by ten that's the impact to tears down the supply chain and obviously our supply is more than two tears long in pretty much every incidence the bit [...] I tend to feel that the way to influence that is to actually work with*

the manufactures the importers to get the product right in the first place so they have a lower impact in their use" (participant A, B&Q).

However when it came to the participant from Kingfisher, which again is B&Q parent company the respondent highlighted the inherent problems when dealing with SSCM, "*Like most retailers models the first tier supplier is the one that they have most contact with, usually this supplier does not have much to do with the resource or the environmental issue, the really challenge is to reach the level where the issue needs to be addressed*" (participant C, Kingfisher)

When it comes to the focus of communication of FSC there seems to be a difference in direction the FSC Sweden "*FSC Sweden we are mainly communicating with land owners and suppliers but we know that we would have more of an effect if we communicate to buyers*" (participant E, FSC Sweden) while the from FSC UK states as:

> "*Independent certification bodies undertake the auditing of certified companies so in some ways our relationship is strongest with the retailers operating under trademark licences, as these are administered by FSC UK*"
> (participant D, FSC UK).

This difference in focus could be due to that face that Sweden is a primary a producing country (www.nordicforestry.org), while the UK is primarily a consumer based country when it comes to timber (www.forestry.gov.uk).

Final segment of this section was the focus of trust and if certification helped improve the trust within the supply chain. All of the respondents recognised the benefits that are associated with certification, both as a tool for standardising and ensuring certain level of quality, when asked if certification was improving trust within the supply chain the respondent from upstream participant, F (Södra) responded so adamantly "sure it's improving absolutely it is, it is". However the respondents downstream were a bit more apprehensive about certification scheme.

> "*I think they challenge for certification is how you go beyond just proving how much a piece of paper is a valued piece of paper so what additional checks need to be put in place so do we just expect an FSC certificate or then say it's great it in date it's valid is it on the database is that good enough. I would suggest that increasingly that it's not what tools are in our tool bag or room to make it easier, to more relevant*" (participant, A B&Q).

However this is not to say that the respondents are not supportive of the certification schemes moreover that they have recognised the failing that are with these certification scheme this could be due to real life examples such as;

> *"if an slip ups happen which we have had early this year, we had an issue with plywood where the brake down in the FSC certification system between the supplier and the certification body, were still trying to figure out or trying to understand what happen"* (participants B B&Q).

Although this incidence was just an example of one failure it does not tarnish the perspective of most of the respondents which indicated that certification is the best the supply chain had to work with this viewpoint was best personified by participant, A (B&Q),

> *"you could be naïve and say no people won't be unscrupulous I'm sorry people will try and find the easy around any which way they can to do whatever they feel they make a profit from it so I think that we have enough experience now as individual as business as certification bodies to have an honest read up now on whether it's on labour standards whether it's on timber certification all of the because we know you could say the same about double bookkeeping in China you could say that the use of underage labour in India all of those are subject to certification now that may be an ethical audit it may be a timber audit whatever it maybe all of those have issue associated with them but it's the best we got in the current to situation"* (participant, A B&Q)

4.5 Interaction, certification and timber

In this section of the interviews, the emphasis was on individuals' interaction with in the supply chain and how their perception of CSR is affected. Furthermore this section looks at how the individual within the supply chain perspectives the control that is created by CSR and if it is used to affect their behaviour. The questions were formulated around issues like, who is the greatest benefactor of CSR form their perspective, if the focal company CSR drive is having an effect on other organisation Culture, if so was it negative or positive impact and by how much?

When it came to the respondents' perception of who benefits the most, downstream is seems to have a more holistic view of CSR with what could be seen as politically correct answers

> "*I think the answer to that would be depends on what you asking what your measuring that against so what does good look like, well how benefits ultimately it's got to be in the truest scenes of sustainability to actually it's got to be this whole oxymoron of win, win, win*" (participant, A B&Q).

Additionally,

> "*in a B&Q world the benefits are primarily form reparation if you're not doing the right thing as we have already seen with the timber if you are not doing the right you're seen as not caring but actually why wouldn't you want to not do it, that's what in my world why shouldn't you want to come along do it*" (participant B B&Q).

Furthermore,

> "*so who is benefiting is the environment benefiting? Actually no the environment what I would say are we lowering our impact on the environment and then that is what the benefit should be*" (participant, A B&Q).

Further upstream the participant was held somewhat similar point of view with FSC Sweden indicating that reparation being a big factor to the benefit of certification for companies. However, this perceptive was not the only one expressed the benefits seem to be one more focused around CSR as a tool to be utilised.

> "*basically all customers require FSC or PEFC today. We would supply 90% of our customers worldwide with FSC or PEFC timber […] we use it as a tool for a selling point to our customers of course we can do PEFC or FSC*" (participant F, Södra). To reiterate again this participant view of CSR "*is quite good for us because that's a positive issue for us against our competitors*" (ibid.)

The next segment focuses on if the focal CSR actions are having an effect on the organisational culture. This question was straight forward as it was felt the only the participant would identify was the organisation culture was and how it was being affected. This kind of straight forward questioning can lead to a simple yes no answers to avoid this outcome the respondents were asked to examples and or to rate the extent in which it has affect the culture. A surprising outcome was that the respondents gave a time perspective of the development which will be presented later in this chapter.

> *"Well let's be honest all businesses have an effect on their supply chain, generally it changes easier than internal because there is an economic incentive to change, but when it comes to internal it just take longer there still is a perceptive that is just risk evasion with some managers"*
>
> (participant C, Kingfisher).

Further perspectives were,

> *"The CSR commitments of a large company can have a significant impact on their suppliers and their competitors. By demanding that products must be certified to a particular scheme, the company can affect the entire supply chain. We have seen the impact of large retailers committing to move to FSC certified products – their suppliers gain FSC chain of custody to meet this demand and not only source from FSC certified companies but may also be in a position to offer FSC certified material to their other customers as a result of their certification similarly, competing companies may be encouraged to follow suit"*
>
> (participant D, FSC UK).

Moreover, and from further upstream

> *"I think the retailers have great power within the supply chain, we have seen examples of this when a retailer has demanded a certification or green labelling for a range of products there has be a huge impact for change"*
>
> *(participant E, FSC Sweden).*

Finally

> *"Am I'm not sure to be honest we all know it's important, that we deal with it, that we in our company do it, especially when consumer ask for it"* (participant F, Södra)

The latter point of view maybe explained by the fact again that the respondent focuses on the tools implied by CSR, such as certification. Kogg and Mont (2012 p89) point out that in an integrated supply chain management to an extent has been disregarded or deliberately restrained the significance of "power relations with the chain since power practise can be detrimental to inter-organisational collaboration and trust". Additionally, the respondents' emphases the economic power the focal companies as have been the main influence they might have over their suppliers or other actors within the supply chain lastly it was suggested that the company's proximity to the end user also was a factor this influence

"mainly of course keeping the retailer happy, but I think in the long run they do as other companies get effect in a more deeper sense, so time is very important for this business" (participant E, FSC Sweden).

The last segment looks at how the respondents see as being in "control" of the supply chain and if this is perceived as good or bad in their eyes.

> *"I wouldn't say gives us control of the supply chain, but it gives us reinsurance that if they have been audit then we have the reassurance that they have been assed against the requirement of standards, while they having to excessively set up the supply chain it gives us the reassurances rather than control because it put the enfaces back on the supplier rather than have us worrying about our supply chain."* (participant B, B&Q).

It is a fine line between control and reassurance and as long as the suppliers might face repercussions for their action it may make economical or reputation sense to give the other actors control over their actions. However this is not necessary has a negative perception from further back up the chain,

> *"I think they do control there supply chains and its positive because it hinders them to get into negative things into their supply chain you know like illegal wood, or child labour and we see that many big companies I can take IKEA as an example using FSC certification as an internal way of checking"*
> (participant E, FSC Sweden).

> *"Yes, yes it's a positive of course in the long run we need to make sure that the nature is still there of courses its positive there's no negative to certification all, but there are bad one as soon as you don't have a regulation there are always people doing it wrong on the wrong side"*.(participant F, Södra).

Lastly

> *"Well to be frank they do it any way all Retailers have hug buying opportunity to effect there for example when B&Q changed the policy to only purchase FSC certified timber that change, lead to a change of the whole UK supply chain. When you talk about sustainable supply chain mostly what you're talking about is scouring your supply chain, that's to say that you might not know if you can get timber from, bla bla (unknown name) forest but with sustainability you can*

40

know this five years down the line that your chair your selling now you can still sell then". (participant C, Kingfisher)

4.6 Education

This section was to deal with the question of knowledge and their feelings towards it, the respondents were asked about their level of training and to rate if training was important to the function of the supply chain. The issue of education is not used to example the level of knowledge, as education is not a measurement or a substitute of in intelligence. However, the level of training could affect the decision of a manager. Of all the respondents only two had formal education around CSR and SD, however the level of knowledge the respondent shown within the interview was significant enough to indicate a high understanding of SD or CSR. All respondents brought up a number of theories throughout the interviews form TBL, CS, and CoC which in its self indicates a better than average understanding of CSR. The respondents felt that education was need however the general perspective was that more emphasis on communication of the issues at hand,

> "*I think education yeah, getting the message out about CSR is quite a challenge especially in this environment of the retail because they're not always thinking of it so what we are trying to do about it is we have a CSR coms team who develop all the CSR message both internal and external*" (participant B, B&Q).

> "*Having an understanding of the issues certainly helps but it is also important not to slip into technical jargon when trying to communicate to a wider audience*" (participant D, FSC UK).

One of the participants highlights this factor and speculates that this is because there are too many specialists and not enough generalists in a SSCM.

> "*so if where going to call it sustainability or call it CSR having a background is great, and the challenge here is how to move from being a specialist to a generalist and from a generalist to a specialist, with known sufficient to be able to influence what it is you need to influence*" (participant A, B&Q)

4.7 Future

This section was to investigate how the respondent attitude was towards the future of CSR and SD. The purpose for this was to recognise where and how the SSCM was going to develop as the practitioners have a unique insight about this question. The issue of development with the supply chain brought up a time perspective as all of the individuals that where interview have work in the current organisation for more than five years an one such individual has been working with timber supply chain since early 1997. These perspectives are unique to each individual and rely heavily on their position within the supply chain or there past decision, however when brought together gives a portrayal of how they see it, which overall is optimistic.

> *"As I see it, the next big area much like the carbon footprint is natural capital if a business does not secure the natural capital then it can go out of business, and more responsibility of the use in natural capital, almost everything we use in some form or the other come for natural capital, 30% of B&Q stock comes for timber so there is a need to develop this better"* (participant C kingfisher).

> *"transparency in one word, I think that is going to be a huge issue and I'm picking, so the work we are doing around circler economy and cradle to cradle is going to increasingly also coming into full and the martially resource constraint world am. I think understanding where your products come from, province is critical customer are demanding it, they may not be overtly asking for but they are sub-overtly"* (participant A B&Q).

> *"The introduction of the EU Timber Regulation is likely to make some voluntary schemes more attractive to companies and may well force more SMEs to look at their CSR – in terms of timber sourcing at least"*. (participant D, FSC UK).

> *"I remember I work for a competitor then, well I think is started back in 1997 for us to be an issue certification, then it was FSC and then came PEFC, which was easier than FSC but that has changed over the last few years, it is so common now that everyone has certification now and I think that it will be more and more important issue"* (participant F, Södra).

5 Analysis

This Chapter refelects back to the research question that where posed in the beginning of this study. The questions will be discussed around the empiciral findings of this case study with conjuctation of reviewed litterature and the theoretical framework. Denscombe (2007) points out the importants of focusing on the significance of qualitative data always involves a progression of interpretations wherein the researcher produces understanding out of raw data. In this section the question will be restated for the clarity of the reader.

5.1 Question 1

- How do managers in the timber supply chain perceive sustainable business development, emphasising their attitudes and behaviours within the forestry industry?

When it comes to the following analysis the use of theory of planned behaviour by Ajzen (1991) will weigh in heavily in the analysis. After the coding, grouping and the categorisation of the raw data collected from the interviews, brought about an encapsulation of the categories. For this reason the analysis will be broken up into the three main parts of the theory, Attitude, subjective norms, and perceived behavioural controls.

Attitude

Based on the information acquired from the individual interviews of participants it may be concluded that there is a positive view or perception towards CSR and SD throughout the supply chain. Although the respondents did express failings with the implantation of the CSR system "*The negative effect I would say is the compartmentalising of CSR in the organisation, and when a problem arises they can say it's not our department or our problem. But I would say for CSR to move forward they will have to lose this fragmentation if it wants to move forward*" (participant C, Kingfisher). The holistic perspective was still distinctly optimistic and coupled with Francis, et al. (2004) interpretation of TPB which states that if an individual will favour doing something most likely they will do it or continue to do it, in conjunction with the other two factors of TPB.

Subjective norms

The respondents indicated that they felt supported in their choices to work with sustainable business aspects not only from their organisation but from society at large. Indeed the respondents felt the action of their organisation reflected back on them or vice versa. This factor maybe demonstrated by the fact that respondents specified that when communicating the resistance to CSR or SD idea's has diminished of the last few years. Thus the easing of this resistance to the idea of CSR, SD and the tools that are used to insure its success validates this point. Another point which reinforces this opinion is that as organisation have started to incorporate CSR and SD into the long and short term strategies, as the organisation are starting to see the monetary benefits

> "*we have developed a monitoring program online where the business inputs all that information, so it's something they can see it, well actually our carbon emission are going down and actually we have saved this amount of money so it just like say why have we not done this sooner*" (participant B,B&Q).

Indeed, the economic motivation is continuing to be a major factor for firms to support SD or CSR strategy respondents have advocated that their organisation have express CSR or certification as an essential for commerce within the timber supply chain at present.

> "*it comes to FSC or PEFC, and when it comes to certification may it be that the end consumer require it, it's not so much about what you're doing with your PEFC certification it more well we need to have it for it to fit with the rules*" (participant F, Södra).

It must be noted that this however, is not implying that the principles of CSR are being fully integrated into the supply chain. Participant A (B&Q) emphasised this point best; there's always going to be about 20% of individuals who are just not going to care and it would be a waste of resource to focus on them.

Perceived behavioural controls

Francis, et al. (2004) interprets perceived behavioural controls as whether an individual feels in control of the action. As an individual works for or within an organisation their choices can be limited by the role in which they take within that organisation, this restriction can also be from other individuals, past decisions or in the case of supply chain any number of actors. Indeed looking into this aspect of control with greater insight, control could mean if the respondents felt like they could influence overall outcome within the supply chain. This

influence could be associated with achieving CSR or SD aims. The respondents did indicate that they were having an effect on the supply chain through their action and the actions of their organisation. Moreover, the study does illustrate that from the perspective of the participants within the timber industry the focal company or retail does possess significant influence over the chain. Which is parallel to what Li N, & Toppinen, (2011) Klooster (2005) understanding of the power relations with the supply chain.

> "*The CSR commitments of a large company can have a significant impact on their suppliers and their competitors. By demanding that products must be certified to a particular scheme, the company can affect the entire supply chain*" (participant D, FSC UK).

Further upstream the participants saw that the more a retailer exudes their influence the great the impact on the supply chain and was illustrated as a positive driving force for change. The subsequent section of TPB will deal with future intent of the respondents this will not focus on any specific aspect or intention but in a holistic view of what managers perceive of CSR and SD.

Intention

Ajzen (1991) theory is intended to predict through its three inherent factors the three main factors a determination of an individual action. As it can be deducted that the respondents optimism towards CSR and SD from this study do fulfil the criteria of Ajzen model presented in figure 7. Indeed the respondents seem to have incorporated from each of their respective organisations perspective of CSR as well as their own individual perception. This can be understood as a benefit to the supply chain not a holistic drive to SD or CSR, but an individual drive to an over overall goal. Moreover as other authors have demonstrated each supply chain face its own challenges and from the empirical finds within the timber industry this is no different. However there does seem to be a drive to address these issues from and one respondent put eco champions of the industry.

5.2 Question 2

- To investigate if there is a unilateral adaptation of sustainable business practise along the timber supply chain how it is being communicated?

As pointed out at the end of the last question there does not seem to be a unilateral adaptation around a single message or definition of CSR or SD. However there does seem to be a

moderately drive on a CS that encompasses the Elkington (1994) TBP emphasising determination around social, economic, and environmental improvement through actions that improve the sustainability of the supply chain. This maybe as respondents emphasised, child labour, lowering impact of products, ensuring biodiversity, as pointed out in the chapter 2 and confirmed in the empirical finding that certification is a major tool used to insure these action are concluded. As certification is a major tool for CSR and as the propose for certification or standardisation is in affect a way to change how people perceive their environment, in a different way by creating a more homogenise way for action (Brunsson, et al 2005). Certification which is driven mostly by the focal companies gives retailers control of the supply chain at distance which is also in line with Klooster (2005) view of commodity networks. Indeed, through the use of certification of the timber chain has brought about an environment where managers share some of the same values although they don't share the same organisation culture "*if a number of individuals share the same norms they find it easier to work together to attain a common goal*" (Brunsson, et al 2005 p28).

This could be construed that certification is bring about an industry change, from the perspective of the respondents certification has developed into a threshold for conducting business within the industry.

When investigating how CSR and SD are developing through certification within timber chain, there is a need to look at how the individuals are interacting. Indeed the interaction along the supply chain is generally seen as linear, regarding Feller et al. (2006, p2) model of the value chain it can be seen that the information flows directly back up the chain to the producer as shown in figure 8. This is also how most respondents at first glance indicated the spread of certification throughout the chain, as it becomes obligatory for purchaser today.
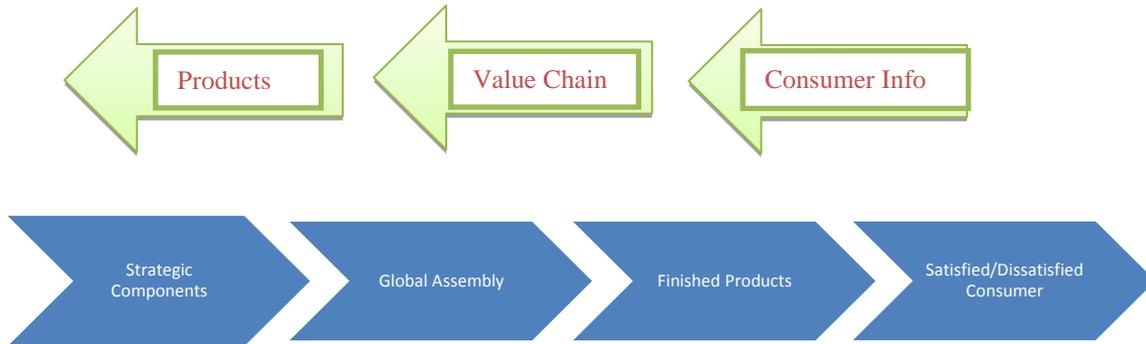
Figure 8 Linear information flow and value chain

However, this perspective fails to take in to account the influence NGOs are having on the communication flow and how it can influence Managers. Indeed, as the retailers drive the need to become certified further upstream the more the organisation and individual have the chance to interact with non-traditional actors, such as NGOs like FSC. Thus as this information is collected and used it can have an effect on decisions made by organisations and individuals rely upon it (Wuyts, et al. 2004).

The flow of information within the chain takes may not be as linear as it might appear. Certainly there is a need for a strong understanding of CSR downstream with retailers as they have to communicate with the end users. However, further upstream the producers are less aware of CSR but were still conducting it through certification and other means. This demonstrates the effectiveness of certification as a tool for CSR and SD. Despite the fact that "*most retailers models the first tier supplier is the one that they have most contact with, usually this supplier does not have much to do with the resource or the environmental issue*" (participant C, Kingfisher).

In figure 9 is an interpretation of how CSR is integrating through the timber chain, from this researchers perspective, development of CSR through a contractual relationship still fallows the on a linear progression. Whereas, the more fragile connection and its information flows are more circular through the chain. The NGOs are playing a vital role conducting this information flow throughout the chain as illustrated in figure 9.
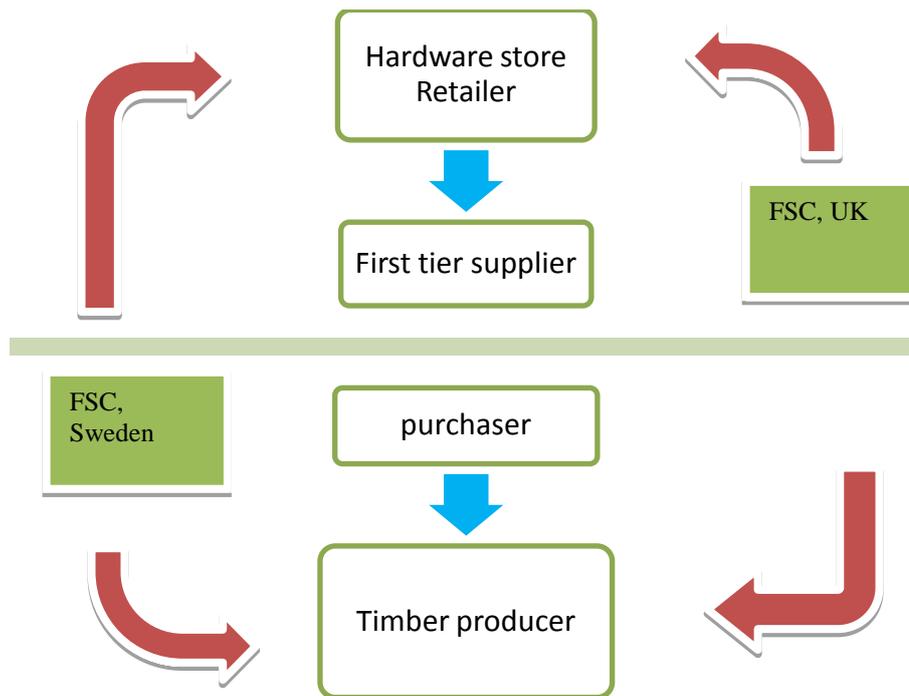
Figure 9 CSR flow within the chain, own source.

The blue arrows represent the normal flow of certification being driven back up the chain by the retailer. While, the red arrows are a representation of how the use of NGOs facilitate certification within the timber chain to circumvent the middle actors. This allows the interaction of individuals and NGOs to strengthen the CSR values. The fact that the individual upstream in the chain are less informed about CSR could be due to that fact that CSR and certification are still being marketed strongly as economic benefit to the producer, and that it is now perceived as a threshold for doing business and not a philosophy to aspire to. This in some way negates the fundamental core of CSR and creates CSR more as a tool for control than its true desired outcome. Although this may be a negative now the respondents indicated the responsiveness and acceptance of SD issues and the action through CSR and certification are growing without in the industry. *"I think in the long run they do as other companies get effect in a more deeper sense, so time is very important for this business"* (participant E, FSC Sweden). Indeed this creates a sense of hope for SD as it is about future perspective on how we should be living not how the industry is currently developed.

6 Discussion

The dynamics of the supply chain is ever changing as with most things in the business world and the timber industry is no different. Moreover, as companies control more and more of the world's resources the more they need to be responsible as there are high potential for manipulation (Klooters 2010). However, this study has shown that mangers' within the frame of this case study have all high working knowledge of Certification and can see the benefits for it. This gives a wealth of knowledge to the strategies within in the industry to understand that there work around CSR and other sustainability projects are working. That certification is now seen as a standard for doing business bring both positive and negative affects to the industry. Indeed, the challenges now for organisation are where to move from this as certification is threshold within the industry. Should the certification become harder and risk alienating some of its supports or should the organisation try to strengthen the values of CSR and SD which the research demonstrated that it is weaker further upstream within this case.

7 Conclusions

In this chapter I provide a summary of the findings derived from the comparison of empirical results and theoretical concepts discussed in chapter 2.

The purpose of this study was to investigate how sustainable business practices have developed throughout the timber value chain. The main emphasis was on CSR and the knowledge, attitudes, and behaviour of practitioners within a supply chain. Additionally, this study investigated if there was a unilateral understanding of CSR along the supply chain.

This case study has shown that while not all the respondents were entirely aware of CSR there was still a positive perception to its benefits among all the respondents, in fact all respondents felt that the benefit conducting CSR outweigh its cost. This was reiterated by the fact that the managers working within the supply chain have a high working knowledge of certification within the industry. This is true for all respondents irrespective of their organisation position within the chain. This brings about an interesting point as Li N, & Toppinen, (2011) said a strategy is doomed to fail unless there are individuals behind that believe in it. This case has shown that managers' throughout the chain are encouraging CSR and certification. Moreover, armed with this information the timber industry can move forward and formulate a strategy for expanding CSR, also to strengthen values throughout the industry. Indeed, this must be done if CSR and certification is to be seen as something to adhere to more than a simple tool by the focal company to control the supply chain at a distance.

However, some respondent were happy that the focal company was stepping forward to lead and accomplish some good. This is in line with Li N, & Toppinen's (2011) assertion that if a company fails to use its social power then it will lose it. Furthermore, as the retailers are driven to lower their own environmental and social footprint their message of CSR starts to spread throughout the chain. This interconnection can have a greater impact than just one company alone which increases the significances and impact with the timber industry. However, this case study found that there is no unilateral adaptation of CSR and its values, as each individual held a different believe around how to implement these values within their own organisation context. Although, with the adoption of certification throughout the supply chain there appears to be a determination within timber industry that it is doing something to improve not only its image but the environment for the better. This standardisation of products and quality is having a profound effect on the industry giving managers tools to standardise responses to environmental and social issues and in a way distributing the risk

throughout the chain. Furthermore, certification as a tool for CSR is being spread along the chain by the actors within the chain; the negative side effect of this is that the chain is relying heavily on an economic argument to push the CSR values back upstream. It must be noted at this point it is not the author's task to argue for or against the need to engage CSR upstream, but to simply illustrate how the message is being communicated and addressed. These damaging effects are that the values are not fallowing the guidelines as quickly back up the chain and have created a redundancy that NGOs have started to fill. Indeed NGOs importance have been greatly understated by the chain, mostly as the specification illustrate how an individual or a company should behave the values of why are unfortunately left up to the NGOs to reintroduced them as shown in figure 9. This provides the NGOs with large influence within the timber chain far beyond authoring, and this allow them to shape the direction and what and how the chain makes and what the retail is demanding from the supply chain.

The overall benefit this knowledge bring to the timber chain shows how far the certification has become part of the whole timber chain, it's currently understood as a threshold or prerequisite for doing business. That can be supportive when organisation wish to create or studying information flow for strategy along the timber chain.

6.1 Future studies

In this section the author will suggest areas of future studies. One of the great strengths of a study is the areas in which it can identify for further research. Due to the fact that there were limited time and resources available it meant that a number of interesting factor have to be omitted. As this research is qualitative it would be interesting to see if there were similar results from a quantitative study with more in-depth understanding of the timber industry. Additionally, this research has brought up numerous questions in need of further investigation, it was felt due to the power relationship the NGOs share within the supply chain it would be an interesting factor to investigate and see how this affect the timber supply chain along a specific supply chain.

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Appendix 1: Examples of legislative, judicial and executive value chain governance

Appendix 1; Examples of legislative, judicial and executive value chain governance.

Table 1	Exercised by parties internal to chain	Exercised by parties external to chain
Legislative governance	Setting standards for suppliers in relation to on-time deliveries, frequency of deliveries and quality	Environmental standards Child labour standards
Judicial governance	Monitoring the performance of suppliers in meeting these standards Monitoring of labour standards by NGOs	Specialised firms monitoring conformance to ISO standards
Executive governance	Supply chain management assisting suppliers to meet these standards Producer associations assisting members to meet these standards	Specialised service providers Government industrial policy support

Appendix 2: Interview questions

Interview questions; sustainable development (SD) corporate social responsibility (CSR).

<u>Personal information.</u>
- How long have you worked with the …..
- What is your job description?

<u>General information.</u>
- What is your perception of CSR?
- What are the positive and negative effects of certification?
- Do you believe certification is working?
- If you could give an example where it might have failed in the past?

<u>Communication of CSR</u>
- How, and with whom would you communicate the most in the supply chain (i.e. NGOs, purchasers)?

- In your opinion from the three main actors in the NGOs, purchasers, and suppliers whose job is it to communicate to the end user?

- In your opinion does certification help improve trust with purchasers?

<u>Interaction, timber, and certification.</u>

- From your point of view who benefits most for CSR?

- Do you feel that CSR from the focal company has an effect on the other companies' "organisations culture" along the supply chain, if so how much?
- Do you feel that purchasers use certification to control their supply chain and is it a negative or positive?

<u>Education</u>
- Do you have any formal training with CSR or SD,
- What are you feelings around formal education?
- How are you and your organisation addressing the changing legal requirements around CSR?

<u>Future</u>
- From your perspective, in which direction do you see CSR developing in the next five years and beyond?

- Finally do you see CSR values becoming more integrated into the supply chain and how?

Appendix 3: test questions

Preliminary draft, question for interview,

1. Would you say you have a high understanding of SBD, or CSR?

2. What is your perception of CSR?

3. From your perspective what are the benefits effects of CSR?

4. From your perspective what are the negative effects of CSR?

5. How often would you come in contact with CSR?

6. In your opinion, how would you rate the importance of environmental and social issues?

7. Would you make a pro-environmental decision over an economic one?

8. Have you had any formal training with CSR or SBD?

9. -What are your views on formal training on CSR or SBD?

10. Do you feel that formal training is need?

11. From your perspective, in which direction do you see CSR developing in the next five years?

12. From your perspective, what are the best characteristics to have when dealing with CSR?

13. Would you say, you have high or low understand of legal requirements when it comes to environmental issues?

14. How many times in the past year do you feel that you have gone above these requirements?

15. Can you give an example of how CSR has affected you in the past?

16. From your view who benefits most for CSR?

17. How often to your knowledge would you communication CSR external actors (suppliers, consumers, media, etc.)?

18. From your perspective, what advantages do you see CSR having for your organisation?

19. Do you feel your organisation supports individuals with social and environmental?

20. How aware of certification or "green labelled" timber are you?

21. Why did you choose to work with CSR problems?

22. Could you give your opinion on certified timber?

23. Do you believe certification is working?

24. If you could give an example where it might have failed in the past?

25. Who should pay for the certification?

26. In your opinion does certification help improve trust with suppliers?

27. Do you think companies trust NGOs that conduct the auditing, more than there supplier?