Economic Governance and Social Capital
A Case Study of Ghana's Cocoa Industry

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A Case Study of Ghana’s Cocoa Industry

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# Table of Contents

Acknowledgements ........................................................................................................... 7

Abstract.............................................................................................................................. 8

Chapter 1 – Introduction ..................................................................................................... 9

1.1 Research Objective....................................................................................................... 12

1.2 Research Questions ..................................................................................................... 14

1.3 Contribution to the Literature .................................................................................... 15

1.4 Overview of the Thesis ............................................................................................... 17

Chapter 2 – Literature Review .......................................................................................... 20

2.1 Governance.................................................................................................................. 20

2.1.1 Defining Governance .............................................................................................. 20

2.1.2 Governance of Economic Activity ......................................................................... 22

2.1.3 Governance of Industries ....................................................................................... 25

2.2 ‘Strategic Failure’ in Governance .............................................................................. 29

2.2.1 Firms Governance .................................................................................................. 32

2.2.2 Governance of Transnationals .............................................................................. 35

2.2.3 Governments & Strategic Failure .......................................................................... 37

2.3 Participation in Governance ....................................................................................... 40

2.3.1 Motivations for Participation ................................................................................. 44

2.3.2 Social Relations ..................................................................................................... 46

2.3.3 Logics of Membership & Influence ...................................................................... 47

2.3.4 Democracy & Participation ................................................................................... 49

2.3.5 Decentralising Governance ................................................................................. 51

2.4 Social Capital .............................................................................................................. 57

2.4.1 Introducing Social Capital .................................................................................... 57

2.4.2 Social Capital as Information, Influence & Solidarity .......................................... 58

2.4.3 Types of Social Capital ......................................................................................... 62

2.4.4 Consequences of Social Capital .......................................................................... 73

2.4.5 Social Capital and Good Governance .................................................................. 77

2.4.6 Social Capital & Governance of Global Value Chains ......................................... 79

2.5 Conclusion to Literature Review ................................................................................ 81
## Chapter 3 – Methodology

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>3.1 Introduction</td>
<td>83</td>
</tr>
<tr>
<td>3.2 Research Instruments</td>
<td>84</td>
</tr>
<tr>
<td>3.3 Case Study Research</td>
<td>84</td>
</tr>
<tr>
<td>3.4 Survey Research</td>
<td>88</td>
</tr>
<tr>
<td>3.5 Issues of Ethical Consideration</td>
<td>91</td>
</tr>
<tr>
<td>3.6 Pilot Study – Yamfo in the Brong Ahafo Region of Ghana</td>
<td>92</td>
</tr>
<tr>
<td>3.7 Data Collection</td>
<td>93</td>
</tr>
<tr>
<td><strong>3.8 Variables &amp; Questions</strong></td>
<td>97</td>
</tr>
<tr>
<td>3.8.1 Variables for Case Study</td>
<td>97</td>
</tr>
<tr>
<td>3.8.2 Variables for Survey</td>
<td>99</td>
</tr>
<tr>
<td>3.9 Data Analysis Process</td>
<td>103</td>
</tr>
</tbody>
</table>

## Chapter 4 – Ghana’s Cocoa Industry: A Case Study

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>4.1 Introduction</td>
<td>105</td>
</tr>
<tr>
<td>4.2 Cocoa &amp; the Global Value Chain</td>
<td>108</td>
</tr>
<tr>
<td>4.3 Ghana’s Cocoa Sector &amp; COCOBOD</td>
<td>111</td>
</tr>
<tr>
<td>4.4 Participants in Ghana’s Cocoa Industry; Cocoa Farmers &amp; Licensed Buying Companies</td>
<td>116</td>
</tr>
<tr>
<td>4.5 Interviews on the State of the Industry</td>
<td>121</td>
</tr>
<tr>
<td>4.6 Interviews on the Social Capital in the Industry</td>
<td>123</td>
</tr>
<tr>
<td>4.7 Interviews on the Perceptions of COCOBOD’s Governance</td>
<td>124</td>
</tr>
<tr>
<td>4.8 Issues of ‘Strategic Failure’ in Ghana’s Cocoa Industry</td>
<td>126</td>
</tr>
<tr>
<td>4.8.1 Pricing as a Strategic Decision</td>
<td>128</td>
</tr>
<tr>
<td>4.8.2 The Dominance of Transnationals</td>
<td>131</td>
</tr>
<tr>
<td>4.9 Conclusion</td>
<td>133</td>
</tr>
</tbody>
</table>

## Chapter 5 – Perceptions of Governance and Social Capital in Ghana’s Cocoa Industry

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>5.1 Introduction</td>
<td>135</td>
</tr>
<tr>
<td>5.2 Recent Empirical Work on Governance and Social Capital</td>
<td>137</td>
</tr>
<tr>
<td>5.3 Research Methodology</td>
<td>139</td>
</tr>
<tr>
<td>5.4 Ghana’s Cocoa Industry</td>
<td>139</td>
</tr>
<tr>
<td>5.4.1 Social Capital and Governance in Ghanaian cocoa farming</td>
<td>139</td>
</tr>
</tbody>
</table>
5.4.2 Perceptions of Governance ................................................................. 142
5.5 Quantitative Analysis ............................................................................. 144
  5.5.1 Econometric Specification and Variable Construction ....................... 144
  5.5.2 Descriptive Statistics ........................................................................ 150
  5.5.3 Results and Discussion .................................................................... 151
5.6 Conclusion ............................................................................................. 156

Chapter 6 – Farmers’ Welfare & Inequalities in Social Capital in Ghana’s Cocoa Industry ................................................................. 158
  6.1 Introduction .......................................................................................... 158
  6.2 Levels (Types) of Social Capital ............................................................ 161
  6.3 Social Capital & Welfare ...................................................................... 166
  6.4 Levels (Types) of Social Relationships in Ghana’s Cocoa Industry ......... 171
  6.5 Empirical Study ................................................................................... 178
    6.5.1 Analysis of Means ......................................................................... 181
  6.6 Conclusion ............................................................................................. 193

Chapter 7 – Participation in Ghana’s Cocoa Cottages ................................ 195
  7.1 Introduction .......................................................................................... 195
  7.2 Farmers’ Participation in Ghana’s Cocoa Cottages ............................... 197
  7.3 Econometric Specification & Variable Construction ............................ 201
    7.3.1 Model Specification ....................................................................... 201
    7.3.2 Construction of Variables ............................................................... 206
    7.3.3 Descriptive Statistics ....................................................................... 209
  7.4 Results & Discussions .......................................................................... 209
    7.4.1 Descriptive Analysis ....................................................................... 209
    7.4.2 Regression Results .......................................................................... 210
  7.5 Conclusion ............................................................................................. 214

Chapter 8 – Conclusion ............................................................................. 216
  8.1 Summary ............................................................................................... 216
  8.2 Conclusions ........................................................................................... 217
    8.2.1 Social Capital, Good Governance & Strategic Failure ..................... 217
    8.2.2 Inequality in Social capital ............................................................... 219
8.2.3 Motivations for Participation ................................................................. 220
8.2.4 Unique Contributions to the Literature ................................................... 221
8.3 Limitations of the Study & Future Research ............................................... 223
References/Bibliography ............................................................................... 227
Appendices ..................................................................................................... 254

Information Sheet for Interviews .................................................................... 257
Survey Questionnaire for Farmers .................................................................... 260

List of Tables

Table 1  Structure of Thesis ........................................................................ 14
Table 2  Motivational Categories for Altruistic Social Engagements ............ 45
Table 3  Five Misunderstandings of the Case Study Methodology .............. 86
Table 4  Indicators for Case Study Research ............................................... 98
Table 5  Descriptive Statistics on Respondent Farmers .............................. 103
Table 6  Ghana’s Cocoa Regions .................................................................... 106
Table 7  Global Production of Cocoa Beans (‘000 tonnes) .......................... 108
Table 8  Descriptive Statistics – Cronbach’s Alpha and Bivariate Correlations (to two decimal places) ........................................ 150
Table 9  Multivariate Analysis: Dependent Variable – Governance of COCOBOD ................................................................. 151
Table 10 Types of Farmers’ Social Relationships in Ghana’s Cocoa Industry 171
Table 11 Social Capital Variables & Items .................................................... 179
Table 12 Social Relations with other Farmers (Analysis of Means – By Regions) 182
Table 13  Social Relations with COCOBOD (Analysis of Means – By Regions)  183
Table 14  Social Relations with Licensed Buying Companies (Analysis of Means – By Regions)  185
Table 15  Social Relations with other Farmers, COCOBOD & LBCs (Analysis of Means–Wealthy Regions by Revenues)  187
Table 16  Social Relations with other Farmers, COCOBOD & LBCs (Analysis of Means–Poorer Regions by Revenues)  189
Table 17  Variable & Question Items Used for Regression  203
Table 18  Bivariate Correlations (to two decimal places)  209
Table 19  Dependent Variable: Participation in Associations Activities  210

List of Figures

Figure 1  A Ladder of Citizen’s Participation  42
Figure 2  Four ‘Strength’ Levels of Social Capital  70
Figure 3  Governance of Ghana’s Cocoa Industry  119
Figure 4  Analysis of Social Capital  164
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Abstract

Traditional analysis of governance has focused mainly on the problems of ‘collective action’ among industry participants (Boix & Posner, 1998). However, as pointed out in the literature on ‘Strategic Choice’ there is also the tendency to ignore the wills, aspirations and voices of a majority of participants in formulating governance policies resulting in a state of ‘strategic failure’ and governance structures that are hierarchical in nature (Cowling & Sugden, 1998). However, apart from the top-down relationships that could emerge between participants in such industrial settings, there are also varying social connections that may exist in such industries and these social engagements are known to help build governance structures that are less hierarchical and more involved (Putnam, 1993). These issues of hierarchy in governance and the social capital that is present within industries form the basis for this thesis. We make use of original interview and questionnaire data from major participants in the cocoa industry of Ghana – including 300 cocoa farmers – to test the hypothesis that social capital can act as a counter or form of ‘shield’ for bottom-of-the pyramid participants against the adverse consequences of the concentration of power and decision making in the hands of a few people at the top of a hierarchical governance structure.

Our results confirm a positive relationship existing between social capital and perceptions of good governance. However, social capital and governance perceptions differ significantly between the poor and the rich undermining the importance of the social relations of the poorest participants in improving their engagement and welfare in the industry. More effective associations can however, improve such participation and industry bodies should act as conduits for facilitating wider stakeholder participation, enhancing social capital and shared values, and fostering consensus for socio-economic development.
Chapter 1 – Introduction

Ghana has a reputation for producing some of the best cocoa in the world, and Ghanaian cocoa is used globally by companies such as UK’s Cadbury to manufacture internationally renowned chocolate brands (See Kolavalli & Vigneri, 2011, Gilbert, 2009). According to Kolavalli & Vigneri (2011) over 90 percent of the cocoa produced in Ghana is of grade 1 quality, while Gilbert (2009) has suggested that Ghana’s cocoa attracts a premium of 3 to 5 percent relative to that from Côte d’Ivoire, which is currently the world’s largest producer of cocoa. Ghana is also the world’s second largest exporter of cocoa, with the sector accounting for 30% of Ghana’s exports and 8% of the country’s Gross Domestic Product (See Asante-Poku & Angelucci, 2013). For Ghana therefore, cocoa is a successful billion dollar industry that provides significant tax revenues to the government¹, and employs more than 400,000 families and 1 million people (See Baah, 2008, Viguen, 2007, Teal et.al., 2006).

This successful example of an industrial governance structure is one that is dominated by a government regulator, the Ghana Cocoa Board (COCOBOD) which acts as the sole legal buyer of all of the cocoa produced by Ghana’s farmers (See Fold, 2002). This government interventionism structure, unlike many other such regulator boards set up in West Africa during the colonial era, has developed over the years into an effective industrial system for producing Ghana’s high quality cocoa and providing an assured market for the cocoa farmers.

However, this industrial governance system also has a tendency to be hierarchical in nature which has resulted in a situation where a majority of the industry players, particularly the peasant farmers and the Licensed Buying Companies (LBCs) being seemingly divorced from the strategic

¹ About $60 million for 2014 according to the Government of Ghana Budget Statement, 2014
governance processes that directly influence their livelihoods. For instance, the governance decisions that determine the overall course of the industry, and hence the well-being of all of those connected with it are exclusively taken by the individuals and institutions that control COCOBOD (See Asante-Poku & Angelucci, 2013, Fold, 2002, Santos & Vigneri, 2007, Cowling & Sugden, 1998). Such lack of transparency and ‘external’ formulation of policy that does not involve a significant proportion of the participants has a tendency to ignore the wills, aspirations, and voices of many of those with an interest in the sector. This is the point made in Cowling & Sugden (1998), that the lack of openness and broad participation in governance processes result in severe constraints for bottom-of-the-pyramid participants to make their own livelihoods and improve their circumstance without depending on the decisions of ‘benefactors’ who do not always act in their (low-level participants) interest.

This concentration of decision-making power in the hands of a powerful government regulator and it’s sometimes (negative) consequences for the governance of an industry and the fortunes of the industry participants form the foundation for this thesis. We seek to understand how Ghana’s cocoa industry is governed, the consequences of its governance structure in regulating the farmers and Licensed Buying Companies (LBCs) that operate in the industry and the factors that can help improve its governance framework.

The thesis will therefore begin with an analysis of economic governance issues in an industry and the discussions in the literature about the concept of ‘strategic decision making’. Strategic decision making is the processes and associated structures for identifying and making strategic choices for

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2 We do not discount the fact that COCOBOD’s role in Ghana’s cocoa sector has been largely beneficial to Ghana’s cocoa farmers (see Williams, 2009) but the constraining nature of its hierarchical governance structuring and the tendency for farmers fortunes to be dependent on COCOBOD’s magnanimity form the basis for our arguments of a system which has resulted in a non-participative strategic role for the farmers in the industry and how this impacts on the industry governance in general and also farmers’ welfare.
a firm or industry (Bailey et. al, 2006). As identified in the Strategic Choice Framework (SCF) literature, there is a tendency for such decisions to be the preserve of elites who are able to impose their will on the industry, sometimes against the will and interest of a majority of the participants. Such ‘external’ formulation of governance policy results in a state of failure of participation described by the literature as ‘strategic failure’.

The thesis however, introduces another governance element – social capital. Governance structures are made up of networks, associations and connections (Adler & Kwon, 2002, Putnam 1993a, Pildes, 1996, Hyden, 1997). As Granovetter (1985) has indicated, both market and hierarchical governance structures are typically embedded in social relations and these social connections are important in determining the governance structures that emerge. Social capital is therefore an important issue for this thesis as it is related to our focus on the participation of all persons with an interest in an industry, and at the same time our concerns about the need for the improvement of the outcomes of governance structures within hierarchies. For example, as noted in Adler & Kwon (2002) there are important consequences of social capital which are relevant to our theme of participation in governance. These could be simply summarised as information, influence and solidarity. Social capital broadens the information source for the participant in an industry while improving the relevance, quality and timeliness of the information. Social capital also provides the participant with greater power to get things done and to achieve their goals. Thirdly, social capital encourages solidarity and compliance with the rules, beliefs and norms of the governance system; reducing the need for formal agreements and engendering trust. Fidrmuc & Gerxhani (2005) have also argued that a high stock of social capital increases a participant’s ability and willingness to cooperate, improves monitoring and enforcement of contracts and results in less information asymmetry within governance structures.
These qualities of social capital as enumerated above relate quite well with the SCF literature which focuses on the role of participants in governance structures and the tendency for the concentration of strategic decision-making power within most industrial governance structures. Bailey (2003a), for example, relates information flow to hierarchical governance. He argues that if participants in any hierarchical system are going to be more involved in strategic decision making, they will first need to have information and knowledge to understand the range of choices available to them. Sacchetti & Sugden (2007) emphasize the role of power or influence in decision-making. They note that the more ‘space’ a participant has, the more he feels in control of his own creativity and destiny and therefore the more productive he or she will be within the organisational structure. Generating participation and trust among the industry participants is also advocated in Branston et al. (2006a) as important to mitigate the effects of hierarchical organisation. The above analyses now lead us to state the research objective and questions for this thesis in the next segments.

1.1 Research Objective

From the above discussions, is it therefore possible to argue that the social capital present in hierarchical governance forms could impact positively on the (negative) consequences of such hierarchical organisational structures? To put it in another way: do, for example, the increased information flows, more influence and enhanced feelings of solidarity that one can get from engaging in social relations help to make a participant in an industrial hierarchical structure more resilient – *acting as a shield* – to the adverse effects of the strategic policy decision-making by a
few individuals for the many as is found in most industries that are controlled by government regulators or large transnational firms?

This is the main question that the thesis examines, under sub-themes (discussed in detail in Chapters 5-7), and in the context of a government-regulated industry in a developing country in Africa – Ghana’s cocoa sector. As indicated above, the cocoa industry in Ghana is an interesting case study as it remains the only agricultural industry in West Africa run by a state regulating board. At the same time, this industry is the archetype of the typical global commodities industry structure with huge transnationals at the top and a myriad of peasant farmers in places like Africa and Asia. This case of government interventionism has also been a ‘success’ with Ghana producing some of the highest quality cocoa in the world at an annual turnover of almost two billion dollars. However, despite the relative excellence of the industry, participants in the sector including farmers and the buying firms are seemingly removed from the strategic decisions that influence their livelihoods. These policies are mostly taken within the government bureaucratic behemoth – the Ghana Cocoa Board (COCOBOD). As well as the overall structure of organisation in the sector, there are also a number of social connections, groupings and interactions among the farmers and with the industry regulator and buying companies.

This background provides this thesis with a real opportunity to look at a hitherto unexplored relationship between the social capital that is generated among the participants in Ghana’s cocoa sector and the consequences of hierarchical industrial governance structures. Consequently, we have made use of interview and questionnaire data from the major participants in the cocoa industry of Ghana including the industry regulator – COCOBOD and farmers in all its six cocoa growing regions to test the major hypothesis as noted above that social capital acts as a form of ‘shield’ for bottom-of-the pyramid participants against the adverse consequences of the
concentration of power and decision making in the hands of a few people at the top of a hierarchical governance structure.

1.2 Research Questions

The main research objective is analysed under a number of sub-questions. These are discussed in Chapters 4 – 7 below and are stated below and presented in a schematic form in Table 1 below;

- What is the strategic decision making process within Ghana’s cocoa industry and how does this impact on the fortunes of farmers?
- What are the different forms (or types & levels) of social capital and what varying impacts, if any, do they have on good governance and the fortunes of industry participants?
- What is the relationship between social capital and welfare of Ghana’s cocoa farmers?
- Are there significant differences between the social capital of rich farmers and poorer farmers?
- What are the motivations for individual participation in industry associations?
- Which is more important for improving participation – is it the ‘thinking’ or the ‘actions’ of the individual participant?

Table 1: Structure of Thesis

<table>
<thead>
<tr>
<th>Main Chapters</th>
<th>Key Thematic Areas Covered</th>
<th>Main Contribution to the Thesis</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chapter 2 – Literature Review</td>
<td>Definition of Governance, Rationale for Economic Governance, Strategic Failure in Governance, Participation, Motivations for Participation, Social Capital, Types of Social capital</td>
<td>Establishes the problem of ‘strategic failure’ in governance and introduces participatory governance and social capital as potential solutions to the negative</td>
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1.3 Contribution to the Literature

This is not the first study in the literature that has focused on the impacts of social capital on governance (See Putnam, 1993a; Becattini, 1979; Becattini et. al., 2009, De Propis & Lazzeretti, 2007; Cusack, 1999; Rice, 2001; Coffe & Geys, 2005); however, it does make unique contributions to the current literature on the specific area of how social capital can impact on governance and these are summed up in four points:
1. The application of the issues of governance and social capital to Ghana’s cocoa industry is unique as most earlier empirical research into the linkages between governance and social capital have focused on developed countries (see Putnam, 1993a, Becattini, 1979 on Italian regions; Cusack, 1999 on German local governments; Rice, 2001 on communities in Iowa; Coffe & Gey, 2005 on Flemish Municipalities). The focus of this study on a developing country context has significant theoretical implications for better understanding governance issues for the developing and emerging world as opposed to the much more established views on governance structure types in the developed world.

2. In addressing the relationships between social capital and governance, this thesis focuses on regional level governance and highlights the impacts that different social structures at the decentralised level have on governance in these different localities. This is an important enhancement of the literature on governance and social capital by bringing forth the value of decentralisation in improving the impact of social capital on governance (highlighted in earlier works such as Cusack, 1999 on 30 German local governments; Rice, 2001 on 114 municipal government in Iowa; Coffe & Geys, 2005 on 305 municipalities in Belgium).

3. A further contribution to the literature on social capital made by this thesis is to examine social capital in its separate elements or dimensions; i.e. weak as against strong social capital, individuals’ participation, horizontal social capital and vertical social capital (See Granovetter, 1973, Tsai & Ghosal, 1998). The literature that addresses the issues of social capital and governance, in particular, has tended to bunch these social elements together in doing empirical work on the topic (See Coffe & Geys, 2005; Reimer et.al., 2008). However, disintegrating various elements of social capital and examining their individual impacts on governance and other
phenomena would serve to enrich the analysis in this literature strand and enhances any conclusions that are drawn from the research.

4. Finally and importantly, the literature that addresses the issues of governance and social capital has typically come from the view-point of solving collective action problems in governance (See Boix & Posner, 1998; Knack, 2002; Coffe & Geys, 2005). This research, however, tackles the problems of governance from the view-point of a lack of participation in governance by the governed and the concept of ‘strategic failure’ where the hierarchical structuring of most industrial governance forms results in a situation where the strategic decisions or policies that are made do not take into account the interests and views of a majority of the industry players or participants (Cowling & Sugden, 1998). The research adds to the body of literature by theorising that there are specific attributes of social capital that can address this possible governance problem arising from hierarchical industrial structures and demonstrates this with an empirical study of Ghana’s cocoa industry.

1.4 Overview of the Thesis

The rest of this thesis is organised as follows. In chapter two there is an analysis of relevant literature on governance, strategic failure, nature of participation and social capital. Economic governance is defined as the roles governments, transnationals and firms play in specific industries within a country. Governance policies are usually set up to tackle market failures and the problems of underdevelopment and inequality. However, setting up such policies properly is a difficult business as governments do not necessarily have sufficient market information and are not likely to be able to pick winners. The argument put forward however, is that governments, especially in
the developing world, do have a role to play in their economies and care must be taken in designing good policies that give them a fair chance of success.

Along the lines of successful or ‘good’ governance, we introduce the concept of making these interventions a strategic success rather than a ‘strategic failure’. Strategic failure here means the ignoring of the views of a majority of industry participants in formulating the policies that will impact their lives and their livelihoods. This way of organising economic activity results in poor governance structures, inequalities, poverty and underdevelopment among other things as are discussed through the literature on economic governance, theory of the firm, theory of transnational activities and the strategic choice framework. Here, we emphasise the prevalence of hierarchical organisation in all forms of governance structures whether for firms, governments or transnational companies.

A discussion on participation follows with a note on democracy and, in our view, the inability of the popular notion of ‘democracy’ to resolve the problems identified with a lack of participation by the players in a hierarchical governance structure. We also turn to the issues of decentralised governance structures and analyse how these new levels of governance could be an important way of improving local participation and hence overcoming the challenges of hierarchy while building more effective governance structures. We then focus on the literature on social capital looking at the different applications, types and consequences to be derived from social organisation. The segment highlights the identified elements of social capital; that is information, influence and solidarity.

The methodology segment, in chapter three then discusses the research instruments used for both the statistical and qualitative analysis aspect of the research and the underlying theoretical reasons
why the chosen methods are well suited for the research. It goes on to identify the variables used in the survey questionnaire and the items that make up these variables. The findings from the pilot study to Yamfo, a cocoa farming community in the Brong Ahafo region of Ghana was very important in finalising the research design and this is also discussed.

Chapter four provides an overview from the literature and the interviewers’ observations during the field trips on Ghana’s cocoa sector, the global value chain and the major participants in the industry; COCOBOD, farmers and the Licensed Buying Companies.

Chapter five to seven are based on the findings from the interviews and survey data in relation to the various issues raised by our review of the literature on the relations between social capital and governance of hierarchical structures. The fifth chapter presents the findings for the main question of the thesis; that is the impact of social capital on the farmers’ perceptions of the regional governance structures in Ghana’s cocoa industry using both a qualitative as well as an empirical study. The conclusions drawn from the above treatise introduces our next question: are there inequalities in the social capital of the richer as against the poorer cocoa growing regions and farmers? This is the subject of chapter six which highlights the impact of such differences in social capital on the welfare of the farmers in Ghana’s cocoa industry. Finally, chapter seven discusses the motivations for farmers in engaging in the industry’s social activities as such participation is important for good governance and improved socio-economic outcomes.

The thesis then concludes with a summary in chapter eight which also details the personal motivations for undertaking this research as well as a reflection on the key findings of the thesis and the areas for future research.
Chapter 2 – Literature Review

2.1 Governance

2.1.1 Defining Governance

It is important to begin the review of the literature with a definition of governance and here it is worth noting that it is widely recognised that governance is actually a multi-faceted concept existing at various levels: national, regional and local rather than a one-dimensional term (we discuss governance at the decentralized levels in a later segment). In attempting to define governance generally however, a useful starting point is the United Nations Development Programme (UNDP, 1997, p.2) which views it as ‘comprising the complex mechanisms, processes and institutions through which actors articulate their interests, mediate their differences and exercise their legal rights and obligations’. This is an encompassing perspective, but one which primarily emphasises the governance of socio-economic interaction(s) both between actors and also their relations with institutions. Following Le Gales & Voelzkow (2001) these main institutions can be identified as the market, firms, the state, networks and communities/associations of shared interests (such as business consortia or trade unions). These separate (and related) institutions are considered as the main facets of contemporary governance systems (ibid, p. 6-7).

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3 A narrower (and more macro orientated) definition is provided by Kaufmann et.al (1999, p.1), who define governance being the ‘traditions and institutions by which authority in a country is exercised’. Their focus is very much upon the nation state, particularly the processes by which ‘governments are selected, monitored and replaced’, and the ability of government(s) ‘to formulate and implement sound policies’ and finally ‘the respect of citizens and the state for the institutions that govern economic and social interactions’. However, the overwhelming majority of socio-economic relations are governed below the nation state, at both the meso and micro levels and thus the UNDP definition is important for our analysis at the regional levels of governance.
Now, there has been significant interest in the notion of ‘good governance’ in recent years, with a number of studies suggesting ‘good governance’ is positively associated with improved (institutional) performance and delivering better ‘socio-economic’ outcomes. For instance, at the macro level, Kaufman et.al’s (1999a, 2007) study of 178 nations for the World Bank found that several (perception based) dimensions of governance were positively correlated with GDP per capita, with the authors concluding better governance is thus essential for ensuring economic growth. At the regional level, Putnam’s (1993a) research suggested good governance in the Northern and Central regions of Italy resulted in better delivery of public services and general social well-being as compared to the South of Italy, where governance structures were ineffective due to a lack of social cohesion and organisation. These (Northern and Central) regions also experienced much wider socio-economic success, and again this has, in part, been, attributed to their (relatively diffuse and open) socio-economic governance structures (see Beccattini, 1990). Such studies inform the policy debate, with ‘good governance’ now becoming an important criterion in the allocation of international aid (see Knoll & Zloczysti, 2012).

In light of the above it is possible to relate what constitutes ‘good’ (and therefore ‘bad’) governance to issues of participation within industrial structures. For example, within the UNDP (1997) definition, there is the inference ‘good governance’ processes involve participation (of stakeholders) in decision-making, transparency and accountability, while ensuring ‘legitimacy’ by promoting respect for law(s). In addition, ‘good governance’ is seen to be effective (and efficient) in the use of resources. All these facets are regarded as a positive function of ‘good governance’ (see also Robledo et.al, 2008). Similarly, the World Bank Institute (2006) assess ‘good governance’ largely in terms of ‘voice and accountability’, ‘the control of corruption’, ‘effectiveness in delivery (of services)’, ‘legitimacy’ and the ‘quality of administration’. ‘Good
governance’ is therefore essentially a responsibility by the governor to the governed to provide an inclusive platform that delivers on the promised services of the organisational structure and it is this view of a participatory and at the same time effective approach to governance that is adopted by this research in analysing the issues presented.

The next segment of the review of literature now focuses particularly on the governance of economic activity as treated in the literature under the economic theories of organisation or simply economic organisation in order to lay the foundations for discussing the concept of ‘Strategic Decision Making’. For example, according to Perrow (1986), economic organisation is about the different forms of organising economic activity, including their impact on specific industries and the economy as a whole (also see Selznick, 1948). The issue is why the need for a form of economic governance? “Why do economic agents in real economic contexts tend to arrange themselves hierarchically and coordinate their decisions via central authority rather than relying upon voluntary exchange and the automatic coordination provided by the market?” (Moe, 1984; p.742). What makes these necessary?

2.1.2 Governance of Economic Activity

According to Cowling & Tomlinson (2011), economic governance is important for development because it defines the power structures and decision-making process of a set of actors on key economic variables. Perrow (1986) also identifies reasons, theoretically, why such governance is important in two related bodies of theory in economics – agency theory and transactions cost theory. The theories of agency and transactions cost are also in line with Moe (1984) which identifies one element of economic organisation as the nurture of contractual relationships among economic actors.
Agency theory is concerned with the resolution of the problems that occur in agency relationships. The first is the agency problem that arises when the goals of the principal and agent conflict, and when it is difficult or expensive for the principal to verify what the agent is actually doing. The second is the problem that arises when the principal and agent have different attitudes toward risk. Governance in an economy therefore has to deal with the unpredictability of persons acting on behalf of others and the need to control that situation. Transactions cost are also the costs associated with transactions due to human behavioural assumptions such as opportunism, moral hazard and adverse selection (Williamson, 1975). This is similar to agency theory in the sense that they both involve the notions of bounded rationality and uncertainty.

The problems of agency and transactions costs mean that the normal economy cannot work itself. It is even contradictory, for the most avowed ‘capitalist’, that in the most free market situations, a majority of economic activity is controlled within firms which are hierarchies rather than through simply the price mechanism or voluntary exchange. Coase (1937) notes this contradiction of the firm as a free market player. He has argued that in the firm, market transactions are eliminated and in place of the market structure with exchange transactions and the coordination of the price mechanism, there is ‘an entrepreneur co-ordinator who directs production’ (p, 388). He therefore describes firms as ‘islands of conscious power’ (p, 388). Coase’s argument is that because economic activity in a voluntary, ‘free market’ way is bedevilled with contractual costs, it gives rise to an organisational governance form in the firm. A firm will therefore tend to expand or internalise more transactions until the ‘costs of organising an extra transaction within the firm become equal to the costs of carrying out the same transaction by means of an exchange on the open market or the costs of organising in another firm’(Coase, 1937;p. 395). Firms are therefore
one way of exercising control or governance of economic activity, just as well as governments exercise industrial governance and we will discuss these further in later segments.

Countries, in formulating economic governance policies, are faced with the arguments of public versus private sector, market versus regulation, and in some cases, ideological stands such as capitalism versus socialism. It can be argued that over time these choices available to nation states have grown narrower as more and more globalisation has meant that governments that will like to be part of the global economy have to be more open and market-friendly. Typically however, governments still use the tools of policy to determine the structure of the industries that make up their economies.

To effectively implement these policies, they are usually institutionalised in a public structure or bureaucracy. This institution will then be responsible for supporting, organising and regulating activities in the industry. Examples of such structures are the well-known Ministry of International Trade & Industry (MITI) in Japan and the Ghana Cocoa Board (COCOBOD) which is the case study of this research. There are also instances where such institutions do not only act as facilitators and regulators but actively engage in the business of the industry; mostly as state monopolies. Examples of these include the Pohang Iron and Steel Company (POSCO) in South Korea, the Brazilian Embraer Aircraft Company and the Chilean technological firm Fundacion Chile.

It is worth noting here that one of the main arguments of this thesis is that whether economic activity is organised in a ‘free market’ by firms or through a government structure, the governance framework is usually hierarchical and centrally controlled and we discuss this extensively under the literature referred to as the ‘strategic choice’ framework. However, before the review of this framework it is important to appreciate more specifically the issues of governance at the industry
level and the rationale for a dichotomy in the literature between government-led governance and market-driven governance of industries as these are important in understanding the unique governance structure of Ghana’s cocoa industry under the COCOBOD.

2.1.3 Governance of Industries

We have in the preceding segment established the need for a form of economic governance and control within an industry. Governments recognise this and put in place various industrial policy measures to ensure the successes of a nation’s industries. A simple definition of industrial governance policy⁴ will therefore be government’s actions in regards to particular industries of their economy. In this regard, historically the debate on which action governments take has largely been between ‘governmental interventionism’ and ‘market equilibrium’. Government interventionism is where governments get involved in their national industries by actively supporting, regulating and sometimes participating in those industries. It is usually characterised by import substitution, state planning, and state ownership (Rodrik, 2004). Westphal (1990) states that government interventionism is about selective allocation of resources among industrial activities, taxes and subsidies. It also includes credit rationing, licensing and the creation of public enterprises. Pack & Saggi (2006) has identified various reasons why governments would choose an interventionism policy rather than allowing the market to dictate the industry. These include the presence of knowledge spillovers, the presence of coordination failures and informational externalities within industrial structures that are being dictated by market players. They also point

⁴ A definition of Industrial Policy in Cimoli et al. (2009, pp. 1–2) is as ‘comprising policies affecting “infant industry” support of various kinds, but also trade policies, science and technology policies, public procurement, policies affecting foreign direct investments, intellectual property rights, and the allocation of financial resources. Industrial policies, in this broad sense, come together with processes of “institutional engineering” shaping the very nature of the economic actors, the market mechanisms and rules under which they operate, and the boundaries between what is governed by market transactions, and what is not’.
to the infant industry argument which is based on the notion that governments must protect new local industries from the pressures of market forces, such as cheap imports that will compete with fledging domestic industries.

There are however, the arguments against government intervention beginning with the idea that governments cannot pick ‘winners’ and that there is a real probability that the industries it targets for intervention may not turn out to become successful and competitive industries (See Rodrik, 2004). Rodrik have argued in this vein that especially for developing countries like Ghana, there is usually the lack of a competent bureaucracy to render interventionism effective and as such policies are prone to political capture and corruption. He argues further that there is little evidence that industrial policy does actually work and rather advocates broad support for Research & Development (R&D) and intellectual protection laws for a country’s industries.

The notion of government interventionism is also contrary to the principle of ‘freedom’ under ‘market equilibrium’ where the industry is dictated by private players and the use of the price mechanism makes for a more competitive environment that helps create more successful industries. The ‘price mechanism’ describes the situation where market players such as individuals, firms and transnational firms transact business using ‘price’ as the coordinating mechanism for the industry. This forms the basis for the ‘market equilibrium’ aspect of industrial policy making.

These market oriented policies are concerned with private ownership, entrepreneurship and policies that are usually referred to as ‘free market economics’ and have been the dominant economic thought for most Western countries since the 1970s (Backhouse, 2005). In advocating for market-oriented policies Backhouse notes the views of the Western world that government
action is more likely to result in more fundamental problems than it solved, and therefore it has become important for governments to privatise nationalised industries, outsource its state functions to private contractors and deregulate the industries (Backhouse, 2005). Industries must be dominated by private firms and individual producers and the principles of demand and supply would be the ‘invisible hand’ that governs and directs industrial activities. In line with these arguments, the most important advantages of the free market policies that have been implemented in many Western economies for decades now, have been the injection of competition which has then resulted in increased profitability of business activities, greater efficiency and innovation (See Baumol, 2002).

The biggest arguments against the freeing of markets however, have been a tendency to create inequality in societies and its inappropriateness to deliver certain services to the public such as education and health. The latter argument about public services explains at least in part why Western economies that have most successfully embraced free market policies do also run a sort of mixed economy model when they combine the use of the market with regulations and government planning in order to exercise control of some sectors of their economies such as in health, education and security (See Kitson, 2005, Mazzucato, 2013).

In this segment, we have sought to distinguish between the traditional analysis of government interventionism and free market policies. It is however, important for this thesis that we also make a distinction at this stage between the ‘free market’ theory as discussed here and the ‘market’ as defined under transactional economics. The fundamental difference is that in the ‘free market’ concept, firms and transnational firms play a very dominant and in many ways an overwhelming role in the industry; whereas the purest ‘market’ is essentially about individual players trading based on the price mechanism. This argument is also found in the policy prescriptions of what has
come to be known as the ‘Washington Consensus’ (See Williamson, 1990) as to whether the concept of ‘free markets’ actually reflect the theory of a ‘market economy’ and the tendency for the ‘free’ in free markets to be equated with the notions of inclusive participation of stakeholders and the ‘freedom’ of all industry players to decide their own destinies. In this regard, in latter segments we will examine how the very presence of huge transnational firms in most ‘free market’ industries presents similar problems of hierarchy, power, command and control as identified in government interventionism, rather than the notions of freedom and participation that are usually associated with the ‘market’.

To conclude, industrial policy formulation is an important issue for most governments as the problems of underdevelopment and poverty bedevil much of the developing world. Despite the difficulties of formulating good industrial policies, there is reason for governments, especially in developing countries, to come up with the policies that directly target important segments of the economy. The most important focus of governance of industries for developing countries should be the promotion of exports as the examples of the East Asian countries have shown. Also, it is important that industrial policies are well institutionalised and care is taken not to make policy a captive of a few elite government officials or at the dictates of big transnational firms.

These issues of institutionalising industrial policy and the designing of such institutions raise very important questions. Of particular interest in this research is the issue of the participation by all stakeholders in the policy formulation and governance processes. The review of literature, in the next segment, looks now at the tendency by most industrial governance structures to ignore the voice of a majority of participants in constructing and implementing industrial governance policies.
2.2 ‘Strategic Failure’ in Governance

Industrial Policy analysis as discussed above has focused mainly on free market policies as against government interventionism. However, in whichever way governments act; policy making and in essence the governance of industries can essentially become a preserve of a few people deciding for the many. This is the key implication in the literature referred to as the ‘Strategic Choice Framework’ (See Cowling & Sugden, 1998). Under the Framework, the tendency to ignore the voices of industry participants or the ‘publics’ in governance was identified, resulting in a state of ‘strategic failure’.

Dewey’s (1927) seminal work in political and social philosophy had made the point that governance is about making strategic choices that have significant consequences for two categories of people: private interests, those who are directly engaged in the action as well as public interests, those not directly engaged. The later set of people are those with an interest in an industry’s economic development and who might have a view on development aims and therefore ultimately its governance but however, tend to have little or no effective voice. This would include those who currently live in the region, as well as those who might live there in the future. Also, those for whom the development in and around the region would likely impact on, and be impacted by can be referred to as the ‘publics’ (See Branston et al., 2006a, Branston et al, 2006b, Long, 1990).

‘Strategic Failure’ is therefore defined in the theory as the ignoring of the wills and aspirations of a mass of the people in formulating the policies and decisions that directly influence their lives (Cowling & Sugden, 1998, Hymer, 1972). Strategic failure is a ‘situation which may arise as a consequence of strategic decisions on key economic variables, such as investment, output and employment, being made by elite, centralised corporate hierarchies whose interests conflict with
the broader objectives of society’ (Cowling and Tomlinson, 2000, p.360). This can be seen as much in the activities of transnational corporations in a ‘free market’ as in national government structures (Bailey, 2003b) as we discuss in later segments. The consequences of strategic failure include poor governance structures, uneven development, subversion of free international trade and industry, curtailed levels of innovation; and a constraining of people’s abilities, aims and aspirations (Cowling & Sugden, 1999).

The Strategic Decision Making framework and its proponents begin their analysis from the concept of the theory of the firm, the development of economies, and forms of globalisation of production (Sachetti & Sugden, 2007). This is further derived from an understanding of the governance structure of transnational corporations and its impact on national economies (Hymer, 1972), uneven development (Cowling & Sugden, 1998), and strategic international trade (Cowling & Tomlinson, 2000). According to the framework, at the heart of every strategic decision-making is the concentration of power and control that result in a state of ‘strategic failure’. This is to mean a large section of participants in an organisation or simply the ‘public’s interests’ (Dewey, 1927) are ignored or unaccounted for in broad policies because they are made by a few participants, in the interest of entities excluding the interests of other participants. For example, they are the impacts of corporate executive decisions on customers or employees; or strategic choices in top global financial centers such as London or New York that adversely affect poorer countries in the developing world, or the policy decisions of Ghana’s cocoa industry regulator, COCOBOD, on the country’s peasant cocoa farmers.

Proponents of the theory argue strongly that strategic failure has significant consequences on governance outcomes, the levels of development within and among countries, and the wealth and poverty of countries and individuals amongst other things (Sachetti & Sugden, 2007). Sugden and
Wilson (2002) argue that the ‘external’ formulations of development criteria and policy as imposed by strategic decision making constrains the thinking of participant localities and therefore restricts the choices available to them. Cowling and Sugden (1999) also associate this concentration of decision-making with various fundamental global problems; including uneven development across the world, subversion of free international trade, curtailed levels of innovation; and a constraining of people’s abilities, aims and aspirations; issues we have alluded to in our discussions on the ‘good governance’, ‘free markets’ and ‘government interventionism’ theories in industrial governance.

A number of solutions have been proposed to mitigate the effects of strategic failure: Sachetti & Sugden (2007) suggests kindling the creativity in people (which is lost when people’s ability to make their own decisions is curtailed) in order to shape new directions in the economies in which they have an interest. The paper proposes public creativity forums, spaces defined by relations aimed at free communication and based upon shared values, including openness, in helping people influence development in their sectors or regions.

Branston et. al. (2006b) explore an ownership and control structure that balances different interests and involves a more direct incorporation of citizens through a formal right (provided by legislation) to participate in strategic decision-making at all levels. Similarly, Branston & Wilson (2006) suggests a system of Alternative Public Governance that considers the design of company law and regulation for more democratically controlled public agencies by an active, effective citizenry.

Another view is for the promotion of non-hierarchical forms of production such as Industrial Districts and Clusters (See Cowling & Sugden, 1998) and finally, the alternative system to the
control of transnational firms through ‘national planning’ where the supposed ‘polar opposite’ of the transnational firm, the public institution, will ‘organise many industries across one region’. (Hymer, 1972).

There is however, little evidence thus far that these solutions would significantly alter the hierarchical nature of most industrial governance forms as hierarchies remain the simplest form of production. This supposed embeddedness of the hierarchical structure in global economic governance, however, does not also counter the impact of this top-down approach to decision making on the mass of the people. The problems of strategic failure as identified in the literature still remain an emotive issue – dealing with how people feel about hierarchy – and an economic issue – how people react productively in hierarchies.

Furthermore, the problems of hierarchy are very pervasive in most global industries (the cocoa industry inclusive) because ‘strategic failure’ is present at all levels of economic governance; whether within firms, transnational companies or governments. We focus in the next segments on how the centralisation of power and control among a few elites has resulted in hierarchy at all these levels of economic governance and thereby entire global industries.

2.2.1 Firms Governance

As indicated above in our review of the literature on economic governance, an element that shows itself in much of the analysis of firm governance is, as in Coase’s definition: the centrality of power and control-based relations or hierarchies. Firms are more directly a ‘nexus of strategic decision making, power and control’ (Cowling and Sugden, 1998, p, 61). The entrepreneur’s desire to create an environment where they are in charge, whether to maximise profits, reduce costs, or control resources and people, is the starting point for all firms. The entrepreneur will prefer to use or not
to use markets or the price mechanism not only because of the costs of using it but due to how much control they have over either option. This, according to the theory, can also explain why firms go transnational (see Hymer, 1972, Chandler and Redlich, 1961, Pitelis, 2005); because they want to maintain control and power in other markets which market transactions and other forms of production do not necessarily always give.

This proposition of basing a firm’s formation on organised power and control is not at all far-fetched. In Cowling and Sugden (1998), they define a modern, large corporation as a ‘means of coordinating production from one centre of strategic decision making’ (p, 67). They define a firm, from the strategic choice framework perspective, as ‘the pinnacle of a hierarchical system of decision making’ (p, 72). This power to make strategic decisions can be equated to the power to control a firm. The strategic choice concept has similarities with other decision-making models of firms in Chandler and Redlich (1961) and Hymer (1972). Pitelis (2005) on Edith Penrose’s Theory of the Growth of the Firm highlights an approach to viewing firms; not as ‘points on a cost curve’ but real life organisations. In this sense, according to Pitelis, firms differ from the market according to their boundaries which are ‘defined by the reach of authoritative co-ordination and communication’ (p.68).

Both Cowling and Sugden’s work and that of Pitelis place the firm as a centre of authority, control and command. This is not dissimilar to Fayol (1949)’s own notions of unity of command and direction in the management theory literature. In another management classic, Taylor (1911) in ‘The Principles of Scientific Management’ features an understanding of an entrepreneur who must coordinate and manage workers’ attitudes to produce ends.
We can therefore argue that firms organise around centres, and are controlled from these centres. These centres can be individuals or a group. Their motivations, however, for organising in a firm can be traced to that ability to control and manage people, resources and activities. Coase (1937)’s arguments for hierarchy and ‘master-servant’ relationships also do not conflict with the notions of power, control and strategic decisions. The concept of transactions costs being the cause of hierarchical organisation of a firm in a market situation can also be placed in the context of strategic cost decisions being made from a position of authority and control. Therefore, to understand these notions of authority and control embedded in firm theory, there is a need to analyse the firm as a hierarchy.

This is the point made in the strategic choice literature as seen in Cowling & Sugden (1998) who identify firms as hierarchies consisting of both market and non-market transactions. They go further to emphasise that this hierarchical structuring is even more pronounced in large firms in modern industries. To wit, firms do not get larger and more hierarchical than the modern transnational firms that control many global industries, including the global cocoa industry. We will therefore proceed to discuss briefly the transnational corporation through Stephen Hymer’s seminal work in the next segment to understand the immense and central governance role these huge firms play in the industrial set-ups of all countries and therefore their impact in ‘spreading’ the effects of strategic decision-making from the firm level to entire national and global industries.

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5 These issues are addressed extensively in the literature on Corporate Governance. It is possible to relate Corporate Governance to the issues of control that we discuss under the ‘strategic choice framework’. This would be based on the analysis of corporate governance as shareholders of firms exerting their influence to set an agenda for managers of these firms that they control. This also brings up issues of concentration of ownership of firms and especially how very few shareholders control very huge transnational firms with presence and influence across the world (Read more on these issues of Corporate Governance in Franks & Mayer, 1997, Yafeh, 2000, Rubach, 1999)
2.2.2 Governance of Transnationals

Stephen Hymer (1972) identifies the root of the transnational firm in the Industrial Revolution of America. He describes how the American family-owned businesses had developed from ‘the workshop to the factory to the national corporation to the multi-divisional corporation and now to the multinational corporation’ (p. 37). This growth he identifies as being both in size and also in ‘brain’, differentiating it from the giant organisations of the mercantilist period. There was a massive foreign direct investment push by US corporations in the 1950s and 1960s especially to Europe and Japan. This was ‘reciprocated’ later by Europe and Japan, and over the years the scramble for market positions and the desire to stay ahead of the competition has meant more investment by big corporations in countries all over the world. Hymer stresses the development of a hierarchical system of authority and control as the transnational corporation evolved over the years. He captures the sense of it in a metaphor when he states that ‘The Marshallian capitalist ruled his factory from an office on the second floor. At the turn over the century, the president of a large national corporation was lodged in a higher building, perhaps on the seventh floor, with greater perspective and power. In today’s giant corporations, managers rule from the top of skyscrapers; on a clear day, they can almost see the world’ (p. 46).

Hymer presents the problem even more starkly in his paper on ‘The Efficiency (Contradictions) of the Multinational Corporations’ (1970). Transnational corporations introduce the problems of ‘nationalism’ and ‘authoritarianism’ due to their hierarchical system of decision-making according to Hymer. The typical transnational, in order to adapt to local circumstances in each country, usually leaves day-to-day management in each country to nationals who are familiar with local conditions and best suited to deal with local problems and local government. Above these nationals are a layer of people who move around from country to country transmitting information from one
subsidiary to another and from the lower levels to the head office at the top of the corporate structure. These people, for the most part, will be citizens of the country of the parent corporation. According to Hymer this creates two types of problems. The first is the internal problem of creating incentives for foreigners whose access to the top corporate positions will be necessarily limited. The second problem is far more important and concerns an external diseconomy. Since subsidiaries of transnational corporations are mostly amongst the largest corporations in their countries of operations, the local top executives play an influential role in the political, social, and cultural life of the country. Yet these people, whatever the positions occupied in the local office, occupy at best a medium position in the global corporate structure and are restricted in authority and horizons to a lower level of decision making. The country whose economy is therefore dominated by foreign investment easily develops a branch plant outlook, not only in reference to economic matters, but throughout the range of governmental and educational decision making.

This raises important political and social consequences to transnational firm hierarchies. In order to reap the gains from international exchange, most developing countries, like Ghana, have become integrated into a corporatised international structure of centralised planning and control and have become a part of a system where they play a very dependant role to a few cities of the world. Sugden and Wilson (2002) argue that these ‘external’ formulations of development criteria and policy as imposed by strategic decision of transnational firms constrains the thinking of localities and therefore restricts the decisions available to them.

Cowling and Sugden, (1999), also associate transnational firms with various fundamental problems; these include uneven development across the world, subversion of free international trade, curtailed level of innovation, and a constraining of people’s abilities, aims and aspirations.
The hierarchical and control structure of the transnational firm therefore results in ‘strategic failure’. Strategic failure being a ‘situation which may arise as a consequence of strategic decisions on key economic variables, such as investment, output and employment, being made by elite, centralised corporate hierarchies whose interests conflict with the broader objectives of society’ (Cowling and Tomlinson, 2000, p.360).

It must be noted here that this does not mean that these theorists do not acknowledge the importance and advantages of the firm, and therefore the transnational firm, in organising production. However, this failure of the hierarchical firm in spurring global economic development as well as balanced development within nations symbolises a constraining of what most developing economies would be able to achieve within their industries.

In response to his own predictions of a hierarchical control structure of the transnational firm corresponding with the control structure of today’s global economy, Stephen Hymer (1972) proposes an alternative system of ‘national planning’ where the supposed ‘polar opposite’ of the transnational firm, the public institution, will ‘organise many industries across one region’. As we have looked at in earlier discussions, this is again the public versus private or government interventionism versus free market argument. Hymer is therefore proposing that state institutions will significantly solve the concentration of power and wealth evident in transnational activity.

2.2.3 Governments & Strategic Failure

Sugden and Wilson (2002) in response to Hymer’s ‘national planning’ solution describe it as simply the transfer of power from an ‘international elite’ to a ‘local elite’. They argue that governments also tend to be organised in a similar hierarchical structure as transnational firms, with huge bureaucracies at the top of an industrial hierarchy, usually tucked away in the capital.
city and with the decision-making process centralised. We can therefore argue that the same issues of under-development and constraining of the aspirations of a majority of industry participants are also at the heart of any government-run regulator or monopoly.

The classic example of this is Japan’s Ministry of International Trade & Industry (MITI) and the ‘kudoka’ or hollowing out of its industrial sector. Ozawa (1997) details how the decade-long recession which he refers to as the ‘Japanese disease’ was caused by excessive government involvement and a ‘neo-mercantilist industrial policy’ (Bailey, 2003a, pg.1). This role of the MITI in Japan’s astronomical economic rise, as well as its fall, is well documented (See Okimoto, 1990).

The industrial policy approach of the MITI after the Second World War was to use a combination of foreign exchange resources, low interest loans, and infant industry protection to support export-focused high technology firms (Bailey, 2003a). To support these firms however, and to provide for domestic consumption, the government needed to maintain internal focused firms in sectors such as retailing, finance and telecommunication; which were much less efficient and were almost entirely dependent on both government support and supplying the big high-technology transnational companies that dominated Japan’s economy. The creation of a dichotomy of highly efficient external focused firms and inefficient domestic focused firms resulted in rising trade surpluses, high prices for local consumers, and an appreciation of the Yen. Over time however, the huge transnational corporations created by government policy moved out of Japan because of the high value of the Yen and also to find better supplier lines, production hubs, and partnerships. This relocation by these firms resulted in rising unemployment, falling domestic output, and problems for the domestic firms who were by now almost entirely dependent on these large firms because of restrictions on imports.
Despite the fact that the eventual hollowing out of Japan’s Industrial Sector was a decision of overs-sized transnational firms (See Bailey, 2003a), the whole process was first implemented and managed by the government structure within the MITI. It has been noted that over time, corporate executives in the top firms got familiar with the elites at the MITI, and essentially influenced if not directed government policy.

The significance of the case study of MITI is that it highlights some of the pitfalls of industrial policy which were discussed earlier, and expands the themes of ‘strategic failure’ as discussed under Hymer to include all forms of elite decision-making that does not take note of the participation, interests, and well-being of a majority of the people.

In discussing the MITI, we must note that the problems were not just that of a bureaucratic government structure that did not get its policies right, but were also essentially a governance system that was centrally controlled and lacked an experiment-based and participatory approach to decision-making. This form of rigidity in government industrial structures can be seen in many countries across the world, with the Ghana Cocoa Board (COCOBOD) being a classic example as will be discussed in the later chapters.

To conclude, the problems of hierarchical decision making as identified in the ‘strategic choice’ literature above are essentially the problems of non-participation by all players in the governance of an industry. The next segment begins to look at the issues of participation in governance and what the motivations are for most people to get engaged when given the opportunity. This will set the stage for then discussing the possible ‘solutions’ to such problems of hierarchical governance, such as democracy, decentralization of governance and then importantly for this thesis, the role that social capital can play in mitigating the impacts of hierarchical governance.
2.3 Participation in Governance

The modern theory of participation was articulated in the 18th century by Jean-Jacques Rousseau, author of ‘The Social Contract’. Rousseau had presented a vision of democracy in which equal citizens come together to make decisions in an interdependent, deliberative manner, and to uncover what can be described as the “general will” (Pateman 1976). According to Damrosch (2007), Rousseau was propounding a theory of human progress in which social connections would complement then newly articulated notions of individual liberty; and the human soul could be more important than simply the rigors of a science. In essence, participation was to be more than a method of decision making; but rather a process in which an individual empathises with the viewpoint of another and takes note of the public interest in arriving at choices. This view by Rousseau resonates well with ‘mental proximity’; a concept which means that informed-participation will make people more aware of various interests of other participants so that they are more likely than not to make choices that are in consonance with the wishes of most people (See Sacchetti & Sugden, 2009).

Participation is currently a very broad term in the literature and covers a variety of activities. This includes participation in decision making through a process based on consultation and deliberations but without any authority by most of the participants to make or veto decisions. Then there is the contribution of cash, material goods, or physical labour to construct public goods or provide public services, and the monitoring and sanctioning of public and private service providers. The other forms of participation are the provision of information and involvement in awareness raising activities, the formation of neighbourhood committees (for instance, to reduce crime or resolve local conflicts), and finally the selection or election of local representatives.
Pretty (1995) also distinguishes between two world views of participation. In the first view, participation is seen as a means of improving efficiency. This is the notion that the more people are involved in activities, the more likely they are to form a consensus and this makes decision-making easier. The second is of participation as a fundamental right of the participants; where the aims of participation are to facilitate collective action, empowerment and building of institutions.

There are also different types of participation under Pretty (1995), who identifies seven different types of participation. The first is manipulative participation; where ‘participation’ is purely a pretence; with representatives of the people on official boards but where these representatives are neither elected or have much power. The second is passive participation, in which the people are told what has been decided upon but their opinions are neither sought nor heard. Then there is participation by consultation; where the people are consulted, their views sampled but the final decision is removed from them and those in authority are under no obligations to take on board the views of the people.

The fourth is participation by material incentives. People contribute resources and are rewarded with material incentives. They have no stakes in the long term systems and practices and their participation is only to the extent to which they can provide resources and the incentives are available. The fifth type of participation is functional participation in which people at the local level are involved in some shared decision making but only after the major decisions are made by the external group. The purpose of this form of participation is to meet set goals and objectives.

Interactive participation is the sixth form in which the people engage in joint analysis, development of action plans and formation of local institutions. Participation is a right, not just a means to an end. The people have control over local decisions and have a stake in maintaining institutions to
oversee structures and processes. The highest form of participation is self-mobilisation. This is devoid of external institutional formulation of policy and these institutions merely act as resources and sources of technical advice. Self mobilisation has the capacity to challenge existing distributions of wealth and power.

This Pretty typology is in synch with earlier work by Sherry R. Arnstein (1969), who explains different levels of participation using “A Ladder of Citizen Participation,” that in a similar way moves from virtual manipulation to actual and effective participation. The ladder has eight rungs each corresponding to a different level of participation, that is, manipulation, therapy, informing, consultation, placation, partnership, delegated power all the way to citizen control.

**Figure 1: A Ladder of Citizen’s Participation by Sherry R. Arnstein (1969)**

<table>
<thead>
<tr>
<th>8. Citizen Control</th>
<th>Citizen Power</th>
</tr>
</thead>
<tbody>
<tr>
<td>7. Delegated Power</td>
<td></td>
</tr>
<tr>
<td>6. Partnership</td>
<td></td>
</tr>
<tr>
<td>5. Placation</td>
<td>Tokenism</td>
</tr>
<tr>
<td>4. Consultation</td>
<td></td>
</tr>
<tr>
<td>3. Informing</td>
<td></td>
</tr>
<tr>
<td>2. Therapy</td>
<td>Nonparticipation</td>
</tr>
<tr>
<td>1. Manipulation</td>
<td></td>
</tr>
</tbody>
</table>

Source: Arnstein (1969), page 217
As noted in Pretty (1995), the role of ‘participation’ has been increasingly emphasised by governments and policy makers in prescribing a variety of local and international interventions; projects at the local level in political governance and also particularly in agricultural governance. Rahnema (1992) has argued that the popularisation of the term ‘participation’ and the desire for all sorts of governing bodies to jump on this bandwagon has resulted in people being dragged into taking part in activities that hold no interest for them at all. Authorities are caught in a dilemma because they need the participation of the people and at the same time fear it. This has led to these varying forms of participation, most of which are effectively stage-managed and produce outcomes that are not in the interest of the people and are unsuccessful.

For example, the World Bank has allocated almost $85 billion over the past decade to programmes targeted at improving local participation (According to World Bank Policy Research Report, Mansuri & Rao (2012) on ‘Localising Development: Does Participation Work’). This is in addition to the commitments by other development agencies and governments. The interest in participation is borne out of a perception that “top-down” development aid was disconnected from the real needs of the poor – who tend to be marginalized and excluded. Therefore giving the poor a say in the decisions that affected their lives by getting them involved in some aspects of design and implementation would result in more relevant goals for the aid programmes. The aims of fostering participation in such development contexts therefore include improvements in poverty targeting, the building of community-level social capital and democratic sensitisation which will then increase the demand for good governance (Mansuri & Rao, 2012).

However, engendering such self-mobilised participation forms has not been easy in most industrial settings and the elusive motivations of individuals in ‘joining in’ to industry associations has been the focus of many studies. The reasons ascribed in the literature for effective participation (rather
than top-down approaches) range from discussions about trust and solidarity among the participants themselves, to the desire by individuals to influence industrial policies. The chapter now analyses these in detail in the next segment.

2.3.1 Motivations for Participation

First, this segment will seek to broaden the discussion on participation in industrial activities to look at some of the views in the literature on volunteering, community participation, and participation in social movements. This is because the motivations for such altruistic social engagements are important in understanding why people will engage in industry associations for which the benefits are not always explicit and that tend to produce group effects rather than for just personal gains.

In Table 2 below, McEwin & Jacobsen-D’Arcy (1992) explores the motivations for people volunteering and suggests that people engage in volunteering to satisfy personal needs and goals and are likely to be motivated by more than one need or goal. These needs includes that people volunteer to express their values or act on their values to help others. Volunteers are also interested in ‘understanding’ through acquiring new skills and learning and also gaining career related experience. According to McEwin & Jacobsen-D’Arcy (1992) there is also the urge to conform to behaviours of a peer group; to enhance one's self-esteem while reducing negative feelings about oneself. There are also much broader goals such as to build social networks and to gain recognition from others.

Batson et. al. (2002) also suggests four motives that will drive an individual to get involved in his or her community. Such participants want to increase their own welfare; or on the flip side, increase the welfare of other people apart from themselves. They can also be motivated by the welfare of a
group or collective; and finally, according to Batson et.al. (2002), participation can simply be in order to uphold some moral principle.

Finally, Klandermans (2004) identifies three motives for people joining social movements as inspired by the desire to change circumstances; or the desire to belong to a group or simply the desire to give meaning to one's life.

Table 2: Motivational Categories for Altruistic Social Engagements

<table>
<thead>
<tr>
<th>Volunteering</th>
<th>Community Involvement</th>
<th>Joining Social Movements</th>
</tr>
</thead>
<tbody>
<tr>
<td>Values</td>
<td>Egoism</td>
<td>Instrumentality</td>
</tr>
<tr>
<td>Understanding</td>
<td>Altruism</td>
<td>Identity</td>
</tr>
<tr>
<td>Career</td>
<td>Collectivism</td>
<td>Meaning</td>
</tr>
<tr>
<td>Social</td>
<td>Principalism</td>
<td></td>
</tr>
<tr>
<td>Enhancement</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Protective</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reciprocity</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reactivity</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Social interaction</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Recognition</td>
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</tbody>
</table>


The above categorisations of the different motivations in the literature for people engaging in altruistic activities emphasise first the diversity of motivations for individuals in participating as well as representing the very personal nature of the motivations that sometimes drive such participation. In terms of diversity of the motivations, participation in altruistic activities according to McEwin & Jacobsen-D’Arcy, Batson et.al (2002) and Klandermans (2004) range from individuals acting solely in their best interest, to participation on the basis of a higher moral principle. Secondly, participation is a purposeful action and it takes a conscious and personal effort for individuals to engage in social movements; with their motivations including their personal values, self-interest and desires, rather than simply being a consequence of circumstances.

From these discussions therefore, it is evident that individuals will have varying and in many cases very complex reasons for joining in social activities. However, for whatever reasons a person chooses to participate, this is usually a deliberate act and is backed by a rational and personal
viewpoint. This analysis of the motivations for participation, one can argue, applies as much in the

case of social activities that hold no direct economic value as in the social engagements by

individuals and businesses in an industry context. This means that most industry participants will
‘join in’ deliberately and for varying reasons. This therefore means that it is probably impossible
to decipher each individual’s personal motivations for participating in an industry through its
associations’ activities. However, generally, what the literature has done is to identify the critical
factors in an industrial set-up that are likely to encourage individual participation. The next
segment would analyse some of the views in the literature on motivations for participation in
industry associations. The factors to be considered are the social relations among the industry
players, orientation of the industry associations either towards ‘membership’ or ‘influence’,
democracy and decentralized governance structures.

2.3.2 Social Relations

Participation is important for the development of social relations that lead to social capital
formation. This point is expressed in Wu & Pretty (2004) and Adler & Kwon (2002). There is
however, also evidence in the literature that social relations among industry participants can also
lead to improved participation in the activities of the industry in a case of reverse causality.

Lake & Huckfeldt (1998), for example, in analysing political participation conclude that increasing
levels of social capital enhance the likelihood that a citizen will be engaged or participative.
According to their analysis of the 1992 Presidential Campaign in the US, the production of social
capital encourages citizens to become more engaged politically, through their participation in a
broader range of traditional political activities. Hence, they conclude that there is a complex set of
relationships between the production of social capital that is likely to be encouraged by
participation itself, and there are consequences of social capital for improved engagement by the individual participant.

Krishna (2006) also uses a dataset collected for 69 village communities in two north Indian states, including interviews with over 2,000 individual respondents, and concludes that institutions and social capital work together in support of active participation. Social capital matters to participation, and its effects are magnified when there are capable agents who can help individuals and communities connect with public decision-making processes. Social capital is therefore “not just the ‘glue’ (which binds community members together into collective action) but also the ‘gear’, which directs community members toward participating in democracy building” (Krishna, 2006, pg. 439).

Putnam (1993b) argues in a similar vein that whether citizens are active and engaged participants – or whether they are alienated and cynical nonparticipants – depends entirely on the available level of social capital. These views are again consistent with Coleman’s (1987, 1988) assertion that social capital facilitates participants’ action. Furthermore, Tomlinson (2012) makes the point that there is a propensity for participation in industry associations where shared interests emerge among firms and thus the social capital that exists among these players result in more collective action.

2.3.3 Logics of Membership & Influence

Tomlinson (2012) again analyses Olson’s (1971) explanation for the motivations of industry participants to ‘join in’ using two ways or ‘logics’ of thinking that can inform behaviour. These logics he postulates as the ‘logic of membership’ and the ‘logic of influence’ (in Olson, 1971;
Schmitter & Lanzalaco, 1989). Under the ‘logic of membership’, Olson (1971) explains that a major source of motivation for social interaction between businesses is the level of ‘membership’ of industry associations. This means that an association’s ability to be inclusive and respond to the needs and interests of all of its members will encourage participation. In another sense, open membership and the encouragement of all participants to make their views known can result in greater participation.

However, Olson (1971) notes another form of motivation; the ‘logic of influence’ which appears to run counter to the notion of inclusivity. The logic of influence is concerned with the negotiating power that associations have with interlocutors such as, state regulators. This is therefore participation that is due to the effectiveness of the associations to achieve the aims for which they have been set up; and to ‘influence’ the industry. The argument here is that associations which are overly inclusive and have a diverse membership base can lead to an ineffective voice (with different members pulling in different directions). Tomlinson (2012) goes on to note that this dichotomy of ‘inclusivity’ and the ‘logic of influence’ mean that social associations which emphasise either will tend to attract different participants. This can be explained by looking at the interests of larger firms in an industry; who will tend to be more attracted by the influential powers of an association where they can lever the organisational structures to influence the direction of the industry. This will run contrary to the principles of an open and inclusive membership where smaller actors are allowed a greater say in the affairs of the association. Therefore, participants in an industry who are attracted to its associations by an inclusive set-up will be less motivated if the association is driven by a ‘logic of influence’ and vice versa.

The conclusion of Tomlinson (2012) is that firms will tend to participate in associations’ activities when they believe in a shared interest with other participating firms. However, the most important
and over-riding factor for the firms in joining these social organisations is their perception of their ability to influence and shape these social activities; and hence the ability to use these industry associations to impact on their own businesses.

2.3.4 Democracy & Participation

The issues of strategic choice and the inherent failure in hierarchical governance structures to motivate broad-based participation also bring up the discussion on democracy. This is because democracy is usually seen as a form of solution for the problems that are associated with top-heavy organisational forms such as dictatorship and tyranny. A relationship between greater participation and democracy is increasingly advocated by the literature in the sense that participation is important for building and strengthening local democratic structures (See Branston et. al., 2006a, Blair, 2000).

Democracy, as defined by Downs (1957, p.137) is a political system that exhibits the following characteristics:

a) Two or more parties compete in periodic elections for control of the governing apparatus.

b) The party (or coalition of parties) winning a majority of votes gains control of the governing apparatus until the next election.

c) Losing parties never attempt to prevent the winners from taking office, nor do winners use the powers of office to vitiate the ability of losers to compete in the next election.

d) All sane, law-abiding adults who are governed are citizens, and every citizen has one and only one vote in each election.
This classic definition of democracy however, appears devoid of the language and spirit of ‘participation’ as outlined by Pretty (1995) in the forms of interactive participation and self-mobilisation. It speaks more of a ‘representative’ participation limited mostly to an electoral choice every four or so years. It can be argued that it is essentially this model of democracy that is practised at most local levels of development. However, these forms of engagements may not increase individual participation in governance but could essentially create new tiers of hierarchy.

This ‘democracy’ is sometimes mirrored in industrial governance structures as well, and particularly in Ghana’s cocoa industry as we will discuss in subsequent chapters. There is usually a representative structure that builds up from the local level all the way up to the national and then global levels. In essence, the voices of the people are allowed to be heard; but only after they have given over that voice to a representative. It is even possible therefore to argue that representative democracy⁶ could result in institutionalising non-participation and hierarchical decision-making. We are therefore not seeing a lot of ‘true’ participation in the industries of most countries; be it democratic or otherwise, and therefore the problems of strategic failure in industrial governance is even more critical.

Despite the failings of ‘democracy’ in our estimation to solve the problems of participation, decentralisation of governance in democratic set-ups have shown promise in solving some of the discussed problems of non-participation and we therefore conclude our analyses on motivations for participation in governance by exploring the literature on decentralisation.

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⁶ There are other forms of democracy, such as ‘deliberative’ democracy (which may have different impacts on participation) but one can argue that the most prevailing form of democracy is ‘representative’.
2.3.5 Decentralising Governance

We have noted above in earlier reviews of the literature that governance can be analysed at different levels. In fact, there is in this regard a growing interest in regions as a nexus for the ‘good’ governance and economic development we have discussed in the above segments (See also Jonas & Ward, 2007). These regions are theorised as the new architectural, social, cultural and spatial building blocks of the global economy (Scott, 2001). Regional territories are important for the formation of governance forms that are more participative, cooperative and inclusive (Jonas & Ward, 2007). This is also the point by Stone (1989) that effective governance is no longer simply the function of the formal machinery of a national government but the informal relations between the ‘City Hall’ and business (See also Bailey, 2003b on ‘New Regionalism’).

Tewdwr-Jones & McNeill (2000, p. 131) have defined regional governance as “a strategic and political level of administration and policy making, extending beyond the administrative boundaries of single urban local government authorities to include urban and/or semi-urban hinterlands. This definition includes a range of institutions and agencies representing local and regional governance that possess an interest in urban and/or economic development matters that, together, form a strategic level of policy making intended to formulate or implement policies on a broader metropolitan scale”. Jones (2001) identifies the shift in the literature from the nation-state as the basic unit of governance to a more decentralised view, which includes regions and localities. There are many reasons for this new approach to governance studies as highlighted in North et. al. (2007)’s work on ‘Devolution and Regional Governance’ in England, Scotland and Wales. They note that the shift to devolved governance seeks to capture the reality that there have been changes in global political institutions, networks and responses to issues of co-ordination and accountability that require a more micro-level approach to the new opportunities and challenges presented by
these changes to our world. They refer to these shifts in governance as a ‘rescaling of the State’ where the starting point for economic competitiveness within a global economy is actually key regions or cities rather than simply nation-states.

Jessop (2002) note the subsequent global ‘hollowing out’ of the nation-state and devolution of significant governance powers to the regional levels. Bailey (2003b) emphasises the significance of this ‘new regionalism’\textsuperscript{7} to economic development as forming the most effective basis for economic governance; with its ideas built around concepts in the literature such as industrial spaces, industrial districts, clusters, regional conglomerations, learning regions, associational economy and regional innovation systems (See also Becattini, 1979; Pyke et al., 1990; Piore & Sable, 1984; Cooke & Morgan, 1998)

According to Bruszt (2008), it is possible to clearly distinguish between different ideal types of regional governance. Bruszt identifies four of these types based on the distribution structure of authority within the region and the rules that govern decision making.

The first two types are \textit{Hierarchical-Centralised} regional governance where the rules of decision making remain hierarchical and there is low room for any autonomous decisions at the regional level; and \textit{Hierarchical-Decentralised} with distributed opportunity for autonomous decisions but the rules that govern decision making still remain top-down rather than bottom-up. The third type of regional governance structure is \textit{Inclusive, but centralised}. The rules that govern decision making here are distributed though the power of final decisions is removed from the regional level

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\textsuperscript{7} Breathnach (2013) also identifies this ‘new regionalism’ in the case of western governments where local and regional governments are assuming a leading role in organising and driving development at subnational levels. He argues that the bottom-up governance structures provide a platform for involving the key developmental stakeholders of the region; whether government officials, citizens or firms, in the designing, implementation and monitoring of agreed development strategies and programmes.
to higher levels. The fourth ideal type of regional governance is a *Networked* structure where there are distributed rules of decision-making as well as room for autonomous decisions at the regional level. This fourth type is noted as the preferred form of regional governance structures as it enables the realisation of the aims of a decentralised structure which includes better participation, the inclusion of local objectives in the strategic decision-making process and the mental proximity of those involved in the making of strategic decisions (See Sacchetti & Sugden, 2003; 2009).

Bruszt’s first three classifications also points to the difficulties in pursuing effective regional governance and the sometimes unintended consequence of actually re-enforcing notions of hierarchy and control while seeking to devolve governance structures. In this vein, Rodriguez-Pose (2008) identifies various merits and demerits of the regional governance structure. In the first instance, conducting industrial strategies at the regional level can result in better-targeted policies, enhanced capacity for innovation in policy, and empowering local industry participants to be more assertive and push for more transparent and accountable governance systems. On the other hand, regional governance can result in problems of inadequate financing, a greater potential for regional governance structures to generate debt, constraints in capacity, the emergence of zero-sum or pure waste territorial competition, and finally a potential for greater inequality.

This counter-balance of demerits as against merits has however, not slowed the decentralisation of national industries; especially in the western world (Breathnach, 2013). The literature identifies one of the fundamental reasons for the recent shift in policy direction to regional governance structures as due to a change in global developmental thinking towards territorial based approaches (Rodriguez-Pose, 2008). Many of the reasons for the recent stress on the city-region are however, of a political nature. Deas & Giordano (2003) notes a global drive by many governments towards devolution with greater emphasis on improved governance and the need to create more room for
the liberalization of investment flows. Regions are being recognised by their governments as important action points where the issues of governance and development could find more meaning as actual participants are more likely to be involved in formulating goals and achieving results.

These formulated goals are also increasingly being changed from the old system of counting financial resource outcomes to more human-centered goals as more people participate at the decentralised levels. Bouckaert & Van de Walle (2003) note the move from the use of ‘hard indicators’ such as resources and output in measuring governance output; to the introduction of softer indicators such as perceptions and satisfaction. Kaufmann et al. (1999b) state that stakeholder’ perceptions of the quality of governance now matter at least as much as objective data and often more accurately reflect actual outcomes.

As the interest in regional governance grows due to the afore-discussed benefits and importance to the functioning of the globalised economy; and also because of the potential for regional governance structures to produce undesirable consequences; there is a need to better understand the factors that impact on the development of good regional governance structures. One of the early works into the determinants of good regional governance is Putnam (1993a) on Italian regions; in which he concludes that social organisation is particularly important for developing good regional governments. This is especially because social capital formation at the micro-level of governance is more likely to cultivate social relations that are more communal, rather than the social interactions that are bureaucratic and aimed at vertical relationships with national level governments. This ‘new’ social relations being formed at the regional level of governance are therefore an interesting area of exploration as these are more likely to be made up of denser relationships; and their corresponding impact on the regional governance structures in which they are situated are likely to be significant.
The main theme of this thesis is the impacts of social capital on hierarchical governance structures at the regional level of Ghana’s cocoa sector. In this regard, we note a significant literature that highlights the roles that regional governance and the social organisations within these regions play in facilitating better governance of economic structures and industries (See Becattini, 1979; Putnam, 2001b; Adler & Kwon, 2002; Bjornskov, 2010, Jones, 2001; Imrie & Raco, 2003). These also follow the works of Putnam’s (1993a) seminal treatise on differences in regional government performance in Italy in relation to the issues of trust and civic responsibility in these localities; also the analysis of German local governments in Cusack (1999), Rice’s (2001) study on 114 communities in Iowa, and Coffe & Geys’ (2005) work on the impacts of social capital on institutional performance at the local government level in 305 Flemish municipalities. It is also related to the work on Industrial District forms (IDs) and the move towards regional paths of industrial development with emphasis on the role of embedded social relations among local industry players (See Becattini, 1979; Becattini et. al., 2009, De Propis & Lazzeretti, 2007).

It is important to note here that much of this research has so far been conducted in the context of developed countries; where the social issues of regional governance have been already well articulated in the literature. This thesis however, seeks to consider these matters in the context of a developing country. This is important as regionalised industrial governance is a relatively new concept in most developing countries which tend to have very centralised political and industrial governance structures.

To conclude on this segment, we have indicated the critical importance of focusing on the strategic decisions when analysing government policy and transnational activity. This is probably more evident now than ever as the global economic downturn which was preceded by the financial crisis of 2008 highlights a possible flaw in the thinking of the elite bodies in government and major
transnational corporations that run most parts of the global economy. It can be argued that the active engagement of ordinary people in their economies and in determining their future has been severally hampered by policies that favour aloofness to political activism; consumerism and the increasing use of political or corporate power to consciously or unconsciously undermine the democratic process.

Incidentally, the developing world was initially left relatively unscathed by the downturn in the developed world because of their position in the global economy. Being at the lowest level of the hierarchy meant that a number of the poor strategic decisions taken at the very top by the global governing bodies took time to filter down to most of these countries thereby insulating them momentarily from the contagion. Inevitably however, it was only a matter of time for the strategic decisions made at the economic centres of the world to directly result in more poverty and underdevelopment for the developing world through falling demand for resources and finished products supplied by the developing world, significant capital reversals and depreciation of local currencies of emerging countries.

In the light of all these, good economic governance needs to rise to the fore again and there is the need to, this time, critically access who makes the strategic choices and in whose interests these choices are made (Cowling & Tomlinson, 2011). There is also a need to analyse closely these hierarchical structures in such a way as to fashion out solutions to the problems that could result from such structuring. This is especially so as direct alternatives to hierarchical structuring have tended to be unable to provide a more efficient and effective way to organise governance activities.

One of such intrinsic solutions to the symptoms (rather than the structure) of hierarchy, this thesis suggests, is social capital and this is now addressed in the next sector of the thesis.
2.4 Social Capital

2.4.1 Introducing Social Capital

Human beings are social beings and have a need to communicate and form, maintain, and enhance social relationships (Baren et al, 2003). These connections create a resource in the form of social capital for both the individual and the group. Adler & Kwon (2002) describe social capital as the ‘goodwill that is engendered by the fabric of social relations and that can be mobilised to facilitate action’. Social capital has been widely interpreted, although a generic view is it is a collective resource arising from (and shaped by) social interaction, usually within networks (see Adler and Kwon, 2000, Payne et al., 2011). Coffe & Gey (2005) note the characteristics of social capital as the presence of dense networks of formal and informal associations and the accompanying norms of generalised trust and reciprocity.

The application of social capital can be found in various academic disciplines including family studies, youth behavioural problems, education, public health, community life, democracy, governance, economic development, and organisational studies. Social capital has subsequently been described as an umbrella concept (Hirsh & Levin, 1999) and it is made up of a number of social features such as connectedness, embeddedness, exchange, trust relations, and networks.

Adler & Kwon (2002) identify three main effects of social capital for the individual or group actors. These are information, influence and solidarity. They argue that social capital broadens the information source for the individual while improving the relevance, quality and timeliness of the information. Social capital also provides an individual with greater power to get things done and to achieve their goals. Thirdly, social capital encourages solidarity and compliance with the rules, beliefs and norms of an organisation; reducing the need for formal agreements and engendering
trust. We tackle these three benefits of social capital in the next segment and relate them to the literature on strategic decision-making and participatory governance.

### 2.4.2 Social Capital as Information, Influence & Solidarity

Sandefur & Laumann (1998) identify one of the primary elements of social capital as facilitating access to more sources of information. According to them, social networks result in an improved quality in information; its relevance and timeliness. This information service from social connectedness is evidenced in the examples of social scientists finding out about the latest research in their field (Coleman, 1988), recent graduates and the unemployed finding out about job opportunities (Burt, 1992), improving mobility opportunities for immigrants (Portes & Sensenbrenner, 1993) and the acquisition of new skills and knowledge in inter-organisational networks (Uzzi, 1997). Van den Broeck & Dercon (2011) in researching banana farmers in Tanzania have also found that farmers rely on their social networks for agricultural information. Choo (1993) note that personal sources are the most important information sources for chief executive officers in finding out more about their corporate environment. Johnson (2004) puts it most bluntly in saying that people will tend to choose other people as their preferred source of information rather than more formal sources. The reason most people will look to their social groups for information is because this source of information is more readily available and accessible as compared to possibly more authoritative sources.

This benefit of information that results from greater social organisation is an important ingredient in helping participants address the consequences of strategic decisions made by elites in hierarchical governance structures. This is what is argued in Bailey (2003a) who relates information flow to the strategic choice framework. Bailey’s main argument in this regard is that
if participants in any hierarchical system are going to be more involved in strategic decision making, they will first need to have information and knowledge to understand the range of choices available to them. This point is re-echoed in another strategic framework literature; Sacchetti & Sugden (2009), who also talk about ‘Mental Proximity’ and the importance of informed participation in making better choices under the strategic-decision making framework.

Another reason information can help address the issues of strategic failure in governance is that lower level participants in an industry will tend to reach above themselves to persons in their social network, but in a higher level of the hierarchy to get information. This is demonstrated in Johnson’s (2004) study of social relations among residents of Ulaanbaatar in Mongolia which concludes that when seeking new information, people will use their social ties to access people with better resources than them. This means that people will seek to go beyond their normal close social ties to weaker, but higher end ties, for information thereby flattening the hierarchical structuring of the industry and bringing participants at different levels of the governance system closer together. Information seeking functions here as a social leveller and enables participants at the lower levels in the industry to engage with those participants at a higher level and who have more information.

Social capital can also be of benefit to its participants by being used as a tool for influence or power. This is influence that allows people to get things done that otherwise will not be possible. For example, entrepreneurs or managers who act as a bridge between two different sets of social groups are seen to be more powerful and influential (Burt, 1992, 1997a). ‘Owners’ of social capital can be able to achieve far more than they can ever do based on their individualism or personal resources. This is the argument of Baker (2000) that individualism as a foundation for success is a myth and that social relations are more important for the individual in achieving personal success, business success and a happy life. Social networks are important for achieving things like; getting
a job (Granovetter, 1973), getting higher pay and promotions at the workplace, influencing people and building strategic alliances (Baker, 2000). Baker goes further to suggest that social capital gives us an ability to contribute to the world. There is probably no better example of a platform where social networks provide opportunities for influence and power than the internet. Ordinary people, just as well as huge corporatized bodies, can set and control the agenda even if for short periods of time based on the extent of their social networks online. This vast social network of billions of people gives capacity to anybody in the network to gain notoriety, credit or influence worldwide simply because of the strength of social capital on the internet (See Heiderich, 2009). Again, in the strategic choice literature, Sachetti & Sugden (2007) emphasize the role of power or influence in strategic decision-making. They note that the more ‘space’ a person has, the more he feels in control of his own creativity and destiny; and therefore the more productive he or she will be towards the agreed goals of society. Participants in an industrial set-up like Ghana’s cocoa sector will be more likely to contribute actively to the development of the industry if they feel that their contributions will make an impact. An extensive social network in the industry is likely to give such a participant more influence even if the top hierarchy in the industry do not actively and consciously promote the distribution of influence and power among all the participants.

Finally, in looking at social capital as a form of solidarity, Adler & Kwon (2002) argue that the reciprocity engendered by social ties solves problems of collective action and binds the communities together. Individuals therefore begin to act more as a part of a whole rather than in self-seeking ways. They comply more with local rules and customs and this means there is lesser need for instituting formal procedures. There are incidences of this in organisations that act like clans; they tend to have shared norms and higher commitments with low monitoring costs (Ouchi, 1980). The solidarity that social capital instils within individual participants has far reaching
consequences for the collective good. For example, Hao (2011) argues that the lost of solidarity in the coal industry in Central Appalachia, Kentucky resulted in the industry making limited contributions to employment and advancement of the community. Research into health care services in the Ivory Coast by Aye M, et. al (2002) show that many poor people are able to access modern health care services despite their poverty because of the solidarity of parents, friends and other members of their social networks. Generating participation and trust among the people is also advocated in Branston et al. (2006a) as important to mitigate the effects of hierarchical organisation. They argue that if the participants in any organisational structure have solidarity towards the aims of the organisation, they are bound to engage better and hold positive views of strategic decision-making. This results in an engaged citizenry and provides a platform for more inclusive governance structures that are important for mitigating against the negative effects of hierarchical decision making.

These three attributes of improving information sources, enhancing participant’s influence and fostering solidarity form the basis in this thesis for postulating the importance of social capital in addressing the negative effects of hierarchical organization. However, we understand from our reading of the relevant literature that social capital cannot be addressed as a phenomenon of a singular nature but rather a much more complex concept that comprises of different types and sources of social capital. Such distinctions of social capital, we will argue are actually important in establishing the ‘capital’ or resourceful nature of social capital, and we discuss these further in later segments.

We conclude this section with the debate about whether social capital should be referred to as ‘capital’ at all; as compared to human or physical capital. In this vein, Adler & Kwon (2002) have argued that there are five characteristics of social capital that justify the term. Firstly, it is an asset
into which other resources can be invested. Secondly, social capital can be appropriated and converted and the third point is that social capital can substitute and complement other types of capital. The fourth and fifth points are; social capital needs maintenance and finally, it can be both a ‘collective good’ and a ‘private good’. Adler & Kwon however, concede that social capital differs in two ways from the normal use of the word ‘capital’, in that it is located in the relationship of the actors, meaning no one player has exclusive rights to it and also investments in social capital are not quantifiable. In summary social capital can be described as ‘capital’ because it an asset that can be consciously invested into. The broadness of the term though means that it has come to be stand for many related concepts under various academic disciplines. A major criticism of social capital as a theory therefore is that this elasticity of the term tends to make it ambiguous and it is always important to state in what context social capital is being used. We have therefore identified different forms of ‘social capital’ that can be classified as to whether it is bonding within close relations, bridging of overlapping networks or linking to centres of power and authority. The term can further be understood as to whether it is about external or internal linkages, or combinations of both. The situational context of social capital is also of importance; market, bureaucracy, associative or communal. This background is also important in determining if social capital is merely available or is actually used.

2.4.3 Types of Social Capital

The focus of this segment is therefore to highlight and analyse the various arguments in the literature about different forms of social capital. To start with, it will be helpful to present a brief summary on the three main schools of thought that has underpinned the use of the term ‘social capital’ in the current literature. These are the works of Pierre Bourdieu, James Coleman and Robert Putnam. The usefulness of reviewing these works for this chapter is because of the different
highlights of these leading authors on the use of ‘social capital’ as a resource; pointing to various ‘social capitals’ as this chapter will advocate in the later part of this segment.

The first of such classical writers is Pierre Bourdieu who first used the term in his writing on the ‘Outline of a Theory of Practice’ (Bourdieu, 1972). Pierre Bourdieu described social capital as the social networks used by elites in society to preserve their high positions in a class system (Bexley, 2007). This ‘capital’ is collectively owned and then allocated as privileges and ‘credits’ to the members of a social group (Bourdieu, 1986). Here, Bourdieu’s concept of social capital acquisition is expressly linked with social exclusion; therefore social capital is only a resource because it benefits a few ‘insiders’ to the exclusion of outsiders. This therefore represents a zero sum game where there must be winners and losers; access to power and privilege as well as lack of access to such power through social exclusion (Bexley, 2007). Bourdieu’s form of social capital can therefore be referred to as a class-based social capital; made up of the social relations among elites that provide them with a resource which they can use to enhance their lives and well-being.

James Coleman was writing on social capital at about the same time as Bourdieu though Coleman’s take on the concept is however, in some variance with Bourdieu. Coleman’s idea of social capital is about the relations among people that facilitate action (Coleman, 1988). This includes the relations among elites and also non-elites; and even between elites and non-elites. To Coleman, social capital is a resource in the marketplace that enables and defines the types of transactions that take place and hence the outcomes. He seeks to explain the consequences or the differences in outcomes in various scenarios by understanding the structure of the relations among the individual actors. Coleman, in contrast to Bourdieu’s situation of social capital mainly in social class groupings; identifies ‘closed’ networks such as the family and the church as the primary site for social capital formation (Bexley, 2007, Granovetter 1973). This social capital is however, not
intentionally produced but it is a by-product of other activities in the marketplace of relations – an externality which can have positive or negative effects (Ponthieux, 2004). Coleman’s view of social capital is also as a resource for individuals; based on their own social relationships rather than the effects of being part of an elite group. The group or community though stands to benefit from the individual social capitals as these capitals can be appropriated for the broader community (Bexley, 2007). It is possible to make out two distinctions of social capital in Coleman’s treatise; that is social capital that is first derived from societal relations and then this can then be mobilised to facilitate transactional social capital in the marketplace. These social capital types can simply be termed society and market based social capitals.

The latest milestone work done on social capital is Robert Putnam’s research on social systems in the United States & Italy (See Putnam, 1993a, 1993b, 1995, 2000, 2001b, 2002). Putnam’s work divides social capital into two main forms: ‘bonding’ social capital and ‘bridging’ social capital. Bonding social capital is about ‘exclusive’ networks as in Bourdieu (Bexley, 2007) or ‘closed’ networks as advocated by Coleman. This includes family, close friends, ethnic organisations, gender organisations, some religious groupings and class societies. These are social groups that tend to be homogenous in nature and are more organically formed. Bridging social capital is found in less homogenous groups such as civic organisations, professional groups and political or religious movements. The major differences between bonding and bridging social capitals as noted in Granovetter (1973) is that bonding ties tend to be ‘strong’ while bridging ties are ‘weak’. It is important to note here that the use of bonding and bridging networks broadens the measures of social capital, as compared to the narrower definitions of Bourdieu and Coleman; and relates it to almost every form of social engagement and community organisation. Social capital therefore becomes a very wide and all encompassing term under Putnam and this notion of social capital is
the dominant view in the current literature; both for those who extol its benefits and also such as are more dismissive of the inherent good capital in ‘social capital’. Putnam himself therefore argues against the use of social capital as a ‘unidimensional’ concept (Putnam, 1995), though he admits to doing so, and urges an identification of different dimensions of social capital, highlighting for example ‘horizontal’ as against ‘vertical’ associations.

This chapter agrees with Putnam and argues that the use of a generic term, social capital, to stand for all the varying observations of activities that are social in nature does not help in outlining a more robust concept of the many benefits of ‘social capitals’; hence a need for a clear theoretical disintegration of the term, especially in explaining their impacts on various phenomena. In this regard, there is a need to explore further more recent views in the literature than Bourdieu, Coleman and Putnam; that have sort to explain different forms of social capital in order to garner a better framework for understanding the concept of ‘social capitals’ as advocated by this chapter.

To start with, according to Adler & Kwon (2002), the views on social capital in the recent literature can be divided into two main schools of thought. There are the definitions that focus on social capital as a resource gained by external relations of an individual or group which form the first group. The second group focuses on the internal collective action resources that arise within a social setting. Therefore the former focuses on external linkages while the latter is about internal linkages.

In this same regard, Adler & Kwon (2002) suggests a third view that combines elements of both the internal and external. Woolcock’s (1998) analysis of social capital postulates that there can actually be four situations of social connections in any setting. The first is where the group has both weak internal and external linkages. These have very low social capital. The second has both
strong internal and external linkages and have exceptionally high social value. Then there are the mid-ways that have either strong internal and weak external ties, or have weak internal and strong external ties. These will turn to result in lop-sided interactions that result in a form of myopia and inwardness in the former and weak community solidarity in the latter. Putnam (2001b) also agrees with the argument that there are both public or external and also private consequences of social capital and talks about multiple dimensions of social capital.

These simple distinctions of social capital as combinations of internal and external relations (in Woolcock, 1998) are taken much further in Nahapiet and Ghoshal (1998) and Tsai and Ghoshal (1998) who identify three inter-related dimensions within which social capitals are formed; structural, relational and cognitive. The structural dimension is the loci of actors within a network, its’ socio-economic governance structure and the degree to which the network facilitates participation and social interaction. The relational dimension refers to the nature of links between actors and the degree of embeddedness within the network. From this relational aspect, the salient values (or norms) of social capital arise such as ‘trust’, ‘reciprocity’ and ‘goodwill’. Finally, the cognitive dimension refers to the collective goals or ‘shared vision’ emerging (via the relational dimension) between networked actors (Nahapiet and Ghoshal, 1998; see also Tsai and Ghoshal, 1998).

A further example of such distinctions in social capital is found in Woolcock and Narayan (2000), which identifies four views of social capital in relation to economic development. These are the communitarian view, the networks view, the institutional view and the synergy view. The communitarian view is based on social capital as relations within local level organisations and holds that social capital is inherently good and more of it is always better. The social capital engendered tends to be that which is ‘inward looking’ and exclusive of outsiders, similar to
Bourdieu’s view of elite social capital. The networks view, on the other hand, is a broader type of social capital as encompassing both the vertical and horizontal relationships between people and organisations. It is founded on the concept of networks and comprises of all forms of relations; that is strong and weak ties or bonding and bridging social capital as advocated in Putnam’s work.

The above discussed distinctions of social capital from Woolcock & Narayan (2000) so far tie in with the views of Bourdieu, as in the former, and Putnam’s work in relation to deriving social capital from varying relations and networks. Woolcock & Narayan (2000) however, introduce a third view which is the institutional view; which states that there is a social capital formation which comes as a result of the political, legal and institutional environment. This places social capital as a function of governance and makes the point that ‘good governance’ is what makes local social programs work; and hence provides a resource for participants in the governance process. Social capital is therefore a resource achieved by participation – in a governance process; with governance and hierarchical structures at the heart of social capital formation and diffusion. This is Woolcock and Narayan’s unique contribution to the literature on different types of social capital in the sense that it highlights social capital that is formed through individual participation in an institutional framework; as against the relations in naturally ‘social’ settings such as family, communities and groups.

The final view of Woolcock & Narayan (2000) is the synergy view; which puts together government as well as communities & private actors in creating the conditions that facilitate social capital. Here, government functions and officials are embedded with citizens and are responsive to them. Social capital is therefore defined, in every context, by the relationship forms that exist between public and private actors. This puts together the social relations between individuals; highlighted in the first two views and the more institutionalised participation in the third view.
A fourth example of such distinctions of social capital found in recent literature is in Reimer et. al. (2008). Reimer et. al. (2008) presents four types or structures of social capital: namely market, bureaucratic, associative and communal. This view of social capitals is rooted in the belief that social relations form through normative structures. The argument therefore, is that normative structures provide the rules of interaction that create social capitals; meaning the different normative structures; such as markets, bureaucracies, associations and communities will produce different social capital outcomes.

In the first normative structure, there are market relations that are characterised by open and free exchange of goods and services between free actors in both formal and informal settings. The social capital created is through the free trade in goods and services, sharing of market information and the negotiation processes that occur in the marketplace. Market social capital is therefore transactional and is similar to Coleman’s definition. On the other hand; in the same transactional settings, are bureaucratic relations which are the impersonal and informal distribution of resources based on status positions and established principles. This social capital is based on allocations of rights and entitlements from the prescribed charters and by-laws of governance structures and corporate organisations. These transactional social capitals are therefore based on intermittent interactions that are usually industry-specific.

The next two distinctions of social capital according to Reimer et. al. (2008) is more in the realm of similar interests and emotional bonds. Associative relations are based on shared vision and groups. The created social capital is characterised by common contribution to goals on the part of members and it is a process informed by the successful accomplishment of these goals, the objectives set while achieving goals and the reinforcement of promises to fulfil the goals. Then there are communal relations that form social capital that is presumed on a strong sense of shared
identity. The bases for these relationships are usually birth, ethnicity, location, life experiences and intense socialisation. One key feature of such communal social relations is generalised reciprocity and is built through the exchange of favours and reinforcement of identity.

In line with the above context situation of social capital, Wu & Pretty (2004) also make a distinction between available social capital and used social capital. Social capital can be available in the public sense within the structure whether it is market, bureaucratic, associative or communal. This social capital is therefore potentially useful to individuals. But as to whether individuals can make use of this requires their direct participation. Reimer et. al. (2008) goes further to identify a weak relationship between such available social capital and used social capital. These distinctions of social capital mean that increasing the availability of social capital will not necessarily lead to its greater use and impact. This is also related to the type of social capital in context, to determine the ability to put it to greater use.

A final example from the recent literature of social capital types is Portes (1998) with another description of four sources of social capital. These he states are value introjection, bounded solidarity, reciprocity of exchanges and enforceable trust. Value introjection is a source of social capital that comes from shared values or cultural beliefs (Hunter, 2004). Bounded solidarity is also social capital that results from like people being in like circumstances. The third source of social capital is the effects of the reciprocal nature of exchanges which then result in a resource for the parties involved. The final source of social capital according to Portes is that of enforceable trust; that is the mechanism that maintains the reciprocal obligations and social norms existing within a community; that is group approval and access to resources producing a form of social capital.
In bringing all the afore-discussed views on social capitals together, it is now possible to identify a broad segmentation of social capital into its two main types in the current literature; social capital based on stronger and ‘bonding’ relationships (focused on ‘Trust’) and social capital based on weaker and ‘bridging’ relationships focused on ‘Transactions’ (See Granovetter, 1973). The stronger relations are more intensive, values-based and involve regular and continuous associations between the individuals, while the weaker relationships involve less frequent interactions and are temporal and transactional in nature.

This thesis, in line with the literature, advocates that it is possible to further segment these broad classifications into more specific categories; as in four clear distinctions – following in the vein of most of the literature – that is ‘stronger strong ties’, ‘weaker strong ties’, ‘stronger weak ties’ and ‘weaker weak ties’ (See Figure 2 showing the types of relationships that make up the four ‘strength’ levels of social capital). We believe this further disintegration can be important because it facilitates better analyses and presents a more robust view of the ‘capital’ nature of social capital.

**Figure 2 – Four ‘Strength’ Levels of Social Capital**

![Diagram of social capital levels](image)
Stronger strong ties are the ‘closed networks’ identified in Coleman (1988) which comprise of family and societal relations; the ‘exclusive networks’ indentified by Bourdieu (1986) on class-based social capital; the communitarian view of Woolcock and Narayan (2000); Reimer et. al. (2008) communal normative structures and the values-based social capital of Portes (1998). These ties are mostly derived from emotional relations that are characterised by trust, love and sharing. These are relationships with close family and friends and usually long-term interactions that create an emotional bond. There is a tendency to refer to this type of social capital as fuzzy ‘capital’ or not ‘capital’ at all and has been the focal point of the perceptions of the lack of rigorousness of the social capital theory. There is however, a lot of work in the literature that recognise the impact of emotional relations on concepts such as happiness, advancements in education, prospecting for jobs, and support in times of crisis (Coleman, 1988, Bourdieu, 1986). Such social capital can also be formed as a result of being part of a community, religious or ethnic organisation. This is characterised by neighbourliness and can be positively associated with improved community cohesion, low incidence of crime and conflicts and shared values among people in the community. Finally ‘Stronger Strong Ties’ can also be found among class societies and is defined by the social class one belongs to and which can then be appropriated to ‘get by’ in life.

Weaker strong ties are those that are derived from close associations (Reimer et. al., 2008) or like people being in like circumstances (Portes, 1998). This is therefore situational based and can be found, for example, in industrial structures as well as political and civic organisations. These professional relations are horizontal associations that bring together agents of equivalent status and power (Boix & Posner, 1996). This form of social capital can result in improved access to information and also greater knowledge diffusion. Political activism and civic society membership also result in such social capital both for the individual and the community. The benefits of such
social engagements include greater democracy within such communities and better governance (Putnam, 1995).

The *stronger weak ties* are founded on institutions and governance structures, and are defined by participation in such hierarchical frameworks. These are the civic engagements advocated in Putnam’ work on the issues of democracy; Woolcock & Narayan’s (2000) institutional view; and bureaucratic relations under Reimer et. al. (2008). Such hierarchies result in vertical associations that link unequal agents in asymmetric relations of hierarchy and dependence (Boix & Posner, 1996). According to Boix & Posner, these are relations not characterised by an ability to generate norms of reciprocity, social trust or a shared sense of responsibility for collective endeavours; but rather are built to facilitate decision-making and eliminate the collective action problems. Hierarchical relations or the ‘Stronger Weak Ties’ therein can result in better economic governance, income generation and ensures protection of wealth through better institutions.

Finally, ‘*weaker weak ties*’ are those based on a pure transactional or contractual relationship in the market place. Coleman defines this form of social capital as society relations translated into a transactional resource in markets; showing how close knit families can help their children achieve more in an educational marketplace. Reimer et. al. (2008) defines this more clearly under market normative structures, as do Portes (1998) on reciprocity of exchanges and ‘enforceable trust’. Boix & Posner (1996) further describe it as cooperation coexisting with competition.

The important resource created by these social interactions can forestall opportunism, facilitate coordinated actions, reduce transactions costs; that is the costs of measurement and enforcement and results in a more developed economic system (Boix & Posner, 1996). This is the social capital form that best relates with the issues of incomes, economic development and growth (See Hermann
Figure 2 above also shows that social capital forms becomes stronger, bonding and intimate as it moves from the low levels of ‘market relations’ to the highest levels of ‘emotional relations’. The essence of this typology is therefore to situate social capital in the very different relations that inform the generic term, and also to show that these different relations result in different resources and can therefore produce different outcomes. So, for example, to compare the resource that one can appropriate from the ‘weaker weak ties’ found in market relations to that from ‘stronger strong ties’ created through emotional relations is like comparing oranges to apples. These distinctions of ‘social capitals’ discussed in this segment are therefore important, not only in the theoretical context as in providing us with a more rigorous categorisation of the term; but is crucial for understanding how social capital actually impacts on different phenomena. As will be discussed in later chapters, some forms of social capital – those described as ‘weak ties’ or transactional relations – may be more important for improving income levels of poor people than other forms of social capital based on trust. Furthermore, in such cases as in ‘weak social ties versus strong social ties’, it may not even be prudent to try to foster or encourage social capital, as a general term, in trying to achieve specific aims as it is possible that encouraging some forms of social capital can, in fact, be counterproductive to the achievement of a targeted outcome – which outcome is normally well associated with ‘social capital’ in the literature.

2.4.4 Consequences of Social Capital

Adler & Kwon suggest that social relations can serve purposes for which they were originally not intended. This means they are consequences to social actions that can result even when this is not
the purpose. The literature reviewed seems to be divided along the lines of those who ascribe an overwhelming number of positive effects from social interactions and those that are more skeptical of both the use of the term ‘social capital’ and its benefits to participants.

In defining social capital, Putnam (2001b), the foremost optimist on the benefits of social capital, describes it as the value created from networks and norms of reciprocity. This is the view of most proponents of a ‘beneficial’ social capital; usually coming from the viewpoint that goodwill that people have towards each other ultimately is a valuable resource (Adler & Kwon, 2002). Positively, social capital has been linked with various phenomena. For example, in Coffe & Geys (2005), they indicate that social capital improves governance by increasing political awareness and by providing opportunity to discuss political affairs and thereby increasing the public’s monitoring ability. Citizens also become more effective in demanding good governance when social capital is high. Coffe & Geys also note the role of social capital in generating commitment within individual participants to make their societies work and to make necessary compromises. Citizens in high social capital environments are more likely to be interested in the common good rather than their own individual benefits at the expense of others.

Bjornskov (2009) postulates that social capital also impacts economic growth through affecting education and the rule of law directly. The empirical results from his paper suggest that high trust levels affect schooling which in turn raises the rate of investment and hence economic growth. Bjornskov, in an earlier work (Bjornskov, 2008) also identified linkages between social capital and average happiness in the United States. He analyses that sharing a high degree of social trust at the societal level will allow people to interact with fellow citizens whom they do not know and will consequently result in a generally safer, predictable, easier and a happier life.
Wu & Pretty (2004) in a study of Farmer Innovation Circles in China found that socially connected farmers are more likely to adopt new technologies such as ploughs, varieties, inputs, orchards, afforestation, and grazing land rehabilitation. They argue that social capital is very important to marginal areas of China where the unfavourable geographic and resource environments constrain the inflows of external capital and knowledge. The networks they identified in the Farmer Innovation Circles had strong positive effects on agricultural and natural resource innovation, which in turn improves incomes of farmers.

On the other hand, Morina-Morales & Martinez-Fernandez (2009) note a tendency for too much social capital to actually impact negatively on innovation. They note that the very reasons why social capital can be beneficial to firms that are in a cluster, contains the seeds of having negative consequences if there is an overinvestment in social relations. Portes (1998) goes further to identify four possible negative consequences of social capital: the exclusion of outsiders, excessive claims on group members, restrictions on freedoms of individuals, and downward levelling of norms. Serra (2011) criticises the application of social capital to collective action problems, arguing that the belief by significant parts of the literature to present social capital as a one-in-all solution is flawed. His conclusions are quite emphatic and try to debunk the positive overtures in the literature about social capital. This is a trend to be noted in some parts of the literature that are lukewarm about social capital; and we can argue that these commentaries appear to be counter-intuitive. This is because the very definition of social capital as ‘capital’ means it will have both positive and negative consequences even in the same situations. For instance, it should be possible to find examples where social capital improves economic performance and other examples where it is detrimental to economic performance. Adler & Kwon (2002) crystallizes these risks to social capital in these three senses. First, over-investment in social capital can turn the resource into a
liability. Secondly, social capital may benefit one participant or participants but may affect adversely another set of actors. And thirdly, the benefits of social capital can have different impacts on a participant based on other factors, such as moderating factors.

Reimer et al (2008) agree with this view and argue that social capital should be considered value-neutral. They give the example of how social capital can be used to organise a neighbourhood watchdog and can also be employed to organise street gangs that undermine the former objective. This research takes the view that social capital is value-neutral and that the elements that make up the resource can be applied by its users in either positive or negative ways.

In summary, social capital is an interesting concept to study along with the issues of governance failure. Its tendency to be more along the lines of ‘soft’ issues such as community and trust as against the ‘hard’ facts and figures usually associated with economic governance presents a unique opportunity to understand any overlapping relationships that have hitherto not been fully exploited in the literature.

This section discussed the conflicting views on the importance of social capital and also the different types of social capital. In conclusion, we will like to highlight the different classification of social capital found in Reimer et. al, 2008, as market, bureaucratic, associative or communal. This will be very important in the particular context of the cocoa industry in Ghana, which is the case study for our research, in going beyond simply postulating a relationship between social capital and governance to identifying the dominant type of social relationships that exist in the industry and its impact on governance. This will also be particularly interesting in highlighting any possible solutions for the poverty and unprofitability that characterises the work of the peasant farmers and Licensed Buying Companies respectively that operate in the industry.
The final section of the segment will now set the stage for the rest of the thesis by examining the relation between social capital and good governance, focusing particularly on governance of value chains as this is especially pertinent to the case study of this thesis which is the cocoa industry.

2.4.5 Social Capital and Good Governance

Since Putnam’s (1993a) seminal study, research has sought to explore the link between social capital and ‘good governance’. In these situations, social capital has been widely interpreted, although a generic view is it is a collective resource arising from (and shaped by) social interaction, usually within networks (Adler & Kwon, 2000; Payne et al., 2011; Westlund & Kobayashi, 2013).

It is in this context that Nahapiet & Ghoshal (1998) identify three inter-related dimensions of social capital: structural; relational; and cognitive. The structural dimension is the loci of actors within a network, its’ socio-economic governance structure, and the degree to which the network facilitates participation and social interaction. The relational dimension refers to the nature of links between actors and the degree of embeddedness within the network. From this relational aspect, the salient values (or norms) of social capital arise such as ‘trust’, ‘reciprocity’ and ‘goodwill’. Finally, the cognitive dimension refers to the collective goals or ‘shared vision’ emerging (via the relational dimension) between networked actors (Nahapiet & Ghoshal, 1998; see also Tsai & Ghoshal, 1998).

Nahapiet & Ghoshal’s (1998) framework is useful in exploring the theoretical links between ‘social capital’ and ‘good governance’. For instance, Sacchetti & Sugden (2003, 2009) have argued that ‘open’ and ‘inclusive’ (network and/or institutional) structures facilitate greater participation
and a wider articulation of ‘voice’ by affected stakeholders (or ‘publics’). They suggest this improves the governance process, since greater deliberation among a wide set of stakeholders is more likely to ensure strategic choices (such as resource allocation) better reflect the wider ‘public interest’ (see also Sacchetti, 2013). In this regard, Sacchetti & Sugden have in mind Pretty’s (1995) notions of functional and/or interactive participation, whereby actors deliberate and learn from each other, build consensus and formulate action plans for specific projects, and thus have a degree of influence over strategic decisions affecting their local development paths. Similarly, in their study of business associations in ‘developing economies’, Donor & Schneider (2000) also emphasise the importance of participation and intensive (and extensive) mediation between members (firms) in building consensus over collective actions (see also Annen, 2003). This process also enhances transparency (and accountability) within the institution, and therefore strengthens (industry) governance (ibid, 2000, p.274-275). Thus ‘inclusive’ governance structures facilitate and, in turn, are strengthened by participation, deliberation, and engagement by a wider set of actors (see also Tomlinson, 2012). Moreover, greater social interaction fosters the relational and cognitive aspects of social capital, which also promote better governance (Granovetter, 1985, 2005). In this regard, both ‘trust’ and ‘reciprocity’ sustain legitimacy and compliance with established rules (and social norms) among actors (Jessop, 1998; Axelrod, 1997); these reduce transaction costs in governance structures and can improve institutional effectiveness (Biox & Posner, 1998; Aldrich & Fiol, 1994). The relational dimension is re-enforced through

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8 Sacchetti and Sugden (2003, 2009) refer to the wider Deweyan concept of ‘publics’, as opposed to stakeholders. This distinction does not inform our discussion here.

9 Pretty (1995) outlines a typology of participation, ranging from manipulative participation (where actors may have representatives on boards, but hold no power) and consultative (where actors are consulted on decisions, and their views may/may not be taken on board) to the more influential functional and interactive types of participation mentioned here (See also in Chapter 2). In some cases, actors collectively assume greater (local) control over socio-economic development through self-mobilisation (ibid, p.1252).

10 Stiglitz (2002) makes a similar point, albeit in a wider context, in calling for more ‘inclusive’ governance structures and wider participation in socio-economic development.
cognition and the ‘shared vision’ of actors, thereby shaping their behaviour and encouraging them to participate in joint actions such problem resolution, which again can enhance (governance) performance (Coffé & Geys, 2005). It was this type of social cohesion observed by Putnam (1993a).

The importance of social engagements and participatory governance is not just limited to industrial governance at the local or even national level, but is also important for the full functioning of an entire global value chain. This is well noted in the discussions above on strategic failure due to the controlling power of transnational corporations on global industries and how these value production chains are likely to be devoid of openness and the effective collaborations that enhance good governance practices. The next segment briefly looks at the importance of social capital in value chains; particularly in the agricultural sector.

2.4.6 Social Capital & Governance of Global Value Chains

Both governance and social capital (key themes of this thesis) are significant components in the operation of global agricultural value chains since they facilitate coordination, collaboration and compliance between farmers, traders, exporters and consumers on issues such as managing crop yields, prices and quality (Rifin, 2015). Indeed, more dynamic agricultural communities are characterised by a high degree of social capital and trust, allowing poorer farmers to better participate and achieve greater value added in global markets (DFID, 2008). For instance, strong (horizontal) collaborative linkages between village farmers can enable them to be more effective in utilising market information and assist in establishing a fair contract regime (with either upstream input suppliers and/or downstream traders/exporters), while raising compliance rates with (international) crop quality standards. Moreover, pooling resources and collaboration along
the value chain can also deliver improvements and efficiency savings in post-harvest transportation systems (see DFID, 2008; Webber & Labaste, 2010).

Lyon’s (2000) study of social capital in Ghana’s tomato industry is especially illustrative. Drawing upon a series of semi-structured interviews and survey data from tomato farmers in the Brong Ahafo region, Lyon explored how trust was nurtured along the value chain, among Ghanaian farmers, traders, and agricultural input suppliers (of fertilisers and insecticides). He documented how this trust was built through networks of formal and informal co-operative ties and reciprocal relations among the various stakeholders. Trust helped to maintain fruitful business relations, and was crucial to the sustainability of the farmer associations, which negotiated fixed prices for the small-farm holders so as to guarantee them a minimum income. While there were always risks of opportunism arising - particularly in relation to the repayment of credit (between parties) and the undercutting of collective price agreements – these were largely governed through the use of appropriate sanctions among the actors, which included damaged reputations for deviants, loss of future (collective) benefits, social pressure (norms) and ostracism. Thus, both trust and social relations shape the industry’s governance, and are critical to the prosperity (and survival) of the small tomato farms and traders, allowing them to enter new markets and raise incomes (see also Lyon, 2006).

However, Lyon (2000; p 675) also warns about the balance of bargaining power within Ghana’s tomato industry, pointing out trust is likely to diminish where ‘a weaker party (in the value chain) has no alternative or is coerced into the exchange’. Indeed, the distribution of (socio-economic or political) power has significant implications for the governance of agricultural value chains and social capital. This is particularly the case in (global) value chains dominated by transnational corporations which can exert significant influence not only over specific agricultural contracts, but
also in shaping wider international farming standards (Ponte & Gibbon, 2005). Without an effective counter-veiling body - such as a (democratic) industry regulator - farm small-holdings lie at a distinct disadvantage in such relationships, and some may exit and/or become precluded from participating in the global value chain (see DFID, 2008). This scenario weakens mediation and social interaction within farming communities and undermines (democratic) governance processes (in the sector) as smaller stakeholders are effectively excluded from participating in (and shaping) strategic decisions affecting their own welfare (see Sacchetti, 2013).

2.5 Conclusion to Literature Review

First, we have developed an understanding of economic governance and its formulation concluding that it has become increasingly important for governments to get involved in their economies while at the same time maintaining open markets and fiscal discipline. This set the stage for the next segment on economic governance, which highlighted the pitfalls in both transnational firm organisation and government policy setting which tends to be hierarchical and result in strategic failure and the disenfranchising of a majority of industry participants.

The final portion of the theory we looked at was the social capital that emanates from the social relation in hierarchies. We highlight a tendency to lump various aspects and types of social capital together which results in an obscure view of its merits and demerits. It therefore seems better in studying social capital to look at value-neutral elements such as information flow, influence and solidarity. These go back to the literature on governance and strategic failure that identify greater information flow, more influence and solidarity as crucial to countering the adverse impacts of ‘strategic failure’ on lower level participants.
The themes identified in this chapter informs the rest of the thesis and forms the basis for the hypotheses that are addressed in the main chapters 4-7. Chapter 4 makes use of the issues of industrial governance covered in section 2.1 and also the theory of strategic decision making in global value chains as extensively analysed in this chapter. The roles of social capital as information, influence and a point of solidarity within industry governance structure as described in the review of literature form the basis for Chapter 5.

Chapter 6 focuses on the various types of social capital as described in this chapter and the consequences of these social capitals on welfare. Finally, the above discussions on participation and the motivations for participation are central to the work in Chapter 7 of this thesis.

The next chapter will first present the methodology employed in gathering data and insights about the industry around the broad areas of governance, social capital and participation before the main chapters.
Chapter 3 – Methodology

3.1 Introduction

The theoretical foundations of this research are important for the overall understanding of the research methodologies chosen and how data on the case study of Ghana’s cocoa sector was collected and analysed. This research adopted an exploratory approach with the use of case study methodology in the first instance. This is because there was a need to understand in detail the workings of the industry chosen as well as get a feel for such murky theoretical concepts as discussed in Chapter 2 above such as governance, social relations, perceptions of strategic decisions and attitudes for social organisation within the industry. Such in-depth understanding is not possible with a pure positivist approach. However, to buttress this qualitative analysis and to add more weight to the conclusions to be arrived at; the use of a quantitative method is also employed to test the thesis’ hypotheses. There are cases were the same research design is used to gather both qualitative and quantitative data and therefore we believe that this method of analysis is acceptable for our research (Yin, 1989, Easterby-Smith et. al., 1991, Gable 1994). A process of triangulation is subsequently used to put together these two methodological approaches in the analysis chapters in order to arrive at a result. ‘Triangulation’ refers to gathering and analysing information from more than one source to gain a much fuller understanding of the concepts. In our case, every result or conclusion drawn from our statistical analysis is collaborated using qualitative observations in the field, literature reviewed, and information and impressions from the interviews conducted.
3.2 Research Instruments

As indicated above, the research philosophy employed is first and foremost exploratory or interpretative. This is because of the need to garner a much deeper understanding of the workings of the sample population, rather than just an aggregation of numbers typical of a more positivist approach. The primary research instrument employed therefore was a case study of the industry with face-to-face interviews with major stakeholders such as COCOBOD and the farmers. This is an interpretative approach and was to get a more in-depth understanding of the subject matters discussed in this research and to collaborate with any findings from the statistical analysis carried out subsequently.

Also the study undertakes empirical research using a survey of farmers in a positivist approach to draw out more objective findings. This view of using a pluralistic approach is advocated for in the literature (see Kuhn, 1970; Kaplan and Duchon, 1988; Remenyi and Williams, 1996) and especially appropriate for use in the social sciences where there is usually a need for both subjective and objective interpretation of the observed phenomenon or subject of the research. The research methods employed are therefore segmented into case study research and survey research and the rationales for choosing each method are now discussed below.

3.3 Case Study Research

This research looks at the issues of governance and social capital using a case study of Ghana’s cocoa industry. The case study methodology employed combines observations from the literature and in the field; secondary data on the industry, questionnaire data and interviews with key industry stakeholders. The use of case study research is appropriate for this study as it enables a deeper
understanding of the workings of the industry that then complements any findings in the statistical analyses as employed in this research.

Case study research, according to Eisenhardt (1989), is about understanding dynamics that are present in a single setting. This analysis can be at different levels; for example an entire industry or a single firm (or a number of firms). The case study methodology employs observations, secondary data, questionnaire data as well as archives and interviews. Interviews are usually the most essential sources of information for case study research (Yin, 1989) and are used extensively in our study of Ghana’s cocoa industry. Eisenhardt (1989) also notes that the information received can be in the form of both qualitative data (words) and quantitative data (numbers).

Case study research affords a more in-depth approach to understanding the subject matter of a study as compared to the more quantitative approach, which though rigorous, does not situate findings in its appropriate context (Flyvbjerg, 2007). Critics of case study research however argue that it is difficult, if not impossible to generalise from a single case, rendering findings from the methodology narrow. Case study could also lack validity since it is subjective and open to the researcher’s interpretations.

Flyvberg (2007) presents the arguments against the conventional wisdom by analysing five misunderstandings of the case study methodology and counters them by stating how these views are misplaced and not relevant to the issues of the methodology. These are outlined in the table below;
Table 3: Five Misunderstandings of the Case Study Methodology

<table>
<thead>
<tr>
<th>Topics</th>
<th>Popular Misconceptions</th>
<th>Arguments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Theory Formulation</td>
<td>Flyvberg notes a perception that theoretical (context-independent) knowledge is more valuable than concrete, practical (context-dependent) knowledge.</td>
<td>However, such predictive theories and universals cannot really be found in the study of human affairs. In this regard, it is the concrete, context-dependent knowledge found through methods such as case study research that are more valuable in gaining a better understanding of the world around us than the vain search for predictive theories and universals. (Flyvberg, 2007, p. 224).</td>
</tr>
<tr>
<td>Generalisation</td>
<td>Another common misconception of the case study methodology is that one cannot generalise on the basis of an individual case; therefore, the case study cannot contribute to scientific development.</td>
<td>Flyvberg argues that one can very often generalise on the basis of a single case, and that the case study must be central to scientific development and generalisation as it acts as a supplement or alternative to other methods. He also argues that formal generalisation is overvalued as a source of scientific development, whereas “the force of example” is underestimated. (Flyvberg, 2007, p. 228)</td>
</tr>
<tr>
<td>Hypotheses Testing &amp; Theory Building</td>
<td>There is the argument that the case study methodology is most useful for generating hypotheses; that is, in the first</td>
<td>However, case studies “are valuable at all stages of the theory-building process, but most valuable at that stage of</td>
</tr>
</tbody>
</table>
stage of a total research process, whereas other methods are more suitable for hypotheses test and theory building.

There is also a point made in sections of the literature and a popularly held notion that case study research contains a bias toward verification, that is, a tendency to confirm the researcher’s preconceived notions. Flyvberg however, argues that the case study contains no greater bias toward verification of the researcher’s preconceived notions than other methods of inquiry. On the contrary, experience indicates that the case study contains a greater bias toward falsification of preconceived notions than toward verification (Flyvberg, 2007, p. 237).

Summary of Research

Finally, there is the perception that it is often difficult to summarise and develop general propositions and theories on the basis of specific case studies. Though Flyvberg concedes that it is correct that summarising case studies is often difficult, especially as concerns case process; it is less correct as regards case outcomes. The problems in summarising case studies, however, are due more often to the properties of the reality studied than to the case study as a research method. Often it is not even desirable to summarise and generalise case studies as good studies should be read as narratives in their entirety (Flyvberg, 2007, p. 241).
This research, in employing the case study methodology has chosen a particular industrial setting that could be seen as an ‘exemplar’. The cocoa industry in Ghana is in many ways typical of any global commodities industry in the world given that it is dominated by huge multinationals with peasant farmers producing the raw material in countries in Asia and Africa. The firm control of the government regulator, COCOBOD, also provides the classic; if not extreme case of government interventionism and emphasis the issues of power and control important to the research.

3.4 Survey Research

The research also made use of the data collected by means of a survey questionnaire. Survey research was also employed both as a qualitative (to identify themes and views in the case study as above) and as a quantitative method (to define relationships between different variables as employed in Chapters 5 to 7). The choice of this form of analysis is apt as it brings together the richness of both approaches as advocated in the literature for producing quality research (Kaplan & Duchon, 1988). The use of survey research in the statistical analysis therefore serves to reemphasis or disputes any findings in the case study and makes our research findings more likely to be reliable and valid.

Survey research is concerned with the relationships between variables in a particular population. It is usually a quantitative method which derives standardised information through structures and predefined questions from a sample of a population (Pinsonneault and Kraemer, 1993b). An important aspect of survey research is that any findings from analyses of the data should be generalisable to the entire population; meaning the sample used must be representative of the
population. Survey research usually has clearly defined independent and dependent variables and testable hypotheses. The survey design used in this research is cross-sectional, which means the data is collected at one point in time from a sample representative of the population. This contrasts with a longitudinal design that collects data over at least two points in time.

Pinsonneault and Kraemer (1993b) identify five important weaknesses of survey research: (1) single method designs where multiple methods are needed, (2) unsystematic and often inadequate sampling procedures, (3) low response rates, (4) weak linkages between units of analysis and respondents, and (5) over reliance on cross-sectional surveys where longitudinal surveys are really needed.

These issues were taken into account in designing our survey research:

(1) The survey employed a multiple method design of administering a questionnaire as well as conducting an unstructured and informal interview. Therefore qualitative analysis will be used to confirm the quantitative data analysis.

(2) There are about 3,000 cocoa cottages in the population, in 6 cocoa growing regions with about 200 farmers in each cottage. 300 farmers were sampled, drawn from 12 cocoa cottages in all 6 cocoa growing areas using a random stratified sampling method (See more on the sampling method used below in the segment on Data Collection & Analysis). This is therefore a representative sample of all cocoa farmers in Ghana.

(3) Face-to-face questionnaires and interviews were employed meaning response rates are likely to be high.
(4) The units of analysis are individual farmers and the respondents in the survey were also individual farmers.

(5) In this case, we believe that cross-sectional surveys serves the research interests better than longitudinal surveys as the study seeks to capture the perceptions of a sample population, which have been formed over a period of time. The research is not seeking to observe changes in their perceptions but rather a snapshot in time.

We also identified a need to control for social desirability bias, especially among the farmers as we have noted from a pilot study a tendency to defer to authority. One way of avoiding this is through indirect questioning. We noted however, that the literature advocates direct questioning for illiterates (in this case, peasant cocoa farmers) as against circuitous questioning which can be misinterpreted upon translation (Wuelker, 2001). In order to prevent this bias therefore, the literature advocates having a broader view of the situational context and sociological structures. This can be done through combining the survey with a field or qualitative study. The case study methodology in this research therefore provides a good contextual framework for the survey. We also asked more than one question in the design of the survey relating to the same general area of information, thereby re-validating the answers by investigating any huge divergence in answers to similar questions.

The rest of the chapter describes the data collection processes and analytical techniques used. We first begin by identifying the issues of an ethical nature and describe how these were addressed to minimise their impact on the results of the study. The following segment then details the pilot study that was conducted to test the questions used in the final survey; and then the data collection processes are further expounded.
3.5 Issues of Ethical Consideration

To address the ethical concerns associated with this potentially vulnerable population (i.e. illiterate individuals), several actions was taken by the researcher. This ethical statement was approved by the Research Committee of the University of Bath, meeting on the 1st of May, 2012.

- The researcher will obtain the informed consent of the respondents for the use and dissemination of the information collected. The purpose of the study will be clearly explained to the participants and time will be allowed for them to ask questions. In this fashion, despite their illiteracy, how their data will be used will be made explicitly clear to them.

- The confidentiality and anonymity of the research respondents will be respected. Specifically, full names will not be collected for the participants. Further, when information is disseminated, pseudonyms will be used. Through this process there will be no means by which to connect answers to specific respondents.

- The respondents will participate in the study voluntarily. They will be given a chance to opt-out at the beginning of the interviews and they will be told they can stop anytime they want.

- The interviewers will be trained to record responses directly, reducing the possibility of bias or non-independence shaping the responses given.

With the above processes in place, the ethical issues associated with the illiterate population were given fair and full consideration within the administration of the survey.
3.6 Pilot Study – Yamfo in the Brong Ahafo Region of Ghana

Yamfo is a cocoa farming cottage in the middle belt of Ghana. It is a small village in the Tano District of the Brong Ahafo region; one of the six cocoa growing regions in Ghana. The pilot study was conducted in order to get a better understanding of the cocoa farming industry and also to test the research questionnaire with at least 10 cocoa farmers. The field trip yielded several insights and informed the subsequent redesign of the research method. The trip took place in June of 2012 and was undertaken by the candidate.

The pilot study was unable to meet its goal of administering the questionnaire to 10 individual cocoa farmers due to a quite particular system of deference to elders which we had not been taken into account. While a number of farmers were present and engaged in the discussion, it was impossible to administer the questionnaire to each of them individually as they preferred the chief farmer to be their foremost spokesperson (Chief farmers are chosen by the traditional authorities of the community to represent cocoa farmers on the traditional council). This observation was therefore taken into consideration in designing the operationalisation of the main data collection as field assistants were employed to engage separately with the individual farmers. These observations, among others, are expressed below and subsequently informed the main research process;

- It was noted that the farmers in the community visited – Yamfo – were quite well organised and had respect for the social structure of the community.
- It was important to re-strategise on how to administer the questionnaires to the farmers especially since there was a reluctance to engage without the presence and participation of the cocoa elders of the community. This meant that though we planned to sample the views
of 10 farmers, we could only get to talk to the district chief farmer while all the other farmers gathered around and made their views heard. Hence, the idea to use trained research assistants in the main field work who will administer the questionnaire at the same venue, but on a one-to-one basis.

- The initial impression from the interactions was that the farmers felt they were in charge of their lives and livelihoods, and they discounted the impacts of COCOBOD. This was despite the fact that they had no real power in deciding the prices for their cocoa and conceded that the interests of their national representatives may be far removed from the ordinary farmer. It is also to be noted that 2011 had been a particularly good year for Ghana cocoa farmers as prices of cocoa on the world market was high and total production hit one million tonnes; the country’s highest ever level. This could in some way have influenced the general optimism of the farmers in Yamfo.

- There was little evidence of proper farmer-led associations among the farmers in Yamfo, rather there was the typical traditional Ghanaian community set-up formed around the extension officers and elders of the village; in this case the district chief farmers.

- Questionnaire items were found to be appropriate, though it was quite extensive and took some time to go through. It is based on this experience that the use of research assistants was advocated.

3.7 Data Collection

Ghana has 10 regions of administration of which 6 are cocoa growing areas. These are the Ashanti, Brong Ahafo, Eastern, Western, Volta and Central regions. There are about 3,000 cocoa cottages
in the population with about 200 full-time farmers in each cottage. Our sample for the survey was made up of 300 farmers drawn from 12 cocoa cottages representing all of the 6 cocoa growing regions. Data was collected using a questionnaire in a face-to-face interaction with the farmers. The interviews and survey covered issues relating to regional governance and social capital in the Ghanaian cocoa industry, with survey responses measured using a structured set of 7 point Likert scales. Details of the sampling frame of cocoa cottages and farms were readily provided by COCOBOD officials in each region which were then checked as being complete records by reference to publically available data on cocoa communities (and associated annual performance) published on COCOBOD regional noticeboards and/or in annual magazines published by each COCOBOD regional office. Such information appeared to be an exhaustive and unbiased record, although this could not be independently verified. A random stratified sampling approach was used by the survey team to select cottages from amongst the sampling frame, based on proximity and convenience (most cocoa cottages are not easily accessible) to regional capitals, although care was taken to include a wide dispersion of farmers from across the wealth distribution (within each region) and across regions. The district officials (Extension Officers) of COCOBOD helped to facilitate introductions with the farmers in the majority of our final sample. However, the responses for the Eastern region were low compared with other regions largely because in this region, we deliberately decided against utilising formal introductions from COCOBOD Extension Officers in order to explore for possible selection bias (in other regions) given the involvement of COCOBOD (in the introduction process). In practice the presence of the Extension Officers did not appear to unduly influence farmers in expressing their own opinions and, across all regions, farmers appeared to be as equally as forthright in their comments and not afraid to openly criticise COCOBOD and/or the officials present. The only noticeable difference was Eastern farmers were
collectively less able to organise themselves without the support of COCOBOD officials, which translated into low response rates for this region\textsuperscript{11}. Resource constraints prevented a direct approach to individual farmers who did not attend meetings organised at a central point, irrespective of whether they were organised by either the research team in isolation or with the assistance of COCOBOD.

The pilot study was first conducted in late 2011 in Yamfo in the Brong Ahafo region, as noted above, to enable a clearer understanding of the workings of a typical cocoa cottage, the regional governance structures involved, and the main players in order to inform the final survey instrument. The final administration of the survey was conducted between June 2012 and December 2012 through face-to-face interviews with each of the 300 farmers by the researcher and six independent Ghanaian field assistants who were all introduced as academic researchers exploring Ghana’s cocoa industry. Where necessary, the field assistants translated questions and responses from the local language (Twi) into English verbatim, so as to avoid any potential interpretation biases (Saunders et.al, 2009). To address any ethical concerns associated with this potentially vulnerable population (i.e. in the case of illiterate respondents), several precautions were taken in the data collection process (see Penslar, 1995) which were also first approved by the research team’s University ethics committee. First, the express and informed consent of the respondents was sought in relation to the use and dissemination of the information collected. Secondly, the purpose of the study was clearly explained to the participants and time was allowed for them to ask questions and seek assurances on the nature of the study and use of the data. Finally, the confidentiality and anonymity of the farmers was guaranteed and participation in the study was

\textsuperscript{11} For example, a relatively low number of farmers were present at a fora organised for our interaction by the chief farmer in Aprade in the Eastern region.
voluntary. Although, we survey-interviewed 300 farmers, only 257 responses are used in our study; this was due to non-responses to specific questions relevant to the current study. Furthermore, all participants were survey-interviewed individually (in private) in order to minimise the influence of cultural factors, including status and deference to the chief farmers.

The modus operandi was to first call on the Regional office of COCOBOD in each region to get information on the various districts offices under the regional body. We then make a random choice of the districts and cottages to visit based on proximity and convenience. Our next point of call was then the district offices, who then give us extension officers to introduce us to the farmers in our chosen cottages. By choosing our own cottages to visit, we minimized the risks of COCOBOD officials influencing our choice of participants and hence introducing bias into our study.

The interviews conducted were with COCOBOD officials at the Head Office and all six regional offices, and an official from the International Labour Organisation (ILO) in charge of Ghana’s cocoa communities. These were unstructured interviews and took place in the offices of these officials. These interviews complimented the interactions with 300 farmers in writing up on the qualitative aspects of our findings. The interviewer (the candidate) took copious notes during these interviews and summarized the points that were raised under the themes of governance and social capital within the industry.

The variables used in designing both the case study interviews and the survey are based on the issues around hierarchy, governance and social capital in Ghana’s cocoa industry. These were adapted from the literature on network analysis, governance structures and dimensions of social capital (See Scott, 1991, Wasserman & Faust, 1994, Sacchetti & Sugden, 2003, Tomlinson, 2011,
Tsai & Ghoshal, 1998, Morina-Morales & Martinez-Fernandez, 2009). These variables are detailed below in the next segment.

3.8 Variables & Questions

3.8.1 Variables for Case Study

The main indicators that were explored in the case study are derived from the literature on governance networks (See Scott, 1991, Wasserman & Faust, 1994, Sacchetti & Sugden, 2003). These include indicators for density, centrality, structure, main actors, linkages, description of network, goals of the network, inclusiveness, history & evolution, mapping of network, diagrammatic representation of network, institutional support, knowledge hubs and types of associations. These variables are important in describing the industry as in Chapter 4 below and also used in confirming the empirical findings on the relationship between social capital and the issues of governance in Ghana’s cocoa industry.

The questions that were derived from these variables were used in conducting informal and unstructured interviews with officials of COCOBOD in all six cocoa growing regions, 300 cocoa farmers and an officer in charge of cocoa communities in Ghana at the International Labour Organisation (ILO). The data collected from these interviews was supplemented by a review of the literature and data from official sources and reports. These are used in our description of the industry in Chapter 4 and also in our main discussions in Chapter 5 to 7. Interviews with COCOBOD officials and the official from the International Labour Organisation were all done
personally by the researcher; with six trained field researchers helping with the survey of the cocoa farmers. The indicators are detailed below and the questions used can be found in the Appendix.

**Table 4: Indicators for Case Study Research**

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Density</strong></td>
<td>This indicator identified the number of institutions, firms and individuals that make up the cocoa sector in Ghana. It looks at their locations and areas of concentration. This is analysed at both the national and cottage levels.</td>
</tr>
<tr>
<td><strong>Centrality</strong></td>
<td>The indicator identifies and analysis the centres for control and decision making and what the important decisions are in the industry. It seeks to establish in whose interests decisions are made.</td>
</tr>
<tr>
<td><strong>Structure</strong></td>
<td>This is to gain an understanding of how the entire structure of the industry works; from the cocoa bean planted by the farmer to the chocolate product in the hand of the consumer. It explores issues such as formality and hierarchy.</td>
</tr>
<tr>
<td><strong>Main Actors</strong></td>
<td>This is to identify all the relevant actors in the cocoa industry; from the local to national to international. It also analyses their roles, responsibilities and benefits in the industry structure.</td>
</tr>
<tr>
<td><strong>Linkages</strong></td>
<td>This indicator identifies the links and ties between the institutions, firms, cottages, associations and individual farmers in the sector. We note the strength or weakness of the ties, path of information flow and the type of relationships i.e. supplier, buyer, regulator etc.</td>
</tr>
<tr>
<td>Description of Network</td>
<td>How will the network be described; i.e. participant driven, lead organisation driven or bureaucratic, loose or organised etc.</td>
</tr>
<tr>
<td>---------------------------------------------------------------------------------------</td>
<td>----------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Goals of the Network</td>
<td>What are the identifiable goals of the network? Are these goals in the interest of farmers, Licensed Buying Companies, COCOBOD or Multinationals?</td>
</tr>
<tr>
<td>Inclusiveness</td>
<td>This looks at the membership of the network. What are the barriers to entry and exit; how open is membership at both the level of the individual farmer and also for the buying firms.</td>
</tr>
<tr>
<td>History &amp; Evolution</td>
<td>What are the timelines and major events in the development of Ghana’s cocoa industry? What stage is the industry currently and what is its market structure; perfect competition, oligopoly or monopoly?</td>
</tr>
<tr>
<td>Types of Associations &amp; Social Structuring</td>
<td>This indicator identifies the different types of farmer and LBCs associations present in the industry and the roles they play. It also looks at other forms of social structuring in the industry.</td>
</tr>
</tbody>
</table>

3.8.2 Variables for Survey

Variables and questions used in constructing the survey questionnaire were adapted from Tomlinson (2011) which included items utilised by Tsai & Ghoshal (1998) and Morina-Morales & Martinez-Fernandez (2009), and this is remodelled to fit our current research. These include measures for Social Capital (segmented into Regulator Connectedness, Associations Connectedness, Horizontal Connectedness and Partners Connectedness), Motivations, Shared Values and Perceptions on Governance.
Below is a breakdown of the relevant variables employed in our questionnaire for statistical analysis.

Regulator Connectedness

This measure is adapted from Tomlinson (2011) and is concerned with the social relations between individual farmers and the COCOBOD. The questionnaire items include both open ended questions that seek to get a sense of personal feeling, and questions in a Likert scale from 1-7 with 1 representing ‘Never’ or ‘Very Poor’ to 7 for ‘Always’ or ‘Very Good’. This social capital measure also seeks to narrow down to the linking relationships between the farmers and the industry regulator as identified in Woolcock & Narayan, 2000 and reviewed in Chapter 2.

Associations Connectedness

This measures the participation and attendance levels of individual farmers in their industry associations and groups. This relates to bridging social capital (Woolcock & Narayan, 2000), which is to do with the social connections across different groups. The measure is for the local, regional, national and international levels and will show individual participation at all these levels of social organisation. The question items are adapted from Tomlinson (2011) and are on a Likert scale of 1-7 with 1 for ‘Never’ and 7 for ‘Always’.

Horizontal Connectedness

This is a measure of the bonding relations among farmers. It seeks to measure how many social interactions an individual gets involved in the industry. This is a very important form of social capital as from the review of literature it can be argued that this brings about the benefit for industry
participants (See Wu & Pretty, 2004). The items used are on a 7 point scale and adapted from Tomlinson (2011), with 1 representing ‘Strongly Disagree’ and 7 stands for ‘Strongly Agree’.

**Partners Connectedness**

The fourth type of social capital measure is concerned with the relationships between the farmers and the Licensed Buying Companies (LBCs). This indicates the level of co-operation between the two industry participants and is significant both on the individual level and as an aggregation. It is comprised of both open ended and close ended questions. The open ended questions identify the different partners on both sides and the nature of the partnership; whether local, regional national or international. The close ended questions are on a 7 point scale with 1 standing for ‘Low Co-operation’ and 7 for ‘High Co-operation’. The question items were adapted from Tomlinson (2011)

**Shared Values**

Shared Values relate to set of ambitions or vision that is shared among the participants in an industry. This measure seeks to understand whatever common goals are shared in the industry and if the individuals involved feel strongly about this common goals. We understand from a review of the literature that this is an important motivation for social engagement. The question items are adapted from Tomlinson (2011) and are on a 7 point scale with 1 – Strongly Disagree and 7 – Strongly Agree.

**Motivations – Logic of Membership & Logic of Influence**

From the review of literature, logic of membership and the logic of influence are important motivations for social engagement in industry associations. At the same time they are inversely related in that if an association possesses one of these characteristics, it will tend not to have the
other. Different participants are also attracted to associations based on either characteristic. The items for this measure are adapted from Tomlinson (2011) and are on a 7 points scale from 1 as ‘Strongly Disagree’ to 7 as ‘Strongly Agree’.

Perceptions of Governance

This is a measure of the individual farmer’s perception of the hierarchical structuring of the cocoa industry; particularly about how they feel about the regulation powers and strategic decision making of COCOBOD. It deals with the issues of governance identified in the ‘Strategic Choice Framework’ as discussed in Chapter 2 above including questions on trust, representativeness, transparency, effectiveness and personal involvement. The question items are on a 1-7 Likert scale from ‘Never’ and ‘Very Bad’ to ‘Always’ and ‘Very Good’.

Productivity

This measures the level of productivity; comprised of profitability and turnover for the past three years. It is a close ended question requiring a choice among increasing, decreasing or stable. Both the items for turnover and profitability are adapted from Tomlinson (2011).

Control Variables

The control variables include ownership of business, size of business, age of business, size of revenues, age of farmer, size of farmer’s household, educational level of farmer and dummies for the six cocoa growing regions.

The variables and questions are detailed in the Appendix. The full questionnaire can also be found in the Appendix.
3.9 Data Analysis Process

Data analysis for the survey was done using the statistical analysis software SPSS. Data was first entered into Microsoft’s Excel and then extracted into SPSS. The analyses in Chapters 5 to 7 use the data in the SPSS spreadsheet to construct its variables to test the various hypotheses that are addressed by these chapters. The process for constructing these variables are described in detail in the respective chapters.

Some descriptive statistics on the farmers surveyed are outlined in table 5 below. Most of the farmers surveyed owned their farms. These were however, mostly small farms with less than 5 workers. About 70% of farmers had basic education and 90% of them earned less than £1,000 annually. Finally, more than 90% of farmers have had no experience of the industry above the local communities in which they live and work.

**Table 5: Descriptive Statistics on Respondent Farmers**

<table>
<thead>
<tr>
<th>Indicators</th>
<th>Percentage/Results</th>
</tr>
</thead>
<tbody>
<tr>
<td>Respondents that own their farms</td>
<td>81.3%</td>
</tr>
<tr>
<td>Farmers with less than 5 employees</td>
<td>74.3%</td>
</tr>
<tr>
<td>Farmers with more than 15 employees</td>
<td>1.6%</td>
</tr>
<tr>
<td>Farmers with no education</td>
<td>28%</td>
</tr>
<tr>
<td>Farmers with Primary education</td>
<td>71.08%</td>
</tr>
<tr>
<td>Farmers with Tertiary Education</td>
<td>4.7%</td>
</tr>
<tr>
<td>Farmers with more than 10 years’ experience</td>
<td>42.80%</td>
</tr>
<tr>
<td>Average number of years in farming</td>
<td>10.93 years</td>
</tr>
<tr>
<td>Description</td>
<td>Percentage</td>
</tr>
<tr>
<td>-----------------------------------------------------------------</td>
<td>------------</td>
</tr>
<tr>
<td>Farmers who earn less than £1000 annually</td>
<td>89.43%</td>
</tr>
<tr>
<td>Average earnings of farmers in the sample</td>
<td>£642.44 annually</td>
</tr>
<tr>
<td>Farmers reporting increasing profitability</td>
<td>63.04%</td>
</tr>
<tr>
<td>Farmers reporting stable profitability</td>
<td>17.51%</td>
</tr>
<tr>
<td>Farmers reporting decreasing profitability</td>
<td>19.46%</td>
</tr>
<tr>
<td>Farmers with only local relationships in the industry</td>
<td>91.83%</td>
</tr>
<tr>
<td>Farmers aged below 40 years</td>
<td>17.28%</td>
</tr>
<tr>
<td>Farmers aged above 60 years</td>
<td>34.16%</td>
</tr>
</tbody>
</table>
Chapter 4 – Ghana’s Cocoa Industry: A Case Study

4.1 Introduction

Ghana is the world’s second largest supplier of cocoa after the Ivory Coast. The sector accounts for 40% of agricultural exports and 12% of the country’s Gross Domestic Product (GDP). Over 400,000 families and 1 million people are employed in the cocoa industry. Despite being a successful billion dollar industry, low productivity and incomes remain an issue for most cocoa farmers and the buying companies (See Baah, 2008, Viguen, 2007, Teal et al., 2006).

Ghana allocates over 1.6 million hectares to cocoa farming and accounts for approximately 22% of global cocoa production. Cocoa farming is organised through cocoa cottages - of which there are over 3,000 - and handled by an estimated 600,000 farmers in six cocoa growing regions. These regions are Western, Ashanti, Brong Ahafo, Eastern, Central and Volta, and in Table (6) we provide some further details of their regional characteristics. Across all regions, the rural economy is highly significant, with agriculture accounting for a high proportion of employment (with farming communities typically engaged in agricultural activities over several generations).

In terms of cocoa, Western is the largest cocoa producing region, largely because of its very fertile ground conducive to cocoa plantation. It is also the most densely populated region in terms of the number of farms per capita and square kilometre (see Table 6 below). The other regions, however, are still significant cocoa producers, although their (regional) economies are more diversified in terms of crop production. Eastern region, for instance, initiated cocoa production in Ghana, with

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12 Ghana has ten administrative regions, of which six specialise in Cocoa production.
13 In addition, some of these regions have significant mining industries. For instance, Ashanti is renowned for its gold mines (owned by Anglogold Ashanti), while the Central region is endowed with rich minerals including gold, beryl and bauxite in the Upper Denkyira District; petroleum and natural gas at Saltpond; kaolin in the Mfantsiman district; diamond at Nwomaso, Enikokow, Kokoso all in the Asikuma-Odoben-Brakwa District, tantalite and columbite at
the first farm established at Mampong-Akwapim, while the region also hosts the Cocoa Research Institute at New Tafo. Across all regions, farming methods vary, with traditional farming techniques being employed alongside more modern land management system and plantation style farms. In some regions, notably in Brong Ahafo, mechanisation and the use of modern crop management systems are relatively low.

Table 6: Ghana’s Cocoa Regions

<table>
<thead>
<tr>
<th></th>
<th>Western</th>
<th>Ashanti</th>
<th>Brong Ahafo</th>
<th>Eastern</th>
<th>Central</th>
<th>Volta</th>
</tr>
</thead>
<tbody>
<tr>
<td>Regional Capital</td>
<td>Sekondi-Takoradi</td>
<td>Kumasi</td>
<td>Sunyani</td>
<td>Koforidua</td>
<td>Cape Coast</td>
<td>Ho</td>
</tr>
<tr>
<td>Total Cocoa Production (metric tonnes)</td>
<td>480,250</td>
<td>130,900</td>
<td>81,600</td>
<td>80,750</td>
<td>75,650</td>
<td>850</td>
</tr>
<tr>
<td>Share of Cocoa Production (%)</td>
<td>56.5</td>
<td>15.4</td>
<td>9.6</td>
<td>9.5</td>
<td>8.9</td>
<td>0.1</td>
</tr>
<tr>
<td>% of households engaged in crop farming</td>
<td>47.6</td>
<td>35.4</td>
<td>66.2</td>
<td>56.1</td>
<td>48.4</td>
<td>54.7</td>
</tr>
<tr>
<td>Land Size (sq. km)</td>
<td>23,921</td>
<td>24,389</td>
<td>39,557</td>
<td>19,323</td>
<td>9,826</td>
<td>20,570</td>
</tr>
<tr>
<td>Population</td>
<td>2,376,021</td>
<td>4,780,380</td>
<td>2,310,983</td>
<td>2,633,154</td>
<td>2,201,863</td>
<td>2,118,252</td>
</tr>
<tr>
<td>Urban Population as a % of Total Population</td>
<td>42.4</td>
<td>60.6</td>
<td>44.5</td>
<td>43.4</td>
<td>47.1</td>
<td>33.7</td>
</tr>
<tr>
<td>Political Administration Districts</td>
<td>22</td>
<td>27</td>
<td>19</td>
<td>26</td>
<td>17</td>
<td>25</td>
</tr>
</tbody>
</table>


Nyanyano in the Awutu-Efutu-Senya District. The Eastern Region also contains Ghana’s only commercial diamond mine at Akwatia.
In terms of structure, a typical cocoa cottage is a farming village comprising of approximately 200 families engaged in farming, together with two or three Licensed Buying Companies (LBC), which sell to the industry’s regulator and sole buyer, Ghana’s Cocoa Board (COCOBOD) at a guaranteed price (see Fold, 2002). COCOBOD has a regional office in each of the six cocoa growing regions and these are responsible for regional governance and coordination of COCOBOD activities, while the Head Office is based in the Ghanaian capital, Accra. Farmers deal exclusively with their regional COCOBOD offices (and officials, known as Extension Officers), which have significant local autonomy, particularly in the governance of local cocoa growing activities and managing extension services such as the training of farmers, crop disease and pest control, and crop rehabilitation projects. In addition, there are a number of associations in most farming cottages. The most important are Farmers’ cooperative marketing organisations, Cocoa farmer marketing societies, Farmers marketing input companies, Cocoa farmers’ production associations, and Farmers’ assistance societies (Baah, 2008). Licensed Buying companies have also been created through cooperatives of farmers (Santos & Vigneri, 2007). Baah (2008) has identified several benefits these associations bring to the farming communities, notably increased bargaining power and the exchange of ideas and resources.

Unlike most other cocoa producing countries in the world, the Ghana Cocoa Board (COCOBOD), a government regulator, is the sole buyer of cocoa for all farmers in Ghana through the privately owned Licensed Buying Companies (LBCs). Fold (2002) acknowledges the uniqueness of Ghana’s cocoa supply chain, describing it as a ‘relic from the past’ when most agricultural industries in West Africa were run by state regulating boards.

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14 For a brief history of Ghana’s cocoa industry, see Leiter and Harding (2004).
The rest of the chapter now looks at the global value chain of cocoa identifying the process from production to finished products and the major players that dominate the industry. There is a discussion on the role of COCOBOD, the industry regulator and other participants within Ghana’s cocoa sector; Farmers and the Licensed Buying Companies. We also draw insights from the interviews with such participants around the themes of governance and social capital that are central to this thesis. The chapter ends with a summary.

4.2 Cocoa & the Global Value Chain

Cocoa is a tropical cash crop and export commodity first cultivated in Central America and is the main ingredient in the production of chocolate, cocoa drinks, butter, powder and liquor. The main producing countries of cocoa today are Ivory Coast, Ghana, Nigeria, Indonesia, Malaysia and Cameroon. Africa produces half of the world’s cocoa (Carr, 2004, See Table 7 below for global production figures). Cocoa is not cultivated in the European Union and the US which are the major markets for chocolate; the main product of cocoa. However, almost all of the grinding and manufacturing into finished products takes place in developed countries in Europe and the United States.

Table 7: Global Production of Cocoa Beans (‘000 tonnes)

<table>
<thead>
<tr>
<th></th>
<th>2012/13</th>
<th>Estimates 2013/14</th>
<th>Forecasts 2014/15</th>
</tr>
</thead>
<tbody>
<tr>
<td>Africa</td>
<td>2,836</td>
<td>3,197</td>
<td>2,984</td>
</tr>
<tr>
<td>Cameroon</td>
<td>225</td>
<td>211</td>
<td>220</td>
</tr>
<tr>
<td>Cote D’Ivoire</td>
<td>1,449</td>
<td>1,746</td>
<td>1,740</td>
</tr>
<tr>
<td>Ghana</td>
<td>835</td>
<td>897</td>
<td>696</td>
</tr>
<tr>
<td>---------------</td>
<td>-------</td>
<td>-------</td>
<td>-------</td>
</tr>
<tr>
<td>Nigeria</td>
<td>238</td>
<td>248</td>
<td>235</td>
</tr>
<tr>
<td>Others</td>
<td>89</td>
<td>95</td>
<td>93</td>
</tr>
<tr>
<td>America</td>
<td>622</td>
<td>708</td>
<td>729</td>
</tr>
<tr>
<td>Brazil</td>
<td>185</td>
<td>228</td>
<td>215</td>
</tr>
<tr>
<td>Ecuador</td>
<td>192</td>
<td>220</td>
<td>250</td>
</tr>
<tr>
<td>Others</td>
<td>246</td>
<td>260</td>
<td>264</td>
</tr>
<tr>
<td>Asia &amp; Oceania</td>
<td>487</td>
<td>454</td>
<td>455</td>
</tr>
<tr>
<td>Indonesia</td>
<td>410</td>
<td>375</td>
<td>370</td>
</tr>
<tr>
<td>Papua New Guinea</td>
<td>41</td>
<td>40</td>
<td>42</td>
</tr>
<tr>
<td>Other</td>
<td>36</td>
<td>38</td>
<td>43</td>
</tr>
<tr>
<td>World Total</td>
<td>3,945</td>
<td>4,359</td>
<td>4,168</td>
</tr>
</tbody>
</table>


The global value chain of cocoa starts with the producers of the raw cocoa beans. These are then sold to trading companies who pass this on to the grinding firms. These grinding firms usually produce cocoa products in their semi-finished to finished forms such as paste, butter and powder, and then sell these to other firms who retail the finished products under various brand names. These major multinationals dominate the chocolate industry; Mars, Mondelez, Nestle, Meiji, Ferrero and Hershey and is an industry worth over $80 billion globally. The largest six chocolate companies constitute about 60-70 percent of the world market.\(^{15}\)

\(^{15}\) [http://www.icco.org/about-cocoa/chocolate-industry.html](http://www.icco.org/about-cocoa/chocolate-industry.html)
The major grinding companies for cocoa are Callebaut, Cargill, ADM and E.D.& F. Man. Barry Callebaut is currently the world’s largest grinder, followed by Cargill and ADM. Below the grinders in the value chain are the trading companies. The major transnational corporations that currently operate in Ghana’s cocoa industry include the trading company Continaf, and Cadburys which uses Ghanaian cocoa beans to manufacture global brands such as Cadbury Dairy Milk, Flake, and Creme Egg. Buhler, another foreign investor and the world’s second largest cocoa exporter, supplies machinery to facilities in Ghana, enabling operations in the country to not only harvest the beans but process them into cocoa butter and powder. In 2004, Buhler was awarded a multi-million euro contract to expand facilities in Ghana as part of the country’s aim to process 40 per cent of the nearly 1,000,000 metric tonnes of cocoa it produces each year. Major Swiss cocoa processor Barry Callebaut has also expanded its operations in Ghana - doubling the facility's bean processing capacity in recent years. Cocoa processor, Cargill and Olam International are other major transnationals operating in Ghana. Not all the major international firms have set up in Ghana, though it is the world’s second largest producer of cocoa because Ghana’s cocoa has one sole buyer and that is the Ghana Cocoa Board (COCOBOD) (Fold, 2008). This unique system will be further elaborated on in the next segment.

It is important to note here that the structuring of the global value chain and the dominance of the global cocoa industry by large elite transnational companies means that agricultural producers of cocoa are more or less price takers and the market is essentially ‘buyer-driven’ (Fold, 2002). There is however, the Fair Trade Organisation that has sought to encourage a fairer deal for farmers by urging the major companies in the value chain to pay a higher price for cocoa and thereby get their goods branded as fair trade. For example, Cadbury uses fair trade cocoa in manufacturing its

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16 This is relevant to the issues of ‘strategic failure’ in globalised industries discussed in Chapter 2
Dairy Milk chocolate bar and cocoa drink products, and more manufacturers have in recent years recognised the need to support sustainable production in the face of a potential impact on cocoa production by climate change. London-based Divine Chocolate, is not just fair trade, but is actually 45% owned by a collective of cocoa farmers in Ghana. These farmers get the same percentage of corporate profits, and have two seats on the board of the company. Despite this progress, the fair trade market accounts for just about 0.5% of the total global market17.

The next segment discusses the role of COCOBOD in Ghana’s cocoa industry.

4.3 Ghana’s Cocoa Sector & COCOBOD

Cocoa farming in Ghana is carried out on small farms unlike in other parts of world, where farming is usually on plantations with large-scale production. In Ghana, families work together on their farms, often with a few hired hands. The process of farming is unmechanised and farms are usually inheritances from the extended family (Carr, 2004).

Ghana was the world’s leading cocoa exporter from the 1920s to the 1970s when it lost its place to the Ivory Coast. The sector however, remains a significant contributor to government revenue and employs more than 1 million people. COCOBOD was formerly the West African Produce Control Board, which was established by the British Colonial Authorities in 1940, to purchase cocoa under guaranteed prices from all West African countries. In 1947, the use of Buying Companies was introduced to handle the internal buying process. This governance structure remained in place until Ghanaian independence in 1957, when it is replaced by the United Ghana

17 http://www.icco.org/about-cocoa/chocolate-industry.html
Farmers’ Co-operative Council, which purchased cocoa from Ghana’s farmers on behalf of COCOBOD. By 1992, the system of using licensed buying companies in the regional cottages had been reinstated and there are currently twenty seven Licensed Buying Companies operating in Ghana’s cocoa industry, although ultimately COCOBOD is the sole buyer of Ghana’s cocoa (at a guaranteed price). COCOBOD today, through the licensed buying companies pays a percentage of the producer price to the farmers.

There is a procedure for the price-setting which includes representatives of farmers, Licensed Buying Companies, transport companies, the Ministry of Finance, Bank of Ghana and COCOBOD’s marketing arm (Fold, 2002). This system of price setting was part of reforms instituted by the Ghanaian government in 1984 with the setting up of a committee known as the Producer Price Review Committee (PPRC). The PPRC is responsible for determining how the cocoa revenues are divided between the various parties involved in Ghana’s cocoa industry and meets once a year (Amoah, 1998, Fold, 2002). According to Williams (2009), the Committee follows a structured and technically-based process that takes into account the projections of cocoa revenues and also costs of the marketing agents along the value chain. The focus of the deliberations of the committee is to facilitate consensus and present a fair and open process for all the parties. It also enables the parties to have information of expected revenues before the cocoa season starts. It is however, noted that cocoa farmers who represent the largest concerned party are not a dominant voice in the PPRC discussions (Williams, 2009). All the other players, with even more negotiation and strategic power are usually set on getting higher margins for their interest groups.

Also, while local and foreign grinding and branding companies are not invited to this price setting forum, major companies such as Continaf, an international cocoa trading company operating in
Ghana; and Cadbury which buys all its cocoa for the UK from Ghana, are known to impact the prices through demand power. Since 2001, COCOBOD has committed to passing on at least 70% of the free-on-board\textsuperscript{18} price to farmers (Carr, 2004).

In recent times, COCOBOD has been described as ‘efficient’\textsuperscript{19} (Carr, 2004) and also its position as a single exporter puts its subsidiary; the Cocoa Marketing Company (CMC) in a strong bargaining position with major transnational organisations unlike other countries. The CMC sells Ghana’s cocoa by tendering and negotiating sales through the Ghana Cocoa Buyers’ Association of London. Transnational firms that wish to bid for Ghana’s cocoa must join this association and then compete with each other for the premium quality cocoa that COCOBOD offers (Williams, 2009). The Cocoa Marketing Company is also known to pay claims promptly to the Licensed Buying Companies for certified cocoa, which in turn pay the farmers who sell to them.

The activities of COCOBOD has however, been blamed for the fact that Ivory Coast overtook Ghana as the highest producer and exporter globally\textsuperscript{20} (See Williams, 2009). While the actions of COCOBOD in its early years helped in price stabilisation for the farmers, they acting as a marketing board used their powers to drain off resources away from the agricultural sector. This was done by setting farmer payments below world prices effectively levying a tax on farmers (Bates 2005), which in turn discouraged farmer’s production and dampened income. Government then used whatever surpluses from the sector to fund projects that did not inure to the direct

\textsuperscript{18}The free-on-board price is the price COCOBOD sells cocoa to foreign buyers. The costs of buying and transporting cocoa are included in the price, while the profit margin made by COCOBOD is excluded.

\textsuperscript{19}COCOBOD’s hierarchical structuring of the industry has also been described as ‘Weberian’ (Williams, 2009). A ‘Weberian’ organisation as coined by Max Weber, one of the fathers of organisation theory stands for the dominance of hierarchical, professional, and rules-based bureaucracy as the norm for public administration. The classic Weberian bureaucracy is also about the prioritisation of rules and objectivity over flexibility and efficiency (Weber, 1946). This relates to our understanding of COCOBOD as a hierarchy with the problems associated with such structuring.

\textsuperscript{20}This however, came at a political cost to the Ivory Coast culminating in a civil war in 2002 (Crook, 2001, Global Witness, 2007).
benefits of the farmers or take into considerations the wishes of the farmers and other industry participants. Further politicisation of the COCOBOD resulted in jobs within the agricultural marketing system becoming rewards for party loyalty, and the regulator got bloated and costly with underqualified staff (Williams, 2009). For example, in 1985 over 100,000 government employees worked in the cocoa sector with the existence of nearly 25,000 ‘ghost’ workers on the cocoa wage roll (Commander et al. 1989). As part of the government reforms initiated in 1984, the COCOBOD staff went from over 100,000 employees in 1985 to about 60,000 by 1986. The staff reductions continued within the COCOBOD as the recovery picked up in recent years, going from 10,400 employees in 1995 to 5,140 in 2003 (Williams, 2009).

Despite the recent successes of COCOBOD, margins that go to farmers in Ghana have been lower than those for farmers in other cocoa growing countries (Santos & Vigneri, 2007). This is despite the fact that Ghana’s cocoa commands premium price on the global market due to its high quality and buyers are willing to pay in advance (Fold, 2002). This advanced revenue flow as well as any expected price forecasts informs the local producer pricing set for every cocoa season. The profit margins of COCOBOD itself and the export taxes imposed by the government however, results in farmers receiving less for their cocoa. The Licensed Buying Companies have also had to work under heavily regulated circumstances which hamper their ability to be profitable. These criticisms of the COCOBOD structure are countered with the arguments of the ready market COCOBOD provides and the additional benefits it gives to farmers, such as research and extension services, bonuses and child scholarships (Asante-Poku & Angelucci, 2013). Ghana’s cocoa farmers have

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21 Raising issues of ‘strategic failure’ where farmers from whom these surpluses are raised have no say in the use of these funds.
22 Ghana’s export tax for cocoa is presently set at approximately 25 percent and COCOBOD’s marketing costs are deducted before the Free-on Board price is calculated (Kolavalli and Vigneri, 2011). Receipts from cocoa export taxation currently account for a share of 4 to 5 percent of total government tax receipts (Ghana Budget Statement 2015)
also gotten an increasing share of cocoa revenues over time (currently 70 per cent of the FOB price) (Williams, 2009) though the 70 per cent mark is not unusually high compared to other cocoa marketing systems in the sub region, where many farmers earn 60–80 per cent of the FOB price (Bulir 2002).

As stated above COCOBOD has a presence in all six cocoa regions with an office in every region and each of which is responsible for the governance and coordination of COCOBOD activities in several districts. The administrative work of COCOBOD is carried out at the Head Office in the capital city of Ghana, Accra. The Chief Executive is the overall administrative head of COCOBOD. He is assisted by three Deputy Chief Executives who have administrative responsibilities for Finance and Administration, Agronomic and Quality Control and Marketing. There are eight Directors at COCOBOD Head Office responsible for Human Resource, Research, Audit, Finance, Medical, Legal, Special and General Services. In addition, there are seven Departments which are headed by Departmental Heads. These are Public Relations, Security, Procurement, Scholarships, Information Technology, Estates and Transport.

The governance and direct supervision of farming activities and the farmers is however devolved to the regional offices which are run by Regional Chief Directors. The activities carried out at the regional offices include extension services, the training of farmers, crop diseases & pests control and crop rehabilitation projects. The main job of these regional officials is to support the work of the farmers and Licensed Buying Companies and we will now address the roles and functions of these participants in Ghana’s cocoa industry.
4.4 Participants in Ghana’s Cocoa Industry; Cocoa Farmers & Licensed Buying Companies

There are over 1 million Ghanaians working in the cocoa industry. Although most cocoa production is carried out by peasant farmers on plots of less than 3 hectares, a small number of farmers appear to dominate the trade. Some studies show that about a quarter of all cocoa farmers receive just over half of total cocoa income (Fold, 2002). This means that most cocoa farmers and their households are listed among the poorest people in Ghana despite accounting for a substantial portion of the exports of the country.

Typically, farmers in Ghana receive a lower markup margin on their cocoa in comparison to other West African cocoa growing countries, due to the system of using Licensed Buying Companies and the high export margins that COCOBOD makes. Ghanaian cocoa farmers therefore receive a lower share of the world price compared to farmers in other countries (Santos & Vigneri, 2007). This is despite the fact that COCOBOD pays in recent times more than 70% of the free-on-board price to farmers. The calculation of the free-on-board price itself is sometimes murky and very few farmers who are mostly illiterate can understand fully the workings of it. In 2006/2007 for example, COCOBOD’s own profit margin on the net free-on-board price was around 45%. COCOBOD however, argues that a substantial part of this margin is re-invested in farmers’ special bonuses, scholarships for children of farmers, and the construction of feeder roads to farming communities (Fold, 2002).

There has been a rebound in cocoa production in Ghana since 2000; with a record 1 million tonnes recorded in 2011. This has provided more favourable terms to farmers in terms of price for their cocoa and seems to have reinvigorated the farmers’ faith in the COCOBOD system as observed by the researcher during the field trip to 12 cocoa growing cottages across the country. However,
this is almost immediately having a negative effect as increased supply over demand in the world cocoa market from 2011 to 2013 is causing a sharp fall in global cocoa prices and has resulted in renewed hardships for the cocoa farmers.

The other major participants in the cocoa industry are the Licensed Buying Companies (LBCs). The early 1990s witnessed a change in the organisation of production and marketing in the cocoa sector which opened up for Licensed Buying Companies. This ended the role of COCOBOD’s Produce Buying Company (PBC) as the sole purchaser of cocoa beans from farmers. There are now about 27 private licensed buying companies (LBCs) operating in all the cocoa growing regions in Ghana (Santos & Vigneri, 2007). The Produce Buying Company, now privatised, however, remains the dominant buying firm.

Licensed Buying Companies do not compete in terms of price since COCOBOD fixes a floor price and it is of little value to set premium prices. They compete using non-price strategies such as prompt cash payments and provision of input subsidies and informal credit (Santos & Vigneri, 2007). There are about 3,000 cocoa cottages where LBCs buy cocoa from farmers. This is usually done using ‘cocoa clerks’ of the LBCs. The LBCs then present the cocoa to the Quality Control Division (QSD) of COCOBOD who will then check, grade, bag and seal the cocoa beans for export. The LBCs are then paid by COCOBOD for the cocoa and the LBCs in turn pay the farmers the agreed price for their cocoa through their purchasing clerks in the cocoa cottages.

The purchasing market is dominated by five LBCs; the Produce Buying Company with about 60% of the market and acting as a buyer of last resort; Kuapa Kokoo, a farmers’ cooperative that works with Fair Trade and owns the Divine Chocolate firm in the UK, Adwumapa and Olam & Armajaro which are foreign owned firms from Singapore and UK respectively (Santos & Vigneri, 2007).
Of the 27 LBCs operating in the country, about half of them are dormant because of financial and managerial difficulties. This is also due to the lack of flexibility because of the floor price set by COCOBOD and a cap on how much they can export on their own. The rigid system of quality control also adds a lot of costs to the buying process and most LBCs have expressed a wish to speed up the process either by reducing the number of quality checks or by the privatisation of the quality process – currently only the Quality Control Division of COCOBOD undertakes quality testing.

LBCs are usually pre-financed with loans from COCOBOD who borrow from abroad for the cocoa season based on their expectations of the annual production. Under the current system, LBCs have few incentives for higher performance and don’t have the financial prowess to significantly transform their relations with farmers. LBCs traditionally receive less than 10% of the free-on-board price and this can be reduced by COCOBOD without much resistance as the relationship between COCOBOD and the LBCs tends to be very hierarchical. COCOBOD must renew the licenses of all LBCs every year and can therefore punish any form of dissension by any company.

Market power also remains strongly in the hands of COCOBOD as a sole buyer (Laven, 2007). Margins paid to Ghana’s LBCs are therefore one of the lowest in the sub region of West African cocoa producers (Santos & Vigneri, 2007).

This evidently raises the issues of ‘strategic failure’ as discussed above as the power to make strategic decisions is taken out of the hands of these LBCs and placed under the direction and authority of the COCOBOD. It is evident that the LBCs are worse off under the present governance structure (See Fold, 2002).
Figure 3: Governance of Ghana’s Cocoa Industry; Source: Author’s Creation utilising information in Mohammed et.al., 2011, World Bank Report, 2011
Also, in line with our notions of strategic choice and issues of participation is the fact that most cocoa farmers in Ghana and in the African region as a whole do not consume raw cocoa and there is no local market for the produce. The final end use of the commodity by big transnationals is therefore far removed from the experiences and knowledge of the ordinary farmer (Carr, 2004). This situation is further deepened by the role of COCOBOD acting as a sole mediator meaning that farmers do not have any insight or contacts in the international market. This lack of international exposure and the iron control by COCOBOD has left some of the farmers complaining of a loss of dignity and the fact that they have simply ended up becoming ‘tree-minders’ (Carr, 2004). This is an expression which is quite apt, taking into consideration that it takes a cocoa tree about four years from planting to produce its first fruits and ten years to reach peak production.

This intense regulation of the industry by COCOBOD is against the backdrop of a number of social interactions. There are a number of associations that exist in most farming cottages. Five identified types in the literature are Farmers’ cooperative marketing organisations, Cocoa farmer marketing societies, Farmers marketing input companies, Cocoa farmers’ production associations and Farmers’ assistance societies (Baah, 2008). Buying companies also organise as cooperatives of farmers; though there is little evidence that the LBCs actually cooperate among themselves. Baah identifies various benefits that these social engagements bring to the farming communities including increased bargaining power and the exchange of ideas and resources. The development of effective farmer associations is however, constrained by COCOBOD’s domination, little resources and a lack of managerial competences (Baah, 2008). In line with this, Laven (2007) notes that farming associations in Ghana tend to be weak as compared to other cocoa producing countries. These varying social interactions will be very important in our explorations of the
empirical evidence for social capital’s impact on governance within the industry in Chapter five to seven of this thesis.

The next segments discuss the insights from the interviews conducted with farmers and the officials of COCOBOD in all six cocoa growing regions.

4.5 Interviews on the State of the Industry

We have identified Ghana’s cocoa sector as relatively ‘successful’ but also hierarchical in its governance set-up. This structuring will tend to hamper the socio-economic development of participants in the industry, especially bottom-of the-pyramid participants (See Cowling & Sugden, 1998). In my field trips during the survey of Ghana’s cocoa farmers I noted that most of the farmers interviewed were poor, producing at a subsistence level and the industry was being dominated by older people, with the youth unwilling to engage in cocoa farming because they viewed it as unprofitable and an unpromising source of regular income as well as very laborious. The main problems of these farmers were the onset of cocoa diseases that were difficult to treat; a situation further exacerbated by the lack of the promised regular pesticide spraying of their cocoa farms by the COCOBOD. The farmers, among other things, complained about delays in the payment of their bonuses by COCOBOD, and the lack of financial credit from either COCOBOD or the Licensed Buying Companies. The farmers lacked financial independence; with no bank accounts or bank loans and were entirely dependent on the prompt payment of their cocoa by the Licensed Buying Companies.

The COCOBOD officials we interviewed on the other hand identified their role in the industry as restricted to the regulation and supervision of the farming practices and activities, as well as the
provision of services to the farmers aimed at achieving the country’s production targets for the cocoa season. They insisted that they do this very effectively by guaranteeing the purchase of the farmers’ cocoa at a reasonably good price; providing the incentive for farmers to be productive. This point is also argued in Wilcox & Abbott (2006) that a purchase guarantee for the farmers reduces their vulnerability to changing economic trends and market prices, also allowing the price uniformity to benefit farmers all over the country equally. The COCOBOD officials also enumerated other benefits they give to the farmers including Extensions Services, Farm Spraying Exercises, Application of Free Fertilizers, Regional Cocoa Clinics for farmers and their wards, Cocoa feeder roads, Scholarships for children of farmers up to the tertiary level and an annual bonus on farmers’ sales.

The interviewers however, after our interactions with 300 cocoa farmers and COCOBOD officials across all the six cocoa growing regions, could only express frustration at the state of Ghana’s cocoa industry. We had met very hard working and enthusiastic farmers everywhere we went but there seemed to be no overall strategic plan to help these farmers build better enterprises and boost Ghana’s cocoa production in the long term. The governance system appeared to be very predatory, with the high-level disassociated officialdom we met in the COCOBOD Head Office using more-embedded local district officers to keep a well-oiled system that delivers high returns to the country (i.e. government) but very little financial rewards for the farmers themselves.

In summary, we observed that COCOBOD’s governance structure though a huge bureaucracy was quite efficiently run, especially at the local level. The most effective intervention of COCOBOD in the industry as we witnessed was the work of the Extension Officers who are extremely well embedded in the localities and respected by the farmers. However, delivery of other services such as the spraying exercise, bonuses and scholarships are erratic at best with some of the farmers
complaining that the cocoa scholarships were being given to persons who were not farmers but rather insiders and cronies of COCOBOD officials further raising issues of corruption in the industry’s governance.

4.6 Interviews on the Social Capital in the Industry

In terms of the social capital across the industry; our interviews noted that professional collaboration among cocoa farmers in Ghana is low. There were some personal relations between some farmers involved in joint venture farms, but this was not a consistent trend and it gives the view that cocoa farming in Ghana is less communal and more individualistic. This is at variance with other crop farming practices in Ghana which are known to be very communal and dependent on the entire society or village (See Lyon, 2000).

It was further important to note that it appears that in the course of their cocoa business, the farmers related more directly with the Extension Officers from COCOBOD than they related with each other. Even where there are social interactions between the farmers, these are also usually at forums and associations organised by the Extension Officers for the farming communities. Other forms of informal get-togethers among the cocoa farmers were hardly held across all the communities we visited. Whenever we asked the question of a farmer if he or she engages in any social interactions and get-togethers with other farmers, other than the associations organised under the auspices of the Extension Officers, or whether they collaborate informally in their cocoa business activities; we were usually met with laughter at the absurdity of the suggestions.

There is therefore a lot of commitment to the local associations with good attendance at meetings of associations. The Extension Officers form and organize these associations on a daily basis and
hold meetings at least once a week. It is again interesting to note that the active local associations that were formed from three years ago are not being formed or run by the National Association of Cocoa Farmers but rather by the Extensions Officers of COCOBOD in the various cocoa communities. Though the local associations have an executive board including a chairman and secretary, we observed that the Extension Officers were effectively the heads of the associations. Meetings were organized under the direction and leadership of these COCOBOD officers. In many instances, the officers handpicked the executives rather than through a democratic process of election. It is this embeddedness of the COCOBOD Officials in the local communities and their involvement in the social organisational structures of the farmers that is very important in understanding how the social interactions in the industry also shape the perceptions of COCOBOD’s governance among the farmers as we will now discuss further.

4.7 Interviews on the Perceptions of COCOBOD’s Governance

A number of the farmers we interviewed held the view of COCOBOD as far removed from them, using phrases such as ‘those in the capital city’, ‘authorities’ or ‘elders’ taking decisions on behalf of farmers. The farmers also complained that they are really civil servants for the government; but such that do not have any rights to embark on strike actions or even the organisational capacity to protest effectively. There was one word that kept coming up in the conversations with the farmers in all the communities, where they used a popular local language phrase which when translated means that “cocoa farmers are to be pitied”. They attributed this to being paid little for their contribution to the nation’s economy. Another point made by these farmers was that COCOBOD
was simply a part of the ‘system’, and it was this system that had relegated them to the lower end of the food chain.

Despite this broadly negative outlook on COCOBOD’s governance, the social relations created by the associations organised by the Extension Officers seemed to have an impact on individual farmer’s perception and also differences in the perceptions on the cottage and regional levels. We noted that the farmers’ main contacts with COCOBOD are the Extension Officers who engage with them on a regular basis. These Extension Officers also organised the cottage level associations we attended and it was evident from our interactions that the farmers who had been more participative in these social engagements also had better relations with the Extension Officers and hence were more appreciative of the work of COCOBOD.

We also noted that in the regions where more farmers engaged in the industry activities organised by the Extension Officers there was a tendency for the farmers in those regions to be more receptive of the work of COCOBOD and its officials and it was evident that the cottages in regions that were better organised received more support from the industry regulator and also the big multinational companies that are involved in the industry. Also the contributions of these institutions were more important to the farmers’ personal businesses. For example, in Antobrakrom in the Ashanti Region where we witnessed high and effective participation in industry activities among the farmers, there was a more positive view of the industry regulator for most of the farmers we interviewed. Antobrakrom also hosts a multinational company initiative – the Cadbury Cocoa Partnership – which seeks to improve the living conditions of cocoa farmers through sustainability projects such as alternative livelihoods and construction of basic needs such as water projects and school buildings. On the other hand, Aprade in the Eastern region showed
very low commitment to the industry associations; were disorganised and were more likely to have poorer perceptions of the governance structure under the COCOBOD.

The next segment of the chapter focuses on the issues raised in the Strategic Choice Framework (SCF) literature that concentration of power and control in the hands of a few at the top of a hierarchy is likely to result in a state of ‘strategic failure’ where the interest of the poorest, such as Ghana’s cocoa farmers, are undermined.

4.8 Issues of ‘Strategic Failure’ in Ghana’s Cocoa Industry

Ghana’s cocoa industry is a classic example of an industrial governance structure that is dominated by a government regulator, in this case the Ghana Cocoa Board (COCOBOD) which acts as the sole legal buyer of all of the cocoa produced by Ghana’s farmers (See Fold, 2002). As noted in earlier discussions, this government interventionism structure, unlike many other such regulator boards set up in West Africa during the colonial era, has developed over the years into an efficient industrial system for producing Ghana’s high quality cocoa and providing an assured market for the cocoa farmers.

It is accepted in the literature that Ghana’s cocoa marketing system has performed impressively over the past decade. Cocoa production has reached record high levels with farmers receiving a relatively large share of export earnings. The product quality is world renowned and exceeds the most stringent international standards. Exports are handled professionally and efficiently and the syndicated international loans are repaid reliably. The internal marketing structures are, in comparison with many other such institutions in the sub region, relatively uncorrupted and effective (See Fold, 2008, Williams, 2009, Anang, 2011).
However, this efficient industrial system also has a tendency to be hierarchical in nature which can result in a situation where a majority of the industry players, particularly the peasant farmers and the Licensed Buying Companies (LBCs) being divorced from the strategic governance processes that directly influence their livelihoods. For instance, a significant part of the literature reviewed have identified that the governance decisions that determine the overall course of the industry, and hence the well-being of all of those connected with it are exclusively taken by the individuals and institutions that control COCOBOD\textsuperscript{23} (See Asante-Poku & Angelucci, 2013, Fold, 2002, Santos & Vigneri, 2007).

Such lack of transparency and ‘external’ formulation of policy that does not involve a significant proportion of the participants has a tendency to ignore the wills, aspirations, and voices of many of those with an interest in the sector. This is the point made in Cowling & Sugden (1998), that the lack of openness and broad participation in governance processes result in severe constraints for bottom-of-the-pyramid participants to make their own livelihoods and improve their circumstance without depending on the decisions of ‘benefactors’ who do not always act in their (low-level participants) interest.

In this regard, there are two main aspects of the governance processes where it can be argued that there is evidence of ‘strategic failure’ within the industry. These are in the pricing of the cocoa for the farmers and for the Licensed Buying Companies, and the dominance of transnational companies in the global cocoa industry. These are now discussed below.

\textsuperscript{23} The organisational structure of COCOBOD itself is top-heavy with a Chief Executive appointed directly by the President of Ghana and under the supervision of the Ministry of Finance (rather than the Ministry of Agriculture so as to assure government’s revenues).
4.8.1 Pricing as a Strategic Decision

The Government of Ghana in 1984 established the Producer Price Review Committee (PPRC) to set the prices for the cocoa it purchases from farmers through a collaborative process. The PPRC is responsible for determining the division of cocoa revenues between the various participants in Ghana’s cocoa industry including the government (Amoah 1998). Its membership includes academics and all the other major stakeholders – such as farmers, hauliers, Licensed Buying Companies, the government, and the COCOBOD. The committee meets at least once a year to allocate the cocoa revenues for the following season (See Fold 2002).

According to Williams (2009), the PPRC follows a structured and technically-based process that takes into account projections of cocoa revenues and the costs of the various cocoa marketing agents along the value chain. The end result is a division of the predicted Free-On-Board (FOB) cocoa price into percent shares for various participants in the marketing chain, from the farmers through to the COCOBOD. He further notes that the PPRC process represents a marked difference from the pre-PPRC era, when farmers and the LBCs had little or no say in determining the division of cocoa revenues (See also Amoah, 1998).

However, this improved system is still a long way from being a process that includes all the voices of the participants within the industry. To start with, the very fact that the prices for their produce is determined by a committee rather than through the workings of demand and supply or by their own initiatives means that most farmers are constrained as to how much they can influence their own livelihoods. This constraint is even worse for the Licensed Buying Companies (LBCs) who are unable to compete with each other using price and have had to resort to other, sometimes costly
incentives to attract farmers (i.e. pre-financing) – most of which have largely proven to be unsustainable.

This lack of control over the price a farmer sells or an LBC buys cocoa affects all other decisions that these participants within the industry make. For example, a farmer will determine how much he is going to invest into the season’s farming based on the price set by the PPRC. Licensed Buying Companies will also decide how much of the stock they will purchase and even whether to buy for the season at all based on the announcement of the price for the season.

These processes have made the price-setting regime within the industry the most important decision with very wide ranging consequences for all other decisions and the fortunes of the participants. It also brings into focus the need for the Producer Price Review Committee (PPRC) to be as democratic and consultative as possible to ensure that all participants feel a part of the process and decisions are arrived at by consensus.

In this regard, the observation from the activities of the PPRC over the years is that the farmers and the Licensed Buying Companies who make up the majority of the industry participants are not the dominant voices in the PPRC discussions and their roles have traditionally been to be on the committee to approve the price as determined by government for its own benefits; that is in the tax revenues it accrues. Williams (2009) had noted this in his interactions with the representatives on the PPRC from the Ghana Cocoa, Coffee and Shea Nut Farmers Association (GCCSFA) which is the national body of the cocoa farmers, who had reported that they had no power to change things or voice their opinions once the government had decided the sharing allocations of cocoa revenues.

This overriding power of the government in determining the prices of Ghana’s cocoa is evidenced in the circumstances around the recent increase in the price by 63% for the 2014/2015 harvest
season as announced by the Producer Price Review Committee\textsuperscript{24}. This price increase had followed a period of agitation from the farmers who had noted the increase in the price of cocoa on the world market as well as a depreciation of the local currency by more than 20% against its major trading currencies which meant that the foreign inflows from cocoa had a higher monetary value in Ghanaian cedis than for the previous year.

These public agitations by the farmers as well as threats of a strike finally culminated in the remarkable price jump. This price increase on the face of it was supposed to be a collaborative decision of the PPRC with the process of technical analysis and consensus resulting in the final price. However, in a news story on the website of the public media house in Ghana\textsuperscript{25}, it was reported that representatives of farmers from all the cocoa growing regions of Ghana had paid a visit to the President of Ghana immediately after the announcement to thank him for increasing the producer price for farmers. The President received their gratitude and there was no mention of the new price being a consultative process under the PPRC. It was seen as a matter-of-fact to be a result of the magnanimity of a benevolent government to its ‘subjects’. While this could be evidence of a bottom-up participatory process and evidence that the system works to a degree, it also clearly undermines the consultative work of the Pricing Committee and reveals the domineering role of the President of Ghana as the final and only real decision maker in the industry.

This hierarchical system of decision making which goes all the way to the top where the President of the country seemingly takes the most important strategic decision of the industry single-handedly based on his (or the government’s) interest as opposed to the views of over 600,000 farmers and 27 licensed buying companies is probably a most apt picture of ‘strategic failure’

\textsuperscript{25} http://www.gbcghana.com/1.1863528
within the industry. Despite the fact that in this instance the farmers agree with the decision by the government, there have been many more years where the decision of the government has sorely been in the interest of improving government revenues and have been to the detriment of the farmers and Licensed Buying Companies.

From the above, it is evident that government has a controlling influence on price setting. However, their decisions are also largely influenced by the major transnational firms that purchase Ghana’s cocoa. This is because despite the fact that transnational firms are precluded from participating in the activities of the PPRC, they still have immense power over the decisions that are made through their ‘market power’ or ‘buyers influence’ (See Fold, 2008). This role of Transnationals in terms of influencing price as well as impacting on other segments of the local industry is now discussed in the next segment.

4.8.2 The Dominance of Transnationals

There is no significant domestic consumption of cocoa in Ghana with almost all of the country’s harvested cocoa being exported. There are only two domestic manufacturing (grinding) companies in Ghana; one being state-owned and the other controlled by an international grinder based in Germany. Barry Callebaut and ADM, global giants in the cocoa grinding business also have plants in Ghana to de-shell, clean, cut and bag beans for onward transport to the companies’ own grinding mills in the EU or USA; and Cadbury, the chocolate maker, also has a presence in some of the cocoa communities in Ghana and supports some of the farmers with inputs under the Cadbury Cocoa Partnership Programme.

However, overall most Ghanaian cocoa farmers have little or no interactions with the transnational firms that use their cocoa and are therefore completely removed from the global value chain that
results in the finished products for consumers. The lack of appreciation of the ‘big picture’ of the industry is by itself a huge constraint on the Ghanaian cocoa farmer and reduces him or her into a ‘tree-minder’; an expression that has been used by the farmers to describe their circumstances of keeping the cocoa trees and carting all the produce to COCOBOD and then going back to do the same thing over and over again.

Furthermore, this ignorance of the Ghanaian farmer about the systems of the global industry puts him first at the mercy of the industry regulator, and then the transnational companies who fully exploit this through an exaggerated monopsony power to decide the price of cocoa on the global market by adjusting their demand based on whatever price they want to pay. Fold (2008) makes the same point that the buyer’s influence and power of transnational agro-food companies in impacting on Africa’s agricultural industry has increased substantially and as a consequence the conditions for transacting business for most African exports, including cocoa, has been modified completely to suit the transnational firms.

For example, transnational companies are excluded from being a part of the Producer Price Review Committee in Ghana but are known to influence the set price. This is noted in the literature that has shown that conditions for transactions between buyers and sellers are not necessarily determined always by one of the two parties or negotiated between them. Rather in the global agro-food industry conditions are often set by different actors who are involved in other segments of the value chain and mediate the flows of money, goods or information (See Bair and Gereffi 2001, Ponte 2002, Dolan and Humphrey 2004). This is also related to the concept that governance and strategic decision-making in an industry is closely connected to the role of ‘lead firms’, that is major companies with the ability and power to set the conditions for the division of labour (See Gereffi 1994; Humphrey and Schmitz 2002).
In another example, Ghana and Ivory Coast together produce about 60% of the world’s cocoa and are neighbours who share a common border. This should naturally result in some form of collaboration of these suppliers of cocoa that would ensure that price is determined by these countries. However, the opposite is the situation with the two countries competing with each other and further driving down cocoa prices. This is because while the producers have a disaggregated front, economic power is increasingly being concentrated in large consolidated transnational firms that use cocoa to manufacture consumer products (See Kaplinsky, 2004). Kaplinsky (2004) notes that this asymmetry of fragmented producers as against concentration at the buying and retail ends has resulted in divergent income trends and markets characterised by inequalities in power.

Another aspect of the global value chain that increases the power of transnational firms is the use of standards. Kaplinsky & Morris (2001) indicates that the growing importance of standards set by such firms mean that producers participating in the global cocoa trade must adhere to numerous criteria such as quality, environment, traceability and labour. These become additional costs to the producers and also establish a system where the producers are beholden to the whims of the transnational firms who buy their cocoa further establishing the domination of the interest of these transnational firms over those of other participants within the cocoa industry.

4.9 Conclusion

The chapter is a case study of Ghana’s cocoa industry. It highlights the global value chain and the main participants within the local industry; COCOBOD, the Licensed Buying Companies (LBCs) and the farmers. Insights from interviews conducted with industry participants on the issues of
governance and social capital are also discussed with a focus on the industry’s strategic decision making process and its consequences on the poorest participant – peasant farmers.

It was evident from the discussions that Ghana’s cocoa industry presents a good case study for exploring the themes of this thesis, that is the issues of hierarchical governance structures, concentration of power and decision making at the top of an industry and therefore the impact that improved social relations among the industry participants can have on such industrial organizational forms.

This background therefore sets the stage for addressing the research questions posed in Chapter 1 of the thesis; can social capital mitigate against the harmful effects of the concentration of power in a hierarchically structured industry like Ghana’s cocoa sector. Chapter 5 deals with this question using empirical data of farmers’ perceptions of COCOBOD’s governance in relation to their social engagement in the local level associations of the industry. Chapter 6 then reflects on differences, if any, in the outcomes on governance and social capital between poorer and richer farmers and between poorer and richer regions. Finally, chapter 7 discusses the motivations for participation among Ghana’s cocoa farmers having identified the importance of such engagements for issues of governance and economic development in Chapters 5 and 6.
Chapter 5 – Perceptions of Governance and Social Capital in Ghana’s Cocoa Industry

5.1 Introduction

This thesis’ main focus is the strategic failure inherent in governance structures that concentrate power and decision making at the top of an industrial hierarchy and thereby exclude the majority from participating in decision-making in processes that affect their futures. Improved social relations among such participants however, has the potential to mitigate against the harmful effects of top-down governance structures by broadening information sources and encouraging solidarity and compliance with the rules, beliefs and norms of the governance system (See Chapter 2 above). Hence, research has postulated that a key facet of ‘good governance’ is social capital, and that enhancing the latter can lead to more inclusive governance and improved governance related outcomes (Putnam, 1993a, Coffe and Geys, 2005, Sacchetti, 2013). Indeed, as argued in the review of literature in Chapter 2 above and in Granovetter (1985), governance structures are typically embedded in social relations and it is these social connections which are critical in determining the governance structures (and processes) that emerge.

This chapter therefore, in line with Putnam’s (1993a) research on governance in the north and south of Italy, evaluates the differences in perceptions of governance among the farmers in Ghana’s cocoa sector that can be attributed to different social structures at the regional level. Putnam’s work, highlighted earlier, had concluded that the social structures in the northern and central parts of Italy resulted in better governance services as compared to the less socially organised south of Italy. Ghana’s cocoa industry has a similar background of regionalised governance structures, in regions with varying social organisation structures within the industry. This presents an opportunity to empirically test for the impact of differences in social organisation
on regional governance structures and the perceptions of individual participants, and therefore whether social relations can help address some of the issues of governance failure in hierarchical structures raised in the earlier chapters.

Furthermore, much of the existing empirical research exploring this relationship are either cross-country studies, using macro data, or are focused upon the performance of sub-national authorities from a largely Western perspective. In contrast, the study of the social capital and governance relations within sectors in Africa and ‘developing countries’ more widely has been neglected. This chapter offers an empirical study of the relationship between social capital and governance within the context of the Ghanaian cocoa industry. Also, as noted in the introduction chapter of this thesis, the choice of an agricultural sector in a developing country context for the analysis in this thesis is particularly pertinent, given it remains the most important sector for African socio-economic development, especially since it is a significant income source for the poor (Diao et al., 2010). Indeed, where agricultural land is relatively evenly distributed, agriculture can be pro-poor since it facilitates shared growth and a greater economic participation of the poor in the growth process (Hazell et al. 2010). This is generally the case in the Ghanaian cocoa sector, which is organised around small-holdings of farmers (rather than large scale plantation production), with the overall management and strategy run through the Ghanaian cocoa board (COCOBOD) and its regional offices. COCOBOD is the sole legal buyer of all of the cocoa produced by Ghana’s farmers, and thus has a critical impact upon the welfare of farms and their communities (see Fold, 2002; Leiter and Harding, 2004). The governance of COCOBOD and the extent to which Ghanaian farmers engage in the governance process is thus of critical importance for socio-economic development.

This chapter also offer several additional insights to the overall work of the thesis. The collated survey data is used to construct both multi-scalar and multi-dimensional measures of both
governance and social capital, which - unlike previous studies - capture more information on these concepts. Furthermore, in offering a novel contribution, the chapter specifically utilise measures of Nahapiet and Ghoshal’s (1998) structural, relational, and cognitive dimensions of social capital in exploring the relationship between the different facets of social capital and governance. The chapter explores these relationships by first drawing upon the interview data (to set the context) and then by applying multivariate analysis to survey data.

The remainder of the chapter is set out as follows. In Section 2, there is a discussion on empirical research exploring this relationship with a note on the lack of such analysis in the literature for developing countries and in micro (industry) settings. Section 3 discusses the methodological approach. In Section 4, it draws upon the interview data to discuss governance and social capital within Ghana’s cocoa industry. In Section 5, it utilises the survey data to specify and estimate a formal model exploring this relation before presenting the econometric results. Finally, Section 6 concludes.

5.2 Recent Empirical Work on Governance and Social Capital

Existing empirical work exploring the link between social capital and ‘good governance’ is predominantly macro orientated and based upon using a set of indicators to assess the performance of national and to a lesser extent, sub-national (state and regional) government authorities. As Coffé and Geys (2005) point out, these studies largely utilise aggregated data sets and generally demonstrate social capital has a beneficial impact upon the performance of state authorities. In recent years, there has been some research exploring the relationship at the local level. These include Cusack’s (1999) cross-sectional study of 30 German (local) municipalities and Rice’s
(2001) study of 114 small Iowa communities. Both studies utilised survey data from citizens, and found evidence to suggest higher levels of social capital led to an increase in the (perceived and subjective) level of performance by the local authorities. More recently, Coffé and Geys (2005) study of 305 Flemish municipalities also uncovers a positive relation existing between social capital and local authority performance; their study, however, utilised objective and non-survey data sources.

However, along with much of the literature, all these quantitative studies have tended to assess governance through examining the performance of state authorities, as opposed to exploring governance at other societal levels, such as the industry level. For many actors in the ‘developing world’, industry governance structures are likely to be particularly important since they have an immediate effect upon local socio-economic welfare. Moreover, previous studies also tend to have a predominantly Western focus; there is no quantitative work (that the author is aware of) exploring the social capital-governance relationship in a specific African context. A further issue is the aforementioned studies have tended to use either proxy measures of social capital largely capturing the degree of trust in local government and civic engagement (e.g. Rice, 2001) and/or single item measures of trust (e.g. Cusack, 1999) which can omit information. While such studies provide useful insights, they generally do not capture the multi-dimensional nature of social relations between actors. In particular, they do not capture the relational and cognitive facets of social capital identified by Nahapiet and Ghoshal (1998), and which can have an impact upon governance (and development). This chapter now aims to address these issues by explicitly exploring the impact of these aspects of social capital upon perceptions of ‘good governance’ within Ghana’s cocoa industry, to which the chapter now turns.
5.3 Research Methodology

The empirical analysis makes use of data from the administered survey and a series of short semi-structured interviews with 300 cocoa farmers, in 12 cocoa cottages (i.e. villages) across all six cocoa growing regions of Ghana (described in detail in Chapter 3). The author and field assistants also observed several cottage association meetings across all six cocoa growing regions. The research questions covered issues relating to social capital and perceptions of governance in the Ghanaian cocoa industry over the previous 5 years. Details of the sampling frame of cocoa cottages and farms as well as the methodology used are discussed in Chapter 3 of the thesis.

In terms of data analysis, this chapter first draws upon the interview data and observations from the cottage association meetings to outline the nature of social capital formation and governance within the Ghanaian cocoa industry. This provides important context for the quantitative analysis, which utilises the survey data to explore the governance-social capital relationship using a formal multivariate model (Section 5).

5.4 Ghana’s Cocoa Industry

5.4.1 Social Capital and Governance in Ghanaian cocoa farming

The qualitative research clearly identified COCOBOD as playing an important structural role in facilitating social capital. In this regard, it was observed that the basic ‘relational’ social capital among farmers emerges at the cottage level through the regular weekly meetings – held in a central place within a cocoa cottage – organized under the auspices of COCOBOD’s extension officers. These meetings, which are henceforth labelled as being cottage associations, are a new innovation
of the last three or so years, seemingly in response to ineffective nature of farmer-led organisations. These cottage associations act as a platform for facilitating collective action among the farmers, such as the scheduling of COCOBOD’s crop spraying programme, joint applications for bank loans, and the setting up of informal credit unions. COCOBOD officials also use these meetings to educate farmers on best practice(s) and to facilitate introductions between farmers and other stakeholders including government and bank officials, but also independent researchers (as in this case).

They are also a forum for settling disputes, such as cases of farm land encroachments and resolving any issues the farmers have concerning the general governance of COCOBOD. In this latter respect, complaints sometimes arise due to perceptions (among farmers) of malfeasance by senior COCOBOD officials, particularly in the allocation of COCOBOD resources and the payment of bonuses to particular farms. In one such case, an extension officer in Agona-Asafo (Central Region) faced a (rather fraught) cottage association meeting to answer questions regarding delays in bonus payments, and in turn, used the opportunity to carefully explain the formulae and procedures by which COCOBOD decides upon such payments. Such communication is important in improving transparency and general relations between COCOBOD and the farmers.

These social interactions enable the farmers, to express both their individual and collective views on industry issues of mutual concern. Indeed, the nurturing of social relations through the associations’ activities supports the emergence of ‘shared values’. The conduits in this process are the ‘chief’ farmers, who take up executive positions and are widely engaged in association activities and the industry’s wider networks. The chief’s role is to align the different interests of local farmers in formulating a shared consensus over issues. While local farmers are typically deferential to their ‘chiefs’, in several cottage associations, the process was generally one of careful
deliberation, debate, and discussion among farmers rather than one of subjugation by the ‘chiefs’. It is this active participation in association activities and intense deliberation among farmers (over issues of mutual concern) that tends to enhance the community’s cognitive ‘shared vision’, which in this case, is embodied by the chiefs, who are responsible for representing this collective voice to COCOBOD’s Extension Officers.

In reality, participation depends, in a large part, on the pro-activeness of the individual Extension Officers for the cottage and their relationships with the ‘chiefs’ and local farmers. Indeed, a widely held view was that the Extension Officers were instrumental in nurturing business and social ties between farmers, and in organising and encouraging participation in local and regional forums and associations, since the farmers, themselves, tended to have little inclination to initiate and self-organise such (either business or social) events. The local associations were often managed by the Extension Officers, who in many cases hand-picked the respective executive boards, thus bypassing the democratic process of election. Nevertheless, meetings of local farming and cottage associations were generally well attended, and gave local farmers opportunities to air and deliberate their grievances, concerns, and proposals to tackle issues of common concern. The situation does, however, highlight the authority of COCOBOD in the local social fabric and in managing farmers and their expectations (see also Reimer et al., 2008). Indeed, it is widely recognised the overall strategic direction of the Ghanaian cocoa industry is determined by COCOBOD, and while the views of local and regional associations and farmers on specific matters are sought, the process largely resembles Pretty’s (1995) notion of consultative participation (see Asante-Poku & Angelucci, 2013, Fold, 2002, Santos & Vigneri, 2007).
5.4.2 Perceptions of Governance

Overall, there appeared a good rapport between local farmers and the COCOBOD Extension Officers. It was also evident (from our interviews) that those farmers who participated in more industry activities and engaged closely with local COCOBOD officials, generally held a more favourable perception of the organisation. Such engagement facilitates dissemination of COCOBOD’s broader activities, while providing opportunities for local issues and grievances to be aired in a local public forum. It also improves perceptions of governance.

One illustrative example was the case of a well-functioning cottage (Adiepena) in the Ashanti region which described how they came together to insist on their farms being sprayed two times in each season as compared to the one-time free mass spraying programme that COCOBOD undertakes in all other cocoa cottages. The farmers had noted from experience that spraying their farms twice (rather than once) ensured better protection against diseases such as the dreaded swollen shoot and black pod. They therefore arranged with the COCOBOD officials, as a cottage association, to have the first free spraying done by the COCOBOD and then to pay for a second session of spraying at a reduced price for the chemicals and with the association providing its own labour to carry out the spraying. This resulted in improved yields for these farmers over the years. The farmers were able to engender the support of COCOBOD in this initiative (while this was absent in other communities we visited) because of the shared consensus that had arisen for a very socially engaged farming community.

At the regional level, the most positive perceptions of COCOBOD tended to be held by farmers in the largest cocoa growing regions of Western and Ashanti. This may reflect the fact these regions tended to receive relatively greater support from COCOBOD, their Extension Officers, and the
Licensing Buying Companies, particularly in terms of new pesticides, crop spraying, fertiliser application, but also financial credit, while smaller farmers particularly benefitted from the price guarantee (Wilcox and Abbott, 2006). These regions are highly fertile for cocoa growing and, as such, received preferential support through COCOBOD’s HI-TECH programme (established in 2001) which provides specialised training to farmers (on fertiliser application, disease and pest control) and additional resources to ensure the industry meets its cocoa production targets during the growing season (see Appiah, 2004). In contrast, in the smaller growing regions (such as Central and Volta) the author observed notable discontent among farmers with regards to access to similar resources, with a lack of regular pesticide spraying (and poor disease control) by COCOBOD being a major concern.\footnote{Such findings are consistent with Abankwah et al. (2010) who found that the majority of farmers identified COCOBOD’s ‘mass spraying’ programme as being effective but also that it suffered from a number of inefficiencies, including equity of application.}

Indeed, the dichotomy in COCOBOD’s resource allocation (and the administration of the HI-TECH and Mass Spraying programmes) appears to have led to some disconnect between high level officials in COCOBOD’s Head Office (in Accra) and the local district offices in the smaller growing regions. A common view among farmers (in these lesser growing cocoa regions) was they regarded themselves as being treated as ‘second class citizens’ and not valued for their contribution to the wider economy\footnote{The phrase often used (by farmers) to describe how they were generally viewed was ‘cocoa farmers are to be pitied’.}, while they often referred to the Accra Head Officials disparagingly as ‘those in the capital city’, ‘authorities’ or ‘elders’. More specifically, while some farmers raised
concerns about possible corruption (particularly in the allocation of farming scholarships), the major concern was the overall strategic direction of COCOBOD and the role of the organisation in enhancing enterprise and long term industry planning. Some farmers in Volta and Central, for instance, also felt their local offices had little influence upon COCOBOD’s overall strategic direction, and this in turn, encouraged a degree of disillusionment and disengagement with the governance process.28

5.5 Quantitative Analysis

5.5.1 Econometric Specification and Variable Construction

The survey data allows the chapter to explore the governance – social capital relation in a more formal setting. In this regard, and following Coffé and Geys (2005) and Rice (2001) in specifying a formal econometric model using the method of Ordinary Least Squares (OLS) multiple regression, it states the following equation:

Governance of COCOBOD = $\beta_0 + \beta_1 \text{ Farm Size} + \beta_2 \text{ Years in Farming} + \beta_3 \text{ Regional Dummies} + $ $\beta_4 \text{ Utilising Personal Ties with COCOBOD} + \beta_5 \text{ Participation} + \beta_6 \text{ Social Relations with other Farmers} + \beta_7 \text{ Shared Vision} + \varepsilon_i$ (1)

28 There is a wider debate about whether or not COCOBOD’s governance structure delivers efficacious programmes. For instance it has been described as being ‘efficient’ (Carr, 2004) and praised for the ready market it provides for Ghanaian Cocoa, the high quality of cocoa produced, its strong bargaining position with major transnational organisations, and the additional benefits it gives to farmers, such as research and extension services, bonuses and child scholarships (see, for instance, Asante-Poku & Angelucci, 2013; Williams, 2009). However, it also received criticism such as that made above regarding the uneven allocation of resources related to the HI-TECH and Mass Spraying programmes, the negative incentive for producers to continue producing cocoa, the lower margins that go to farmers in Ghana compared to those for farmers in other cocoa growing countries, and the displacement by Ivory Coast as the world’s biggest producer and exporter (see, for instance, Asante-Poku & Angelucci, 2013; Santos & Vigneri, 2007; Williams, 2009).
In short, equation (1) specifies that perceptions of COCOBOD’s governance are associated with Nahapiet and Ghoshal’s (1998) dimensions of social capital; structural facets (captured by participation and utilising ties); relational facets (social relationships) and cognitive facets (shared vision) factors. The remaining variables are included to control for other factors (see below). At this point, we must add the caveat to Equation (1) of the possibility of feedback loops and alternative causation-correlations existing within the data. Indeed, Henley et.al (2006) note alternative models are rarely acknowledged in cross-sectional, survey based studies. Given this, alternative specifications were tested by reversing the dependent and independent variables and running several supplementary regressions; in these regressions, the dependent variable was an insignificant explanator of the independent regressors. In addition, and following Woolridge (2010) and Antonakis et.al (2010), Equation (1) was also ran and found the error term and the independent regressors were orthogonal (i.e. uncorrelated). Taken together, these tests suggest endogeneity is not an issue and they provide confidence in the model specification. The additional robustness analysis (including table of results) can be found in Appendix 1.

Finally, it is worth noting survey data lends itself to other forms of modelling such as Structural Equation Modelling (SEM) and related path-models. Unfortunately, the relatively small sample size is unlikely to be adequate to generate sufficient statistical power, unbiased estimates and a reliable model fit when employing these maximum likelihood estimators (Hair, 2007). An alternative possibility is to consider a less restrictive partial least squares (PLS-SEM) approach. However, this technique is in its infancy and there is some controversy over its use, particularly for early stage theory development and testing (see, Ronkko and Evermann, 2013). At risk of parsimony, there is the need to proceed with a traditional econometric approach.
A summary of the variables (and their construction) is discussed below and items used in construction of the variables are listed in Table 8. For the two construct variables, appropriate scale items (from the survey) are combined into a single index through a factor analysis using Principal Component Analysis (PCA) as the method of extraction. This negates the influence of idiosyncratic measurement error within each of the construct variables, while maximising the likelihood of measuring the underlying concept more accurately (Hair et.al, 2007). For each construct, factor scores were calculated in SPSS, each with a standardised mean of 0 and a standard deviation of 1, and these were used in the subsequent econometric analysis (see Grice 2001)).

**Dependent Variable: Governance of COCOBOD:** The measure of governance used is the farmers’ perception of COCOBOD governance structures. The use of ‘Perceptions of Governance’ as a proxy for governance is increasingly being utilised in the literature, particularly in assessing regional governance structures and capturing local participation in the governance process (see Bouckaert &Van de Walle, 2003; Kaufmann et al. 1999b; Rice, 2001). The items used to build the construct were farmer’s trust in their local COCOBOD officials, their participation in local governance processes and their evaluation of openness and transparency of COCOBOD governance structures (see Appendix). All items were measured on a 7 point Likert scale (1 = Strongly Disagree and 7 = Strongly Agree). The items are based upon Kaufmann et al. (1999a), whose work for the World Bank emphasised the importance of capturing ‘voice and accountability’ in measuring governance and Sacchetti & Sugden’s (2009) notion of inclusivity.
Independent Variables

Utilising personal ties with COCOBOD: This is a binary variable (1/0) and indicates whether farmers had (over the previous 3 years) exploited any personal ties with COCOBOD officials to gain access to new funds, information, or new networks to benefit their business. It is anticipated that where farmers develop close (personal) relations with COCOBOD and utilise them in this way, they are more likely to view industry governance more favourably.

Participation (in COCOBOD industry events and forums): This is a binary variable (1/0) and indicates whether farmers had participated (over the previous 3 years) in COCOBOD organised events and forums. The measure captures Pretty’s (1995) notion of consultative participation, which is the typical engagement between COCOBOD and its’ cocoa farmers. It is expected that greater participation will generate positive correlation with perceptions of COCOBOD governance.

Social Relations with Farmers: This construct captures the degree of relational social capital among local cocoa farmers. It is based upon items drawn from Tsai and Ghosal’s (1998) work on social capital and also Molina-Morales and Martinez-Fernandez (2006), who employed a similar construct in their study of Valencian industrial districts. A positive correlation with perceptions of local COCOBOD governance structures is expected.

Shared Vision: This construct captures Nahapiet and Ghoshal’s (1998) cognitive dimension of social capital and is based upon items drawn from Tsai and Ghosal (1998) and Tomlinson (2012). A positive correlation with perceptions of local COCOBOD governance structures is expected.
**Control Variables:** The equation also includes two control variables to account for a farmer’s farm size and also the number of years in farming. Farm size is calculated as the Number of Employees combined with the Size of Household as these translate to the amount of labour available to work on the farm, and larger farms require more labour. It is expected that farm size would have a positive impact upon perceptions of local governance; a positive relation generally exists between size of income and the quality of governance (Kaufmann & Kraay, 2002). With regards to the number of years in farming, the relation is ambivalent since more experienced farmers may have developed long term fruitful relations with COCOBOD (and thus have positive perceptions of governance) or, alternatively have become over time more sceptical of the relationship. Finally, also included are regional dummy variables to capture differences in perceptions of governance across the six cocoa regions (and which had been encountered in the interviews); the Volta region was chosen as the base. The relative autonomy of the Regional Offices of COCOBOD and their relationship with local farmers is critical for the overall performance of the industry which might be affected by significant differences in local governance structures.

<table>
<thead>
<tr>
<th>Measures</th>
<th>Variables used in constructing measures</th>
<th>Cronbach’s Alpha Score</th>
</tr>
</thead>
</table>
| 1) Governance of COCOBOD | a) Trust COCOBOD to act in your interest  
   b) Feel a part of COCOBOD Decision Making  
   c) Openness and Transparency of COCOBOD  
   d) Effectiveness of COCOBOD  
   e) Efficiency of COCOBOD  
   f) COCOBOD associations give us the opportunity to make our views heard and to influence the industry | 0.72 |
<table>
<thead>
<tr>
<th></th>
<th><strong>2) Utilising Personal Ties with COCOBOD</strong></th>
<th>Extent of Utilising personal ties, networks and connections with COCOBOD to access funds, information, knowledge or contacts</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>High Utilisation=1; Low Utilisation=0</td>
</tr>
</tbody>
</table>
|   | **3) Social Relations with other Farmers** | a) Informal socialisation with other farmers  
 b) Informal network among farmers  
 c) Regular communication with other farmers  
 d) Collaboration with other farmers to achieve goals |
|   |   | 0.77 |
|   | **4) Shared Vision** | a) Share the same ambitions and vision as other farmers in the industry  
 b) Consider your business’ future is related to that of other farmers in the industry  
 c) Pursue the shared goals and strategy of your industry  
 d) Belief in some kind of shared strategy or plan for cocoa farmers in Ghana |
|   |   | 0.84 |
|   | **e) Participation** | Regular Participation in Industry events and forums  
 High Participation=1; Low Participation=0 |
|   | **Control variables** | a) Regional Dummies  
 b) Farm Size  
 c) Years in Farming |
5.5.2 Descriptive Statistics

Details of the descriptive statistics, Cronbach’s alpha for the multiple-item constructs, and Pearson’s correlations across all the variables are provided in Table (8). Cronbach’s alpha is within the bounds of tolerance (i.e. greater than 0.70) for both multi-item constructs, indicating the summated scales are both reliable and internally consistent (Christmann & Aelst, 2006). There is some significant (albeit weak) correlation between the variables. However, the reported Variance Inflation Factors (VIFs) are low (below 4) indicating that multi-collinearity was not a major problem within the sample (Hair et al., 2007). Finally, it is worth noting the mean scores for the dependent variable, ‘Governance of COCOBOD’ and the independent social capital constructs ‘Shared vision’ and ‘Social relations with Farmers’ all exceed the neutral Likert score of 4, indicating a positive perception of these concepts among the farmers. This was in line with the overall perceptions of the sector from the qualitative research. Furthermore, the farmers’ mean ‘number of years in farming’ is 11.35 years, which indicates the survey data captures the perceptions of farmers’ with a degree of relevant industry experience.

Table 8: Descriptive Statistics - Cronbach’s alpha and bivariate correlations (to two decimal places)

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>SD</th>
<th>A</th>
<th>VIF</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
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<tr>
<td>Governance of COCOBOD</td>
<td>5.00</td>
<td>1.45</td>
<td>.72</td>
<td>-</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Farm Size</td>
<td>1.27</td>
<td>0.48</td>
<td>n.a.</td>
<td>1.22</td>
<td>-0.00</td>
<td>1</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Years in Farming</td>
<td>11.35</td>
<td>8.76</td>
<td>n.a.</td>
<td>1.32</td>
<td>-0.12*</td>
<td>0.35***</td>
<td>1</td>
<td></td>
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<td></td>
</tr>
<tr>
<td>Utilising Ties with COCOBOD</td>
<td>0.46</td>
<td>0.50</td>
<td>n.a.</td>
<td>1.44</td>
<td>0.29***</td>
<td>0.15**</td>
<td>-0.07</td>
<td>1</td>
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</table>
5.5.3 Results and Discussion

The general model, equation (1), was estimated in SPSS using hierarchical regression, whereby first the dependent was regressed on the control variables and the regional dummies. The predictor variables were then added sequentially. The results are presented in Table (9).

Overall, the results are very promising in that the model appears to explain the perceptions of governance reasonably well. The adjusted $R^2$ statistics are relatively high and are in line with the previous aforementioned governance studies (e.g. Kaufman et al (1999a, 2007), Coffé and Geys (2005)). The model also improves with the addition of the predictor variables. The size of the estimated coefficients indicates the relative importance of the independent variables on the dependent variable.

Table 9: Multivariate analysis: dependent variable – Governance of COCOBOD

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<th>3</th>
<th>4</th>
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<th>6</th>
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<tbody>
<tr>
<td>Constant</td>
<td>0.541***</td>
<td>0.121</td>
<td>-0.197*</td>
<td>0.212**</td>
<td>0.678***</td>
<td>0.095</td>
</tr>
<tr>
<td></td>
<td>(0.117)</td>
<td>(0.107)</td>
<td>(0.113)</td>
<td>(0.107)</td>
<td>(0.117)</td>
<td>(0.105)</td>
</tr>
<tr>
<td>Farm Size</td>
<td>0.117**</td>
<td>0.056</td>
<td>0.083**</td>
<td>0.027</td>
<td>0.011</td>
<td>0.089**</td>
</tr>
<tr>
<td></td>
<td>(0.036)</td>
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</table>
|                           | Ashanti Region Dummy | Eastern Region Dummy | Central Region Dummy | Brong Ahafo Region Dummy | Western Region Dummy | Utilising Ties with COCOBOD Participation | Shared Vision Participation | Social Relations with Farmers Participation | Adjusted R²  
<table>
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<tr>
<td>Years in Farming</td>
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<td>-0.083***</td>
<td>-0.100***</td>
<td>-0.119***</td>
<td>-0.116***</td>
<td>-0.101***</td>
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<tr>
<td></td>
<td>(0.035)</td>
<td>(0.029)</td>
<td>(0.026)</td>
<td>(0.022)</td>
<td>(0.020)</td>
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<tr>
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<td>0.345**</td>
<td>0.533***</td>
<td>0.179</td>
<td>-0.221*</td>
<td>0.380***</td>
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<tr>
<td></td>
<td>(0.165)</td>
<td>(0.144)</td>
<td>(0.135)</td>
<td>(0.121)</td>
<td>(0.124)</td>
<td>(0.136)</td>
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<tr>
<td>Eastern Region Dummy</td>
<td>-1.913***</td>
<td>-1.639***</td>
<td>-0.861***</td>
<td>-0.996***</td>
<td>-2.049***</td>
<td>-1.432***</td>
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<tr>
<td></td>
<td>(0.282)</td>
<td>(0.244)</td>
<td>(0.260)</td>
<td>(0.219)</td>
<td>(0.242)</td>
<td>(0.234)</td>
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<tr>
<td>Central Region Dummy</td>
<td>-0.369**</td>
<td>-0.669***</td>
<td>-0.242</td>
<td>-0.564***</td>
<td>-1.095***</td>
<td>-0.350**</td>
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<tr>
<td></td>
<td>(0.157)</td>
<td>(0.159)</td>
<td>(0.162)</td>
<td>(0.142)</td>
<td>(0.144)</td>
<td>(0.141)</td>
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<tr>
<td>Brong Ahafo Region Dummy</td>
<td>-1.546***</td>
<td>-1.642***</td>
<td>-1.236***</td>
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<td>-2.089***</td>
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<td></td>
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<td>(0.133)</td>
<td>(0.140)</td>
<td>(0.129)</td>
<td>(0.127)</td>
<td>(0.131)</td>
<td></td>
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<tr>
<td>Western Region Dummy</td>
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<td>1.187***</td>
<td>1.544***</td>
<td>1.181***</td>
<td>0.720***</td>
<td>1.245***</td>
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<td></td>
<td>(0.158)</td>
<td>(0.132)</td>
<td>(0.135)</td>
<td>(0.122)</td>
<td>(0.125)</td>
<td>(0.128)</td>
<td></td>
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<tr>
<td>Utilising Ties with COCOBOD Participation</td>
<td>0.756***</td>
<td>0.916***</td>
<td>0.615***</td>
<td>0.321***</td>
<td>0.891***</td>
<td></td>
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<tr>
<td></td>
<td>(0.098)</td>
<td>(0.094)</td>
<td>(0.087)</td>
<td>(0.086)</td>
<td>(0.091)</td>
<td></td>
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<tr>
<td>Participation</td>
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<td>0.243**</td>
<td>0.271***</td>
<td>0.830***</td>
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<td></td>
<td>(0.132)</td>
<td>(0.121)</td>
<td>(0.102)</td>
<td>(0.118)</td>
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<tr>
<td>Shared Vision</td>
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<td>0.151***</td>
<td>-0.200***</td>
<td></td>
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<tr>
<td></td>
<td>(0.056)</td>
<td>(0.051)</td>
<td>(0.071)</td>
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<tr>
<td>Social Relations with Farmers Participation</td>
<td>0.343***</td>
<td>0.521***</td>
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<tr>
<td>Shared Vision * Participation</td>
<td>0.524***</td>
<td>0.280***</td>
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<td>(0.094)</td>
<td>(0.082)</td>
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<tr>
<td>Social Relations with Farmers * Participation</td>
<td>-0.734***</td>
<td>-0.014</td>
<td></td>
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<tr>
<td></td>
<td>(0.109)</td>
<td>(0.112)</td>
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<tr>
<td>Adjusted R²</td>
<td>0.64</td>
<td>0.76</td>
<td>0.80</td>
<td>0.86</td>
<td>0.89</td>
<td>0.77</td>
<td></td>
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</tr>
</tbody>
</table>
We now turn to the results, first considering the control variables. Farm Size has a small positive and significant impact upon perceptions of COCOBOD governance in the early regressions (equations 1 and 3), but becomes insignificant as more variables are added. In addition, farmers are likely to have a more negative perception of COCOBOD, the longer they have been engaged in cocoa farming. This may reflect some long-standing dissatisfaction among farmers with regards to liaising with COCOBOD (this disillusionment was occasionally apparent in the interviews with farmers from across all regions). Finally, the regional dummies reflect the different perceptions of COCOBOD governance relative to the Volta region. The most positive perceptions of governance are in the fertile Western and Ashanti regions, both of which had received favourable treatment through COCOBOD’s HI-TECH program, while the most negative were in the poorer and less mechanised Eastern and Brong Ahafo regions. These results are again are in line with the interview data and reflect concerns about the allocation of COCOBOD’s resources.

The predictor variables are highly significant. Both utilising ties and participation in COCOBOD events capture aspects of Nahapiet and Ghoshal’s (1998) structural dimension of social capital. They are both positively and significantly associated with higher perceptions of good governance among Ghanaian cocoa farmers. This result is very much in line with Sacchetti and Sugden’s (2003, 2009) view that ‘inclusivity’ facilitates participation, consultation, and engagement among networked actors, which is likely to lead to better governance. Thus, in this case, where Ghanaian cocoa farmers are more actively engaged in COCOBOD networks and events, they are more likely
to perceive that their concerns are being considered at a higher level, and thus they hold a better overall perception of the governance process. In this regard these more engaged farmers may feel they have a greater influence over COCOBOD’s strategic decisions and resource allocation.

Wider engagement among stakeholders, of course, enhances the relational and cognitive dimensions of social capital, and both social relations (among farmers) and shared vision are also positive and significantly associated with industry governance (see Table 9). A high level of socialisation and networked activity (relational social capital) among Ghanaian cocoa farmers can lead to greater deliberation and consensus building (shared vision) over industry related issues and this again may facilitate better perceptions of governance. In short, more engaged farmers are more likely to feel they have a greater voice in COCOBOD’s strategic decisions and resource allocation (see Donor and Schneider (2000), Sacchetti and Sugden, (2003, 2009), Tomlinson, (2012)).

Returning to the fieldwork, it was observed that, for instance, in the Antobrakrom area of Ashanti, cocoa farmers who were being highly engaged in industry events, meetings and discussions also, in general, hold a positive view that their views and concerns were being considered seriously by COCOBOD. To some extent, this high engagement might have also been encouraged by the local presence (and activities) of the Cadbury Cocoa Partnership, a value chain initiative which seeks to improve the living conditions of cocoa farmers through sustainability projects such as alternative livelihoods and construction of basic needs such as water projects and school buildings. Conversely, farmers in Besease (in the Central region) and also in Aprade (in the Eastern region), appeared to demonstrate a very low commitment to attending COCOBOD organised events (including our fora), were more disillusioned and as such, generally held more negative views on the governance of COCOBOD.
Finally, following the techniques outlined in Aiken and West (1991), Columns (5) and (6) in Table (9) provide the results of estimations which include the interaction terms between participation and both the relational and cognitive dimensions of social capital. The interpretation of the results should be treated with caution as the inclusion of multiplicative dummies can raise the possibility of multi-collinearity, which can affect the sign and levels of individual coefficient significance (see also Greene, 2008). Nevertheless, in the case of shared vision, it appears this is closely linked with participation in industry events, and together these have a positive and significant impact upon perceptions of COCOBOD governance. Intuitively, this ties in with the earlier observations between the different dimensions of social capital, specifically participation, deliberation and consensus building (Sacchetti, 2013)29.

In terms of effect sizes, the results of the full model will indicate that Participation among the farmers in the industry activities was the most important predictor of good governance among the social capital variables. This is especially important for the role of the regulator and other stakeholders within the industry as Participation of farmers in the activities of the industry is probably the area they are most likely to be able to influence directly with appropriate policies and programs as against the other social capital variables – that is social relations among the farmers and shared values.

Overall, the econometric results are very much in line with theoretical expectations, and also confirm the insights of the qualitative fieldwork. In short, the structural, relational and cognitive facets of social capital appear to act in unison with improved (perceptions) of governance within

29 The significant and negative coefficient on the interaction term between social relations and participation is more difficult to interpret. Intuitively a positive sign might be expected and the results here may reflect a collinearity problem (see Greene, 2008).
the Ghanaian cocoa industry. This result undoubtedly has important implications for improving governance and, indeed, wider socio-economic outcomes in the Ghanaian cocoa industry, and also potentially in other settings. Moreover it suggests that notions of governance that are broad in scope, such as that of the UNDP (1997) or Le Gales and Voelzkow (2001), are appropriate definitions to adopt in that they include these important aspects of social capital.

5.6 Conclusion

Good governance is now recognised as an important facet in enhancing socio-economic development, and it has long been accepted that an important factor contributing to better governance outcomes is social capital (Putnam, 1993b). Yet the majority of studies exploring this relationship have tended to be macro-orientated or consider the governance of sub-national authorities and they predominantly have a Western focus. For smaller actors, particularly in the developing world, it is the governance of micro-orientated institutions that matters since this has an immediate impact upon their own welfare. This chapter explored the impact of the various dimensions of social capital upon perceptions of governance - an accepted proxy measure of governance – in an important strategic agricultural sector (cocoa) in a ‘developing’ country (Ghana). Drawing upon unique interview and survey data, and utilising multi-dimensional measures of governance and social capital, the results demonstrate that an expected positive (empirical) relation also exists within this very different environment.

The results have some implications for policy, not only for the Ghanaian cocoa industry but also more widely. First, they suggest that in enhancing socio-economic development and good governance, there is clearly a role for industry institutions through their local and regional bodies to act as appropriate conduits in encouraging wider stakeholder participation, and in enhancing
social capital, shared values, and fostering greater consensus in formulating industry strategy (see also Amin and Thrift, 1994). This can lead to better governance, wider ‘voice’ in decision-making and outcomes reflecting wider stakeholder (or public) interests in socio-economic development which are important themes for this thesis and will be discussed further in the conclusion chapter of the thesis (See also Cowling and Sugden, 1999, Sacchetti, 2013).

Finally, this research suggests the governance process appears to work better in the more productive cocoa growing regions (Western and Ashanti), than in the smaller growing regions, where a significant number of farmers appeared dis-engaged. To address this, it might be that COCOBOD and local Extension Officers, in these regions, seek greater communication/deliberation with local farmers, and possibly begin to widen the local governance process (possibly via democratic elections to executive boards of local associations). This might lead to greater inclusivity and better (perceptions) of the COCOBOD governance, which, in turn, can improve socio-economic outcomes. Also, this finding points to differences in the levels of social interactions within the industry, with the highly productive regions and high-earning farmers having more social capital and hence better governance than the lower-productive regions and also poorer farmers. Such a situation is likely to have consequences for the welfare of such poor regions and farmers who by being disengaged from the industry are unlikely to be involved in the governance processes or benefit from the activities of the industry regulator, raising again the issues of strategic failure and the marginalisation of the very poorest within the industry despite the positive effects noted of the social capital structures within Ghana’s cocoa industry. This is the issue now addressed in the next chapter of the thesis by examining inequalities in the social capital within the industry and its impact on the welfare of farmers in Ghana’s cocoa industry.
Chapter 6 – Farmers’ Welfare & Inequalities in Social Capital in Ghana’s Cocoa Industry

6.1 Introduction

Chapter 5 above concludes that social capital among farmers in Ghana’s cocoa industry has significant consequences for perceptions of the governance structures within the industry. This finding through both a qualitative method and a statistical analysis of data collected from 12 cocoa cottages in all 6 of Ghana’s cocoa growing regions, is in line with previous literature that has identified a direct positive relationship between social capital variables and ‘good’ governance (See Becattini, 1979, Putnam, 2001b, Adler & Kwon, 2002, Bjornskov, 2010, Jones, 2001, Imrie & Raco, 2003, Putnam, 1993a, Cusack, 1999, Rice, 2001, Coffe & Geys, 2005).

The findings also suggest that social engagements and the governance process appear to work better in the more productive cocoa growing regions (Western and Ashanti), than in the smaller growing regions (Volta, Eastern, Central and Brong Ahafo). Furthermore, a significant number of the poorer farmers surveyed appeared to be disengaged from the industry, with low perceptions of governance, as compared to the more prosperous farmers. These conclusions therefore hint at differences in the levels of social interactions within the industry, with the highly productive regions and high-earning farmers having more social capital and hence better governance than the lower-productive regions and also poorer farmers. These observations, as noted in Chapter 5, are likely to have consequences for the welfare of such poor farmers who, by being disengaged from the industry, are unlikely to be involved in the governance processes or benefit from the activities of the industry regulator. This social disparity between the rich and the poor is well highlighted in the literature on social capital (See Lin, 2000, Cleaver, 2005).
The literature also notes that it is not only in the ‘quantity’ of social capital that one can distinguish the rich from the poor but also in the ‘quality’ of their social relations; that is rich farmers do not only have more social relations but are also engaged in the richer or more ‘transactional’ forms of social capital – described as ‘weak ties’ in the literature and associated with improved economic attainment and development (See Granovetter, 1973; Woolcock, 2001).

There is also a critical examination of this relationship outlined in a well-researched aspect of the literature that advocates that social capital impacts on incomes and wealth of participants (See Grootaert, 1999, Feuer, 2004, Martin et. al., 2004, Johannes, 2009, Narayan and Pritchett, 1999). Richer farmers are therefore wealthier because they are more engaged than the poorer farmers. This results in a circular relationship where social engagements improve wealth and then the wealthy engages in more social relations and thereby creates a cycle that continually re-enforces itself with the rich getting more and more socially engaged and the poor becoming less and less engaged and this further impacts upon their ability to participate in the governance processes.

Therefore, in furtherance to Chapter 5, this chapter will be exploring in more detail the different levels (types) of the social relationships that exist in Ghana’s cocoa industry with a view to identifying any inequalities in social capital appropriation that exists between the high earning farmers and the lower earning farmers, and also between the highly productive cocoa growing regions and the less productive regions. This study is important because the purpose of improving social capital and practising good governance, highlighted in Chapter 5, is ultimately for improvements in the livelihoods of the poorest participants within an industry and enhancing their socio-economic development. Therefore if poorer farmers are unable to make use of the social

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30 Number of social relations or interactions
capital available in the industry then there are important consequences for the welfare of such participants as well as the fortunes of the overall industry.

This is also related to the overall theme of this thesis; which is the role of social capital in mitigating ‘strategic failure’ in the governance processes of Ghana’s cocoa industry. ‘Strategic failure’ has among its negative outcomes the entrenchment of poverty and a lack of development opportunities for the poorest participants who are unable to engage in the decision-making processes of the industry (See Cowling and Sudgen, 1998, 1999, Sacchetti, 2013, Sacchetti and Sugden, 2003, 2009). It is therefore important that in postulating that enhanced social relations can impact on the effects of top-down governance structures, we also analyse further any differences in the intensity of social relations for the poorer farmers as against the higher earning farmers, as alluded to in Chapter 5 above.

This is also because merely concluding (as we have done in Chapter 5) on social capital’s importance for governance processes will not be sufficient to infer that social capital would impact on the real effects of ‘strategic failure’ if those at the bottom of the pyramid have significantly lower social capital than the richer participants. It means that the ‘good’ governance that results from the overall ‘social capital’ within the industry, while being able to mitigate the negative consequences of top-down organisations for some of the participants, would be inadequate in completely upturning the endemic poverty and low incomes among the poorest people in Ghana’s cocoa industry.

The analysis in this chapter should therefore deepen the understanding into the role social capital can (cannot) play in improving the fortunes of industry participants in Ghana’s cocoa sector and is also in line with the literature that has identified a relationship between the quantity and quality
The chapter is organised as follows. First, there is a summary of the literature on the different levels of social capital and its relation to different levels of welfare for participants within an industry. The theory is then discussed through our observations of varying forms of social capital in the industry; that is the relations among the farmers, relations between the farmers and COCOBOD and relations between the farmers and the Licensed Buying Companies (LBCs). An empirical analysis of our survey data is then developed using an ‘Analysis of Means’ identifies the differences in the social capital among the income groups and regions that make up Ghana’s cocoa industry. Finally the chapter concludes with a summary.

6.2 Levels (Types) of Social Capital

Individual participants or groups within an industry have different levels (types) of social interactions. This is the point made in Lin (2000) that there is inequality in the acquisition of social capital and this contributes to social inequality such as in terms of socioeconomic achievements and the quality of life. Such inequality can be expressed both in the quantity or quality of the social capital resource that an actor or participant can access and is evident across gender, ethnic, and income groupings. This means that not all individuals or groups uniformly acquire or receive the expected returns from their social capital (See also Lin, 1982, Cleaver, 2005).

Lin (2000) advocates two reasons for this inequality in both the quantity and quality of social capital among different groups. First is when certain groups cluster at socioeconomically disadvantaged positions through structural issues such as history, culture, or institutional
frameworks. This results in such groups becoming embedded in social networks that are poorer or limited in resources and therefore leading to poorer social resources that are not diversified or resource-heterogenous (See Lin, 1982). Secondly, inequality in social capital can occur when there is a general tendency for individuals to associate with those of similar socioeconomic characteristics. While cross-group ties facilitate better access to resources, the lure of being with people of a similar kind (homophily) results in such closed networks that breed inequality in social capital resources.

Lin (2000) further postulates two more underlying theories that could explain the establishment of divergent social capital appropriation in any setting. These are *Capital Deficit* and *Return Deficit*. Capital deficit is the process by which there is differential investment or opportunities for one group which then results in a relative shortage of both the quantity and quality of social capital for one group as against the other. So for example, the unequal investment of the industry regulator of Ghana’s cocoa industry in the social capital of the more productive regions will result in more social capital for these regions as compared to the less productive regions. In the same vein, where officials of COCOBOD pay more attention to the social capital needs of richer farmers (who are more important in terms of relevance for the performance of the regulator) there is a resultant deficit for the social capital levels of poorer farmers.

Return deficit, on the other hand, is where a given quantity or quality of social capital results in different outcomes for different groups. This can result, depending on the context, from individualised preconceived notions, cultural influences, institutional drawbacks, and stereotyping (See Cleaver, 2005). For example, richer cocoa farmers are likely to have their concerns given more attention at forums with officials of the regulator despite the fact that poorer farmers would
also be given the opportunity to voice their opinions at such meetings. Rich farmers therefore gain more from participating as compared to poor farmers.

Different levels of social capital can also be explained through the linkages that form a participant’s social capital. Adler & Kwon (2002) quote the literature as differentiating between two main social relations for participants within an industrial setting: internal and external linkages. Internal linkages are those focused on the internal collective action resources that arise within a social setting such as the peer-to-peer relationships among farmers within an agricultural industry; while external linkages focus on social capital as a resource gained by external relations of an individual or group – such as between farmers and an industry regulator.

Under this framework of internal and external links, Woolcock’s (1998) analysis of social capital postulates that there are four situations of social relations for any individual participant or group in any setting. The first is where the individual or group has both weak internal and external linkages. Such participants within an industry have very low social capital. The second is where participants have both strong internal and external linkages and have exceptionally high social value. Then there are the mid-ways that have either strong internal and weak external ties, or have weak internal and strong external ties. These will usually tend to result in lop-sided interactions that result in a form of myopia and inwardness in the former and weak community solidarity in the latter.
In line with the above context situation of social capital, Wu & Pretty (2004) also make a distinction between available social capital and used social capital. Social capital can be available in the public sense within the industrial structure and is therefore potentially useful to individuals or groups. But as to whether individuals or groups can make use of this requires their direct participation. Reimer et. al. (2008) goes even further to identify a weak relationship between available social capital and used social capital in most industrial settings. This particular distinction of social capital therefore means that increasing the availability of social capital or having a lot of available social capital will not necessarily always lead to its greater use and impact if a majority of the participants are unable to use or access such social capital.

The literature also emphasises the ‘type’ of social capital, apart from the level, in distinguishing the impacts of one’s social capital on personal or group fortunes. Woolcock (2001), for example, makes a distinction between ‘weak’ (transactional) and ‘strong’ (trusting) social capital and indicates that this segmentation has particular significance for understanding the plight of the poor. This is because most poor people do have a lot of ‘social capital’; typically made up of close-knit

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31 ‘Weak’ social ties and ‘strong’ social ties (as used by the literature) represents ‘transactional’ relations as against more ‘trusting’ relations and should not be confused with ‘strong’ linkages and ‘weak’ linkages.
family and friends. This intense, strong, or ‘bonding’ social capital is only able to help these people to “get by” or make ends meet (Briggs 1998, Bebbington 1999). However, poor people tend to lack ‘weak social capital’ that is the more diffuse, extensive, and is made up of ‘bridging’ relationships with many acquaintances and contacts and that can be harnessed by the non-poor to “get ahead” or improve their livelihoods (Barr 1998, Narayan 1999, Kozel and Parker 2000). This is explained in Granovetter’s (1973) classic work on social capital in which he interviewed a number of professional and technical workers from Boston on how they found their present jobs. He found that 56% of those interviewed found their job through a personal connection, while 18.8% used advertisements and head hunters, and 20% applied directly. This, immediately highlights the importance of social relations for improvements in livelihoods. But, even more importantly, Granovetter’s study showed that a majority of the contacts that resulted in the interviewees getting a job were actually ‘weak ties’. Of those who used a contact to find a job, only 16.7% saw that contact ‘often’, 55.6% saw their contact only ‘occasionally’ and 28% ‘rarely’ saw their contacts. To put it much clearer, most of the people that Granovetter interviewed were not getting their jobs through their friends but rather through acquaintances. This is because acquaintances, rather than friends, are more likely to provide new information or new ideas and to provide more different options. This is what Granovetter describes as the ‘strength of weak ties’.

To conclude, the literature suggests that there is inequality in the acquisition of social capital and this can contribute to social inequality between the rich and the poor. The literature also identifies varying levels of social relations with different combinations between internal and external linkages. Participants can therefore have different levels of social capital within the same industry. Furthermore, in the context of availability as against usage of social capital within an industry, participants can be segmented further into those who can use or take advantage of the available
social capital and those who are unable to use the opportunities that exist for social engagement. Finally, the type of social capital that dominates the relationships poor people have are typically more closer and ‘trusting’ in nature in comparison to the ‘transactional’ forms of social capital that characterise the relationships of the rich.

The next segment now addresses a reverse causality situation in the literature, where more social capital results in improved wealth. This mostly empirical literature state that the rich are not simply predisposed or predestined to have more and better social capital, but that social capital itself actively divides participants into the rich and poor by ‘rewarding’ those who are more engaged. This further insight into the role social capital plays in determining welfare adds to the earlier discussions into the inequalities in social capital that this chapter addresses by stating that the relationship can run in both directions; that is from more wealth to more social capital (addressed in this segment) or from more social capital to more wealth. This would result in a re-enforced cycle that ensures that the richer participants get more engaged and wealthier while the poorer participants get more disadvantaged. The impact of social capital on income levels is therefore an important consideration for this chapter in trying to explain any differences in the social capital levels between the richest participants and the poorest in Ghana’s cocoa industry.

6.3 Social Capital & Welfare

The consequences of improved social capital on ‘bread-and-butter’ issues such as incomes, welfare, economic growth, and poverty are well articulated in the literature. First there is Grootaert’s (1999) work on poverty in Indonesia, in which he argues that social capital should be seen as forming part of a nation’s production function. He examined empirically the impact of
social capital on household welfare and poverty, and concludes that more social capital reduces the probability of being poor; and this impact is over and above that of human capital and other household assets. In a general sense, this means that one’s education is worth less than ‘who you know’. According to Grootaert, this important effect of social capital on income levels operates through three mechanisms: sharing of information among association members; a reduction of opportunistic behaviour; and improved collective decision making (Johannes, 2009).

Feuer (2004) also indicates that social interactions contribute directly to livelihoods through improvements and dedication to personal business. They find that depth of market interactions and membership in market associations in two villages in Cambodia are positively related with wealth. Furthermore, in Martin et. al. (2004), a survey of 330 low income households in Connecticut tests the relationship between social capital and household food security. They conclude that social capital is significantly associated with a decreased likelihood of experiencing hunger and that the root of poverty is often not just lack of money, but also lack of social networks and the support included in social capital.

Johannes (2009) uses the 2001 household survey in Cameroon to examine the effects of social capital on household poverty as measured by household per capita expenditure. The empirical analysis shows a strong and positive relationship between social capital and household welfare; hinting that households with high social capital are less likely to be poor. She goes on to suggest that policymakers interested in improving household wellbeing, especially in increasing household income and reducing poverty must look at promoting social capital as a means to achieve these objectives. This again relates well to Brabec et. al. (2007), who found evidence in a survey of farmers in the Bolivian Amazon that village social capital and village income complement each other in relation to issues such as health and wellbeing.
Finally, Narayan and Pritchett (1999) use data from the Tanzania Social Capital and Poverty Survey (SCPS) to relate associational activity as a measure of social capital with data on household income, and find that village-level social capital raises household incomes. The results show that the magnitude of social capital’s effect on incomes is very large; a one standard deviation increase in village social capital increases household expenditures per person by at least 20 to 30 percent. The impact is as large as an equivalent increase in non-farming assets or tripling the level of education. According to Narayan and Pritchett (1999) the channels through which social capital affects incomes are better publicly provided services, greater use of modern agricultural inputs, more community activity, and greater use of credit in agriculture.

The indication in the literature is therefore an overwhelming emphasis on the importance of social capital for incomes through mechanisms such as the sharing of information among association members, reduction in opportunistic behaviour, improved collective decision making, better provision of public services, greater use of modern inputs, more community activity, and greater use of credit in business.

There is an indication also in some aspect of this literature that there are different types (qualities) of social capital and in terms of their impacts on the income levels of the poorest people, it is the ‘weaker’ forms of social capital rather than the stronger, bonding relationships that are more important in explaining the observed impacts of social capital on incomes (issues we have alluded to in Section 6.2 above).

For example, Hermann & Kopasz (2011) examined the effect of social capital on wage incomes in 25 European countries with a focus on whether weak social ties have a stronger effect on incomes than strong social ties. The study found that the market relations within the countries,
which are ‘weak ties’ (as discussed in Section 6.2), were more important in explaining the
differences in income levels than the stronger, bonding ties of family and friendships. Wiig (2003)
in another study of 49 communities in the Peruvian highlands concludes that the traditional ways
of cooperation such as through voluntary associations and groups, which are major contributors to
social capital according to much of the literature, actually have no significant effect on the average
income level in these communities.

Feuer (2004) however, finds that these traditional measures of social capital, such as trusting
behaviour and membership in voluntary groups can predict some changes in livelihood; but
concludes that these forms of social capital only contribute to household incomes inasmuch as they
can create efficiency gains in the marketplace. He identified these efficiency gains as including
reduced transaction costs, increased entrepreneurship, and larger insurance and credit networks.
On the other hand however, Feur (2004) find conclusively that the depth of market interactions
and membership in market associations are strongly and positively related with wealth.

Knudsen & Rousseau (2005) also highlight two more studies that differentiate between weak ties
and strong ties in relation to the issues of economic growth and economic attainment. They discuss
Putnam (2000) which states mounting evidence for social capital to result in aggregate economic
growth; which is then later refined in Putnam (2002) that it is more likely for weak ties to drive
economic growth than ‘bonding’ strong ties. Knudsen & Rousseau (2005) also note the work of
Briggs (2003) which link weak ties to the economic attainment of poor inner city minorities.
Specifically, Briggs states that black females who get their job information from neighbours earn
less than those that use job contacts from outside the neighbourhood. This they argue is because
such weak ties improve access to information; result in more recommendations and endorsements,
and facilitates better preparation and mentoring. Putnam (2000) also notes how strong ties can
impact negatively on economic attainment with the example of how ethnic-based relations can provide capital and customers for start-up entrepreneurs but can conversely; drag down these businesses through the pressures of solidarity and patronage.

Therefore despite the conclusions in the literature that social capital in general impacts on income levels, it is actually the ‘weak’ social capital, characterised by more divergent relations that are transactional in nature that is more likely to have a stronger positive impact on incomes than the ‘strong’ social capital which consist of trusting and bonding relationships. This relates to our earlier arguments that it is not just in terms of the quantity of social capital, but it is also the ‘quality’ of social capital that distinguishes the type of engagements of the rich from the poor.

In conclusion, this segment has identified the importance of social capital for understanding the differences in welfare of industry participants according to the current literature. It is in line with our earlier discussion that notes that different participants or groups will appropriate the social capital resource within an industry differently. The rich are therefore more likely to have more social capital, and those with more social capital are likely to be richer suggesting a virtuous circle with the rich getting richer, and a vicious cycle for the poor who get poorer.

The next sector now discusses the above theory through the observations from the interviews conducted on the varying social relations within Ghana’s cocoa industry. It seeks to highlight any differences in the levels (quantity) and types (quality) of social relations between the income groups among the farmers and also among the cocoa growing regions.
### 6.4 Levels (Types) of Social Relationships in Ghana’s Cocoa Industry

There are three important social relations farmers engage in within Ghana’s cocoa industry. These are outlined in Table 10 below (also refer to the diagram of the industry in Chapter 4 above). The first form of social relations in Ghana’s cocoa industry is the professional relationship between peer cocoa farmers. Farmers also have relations with the COCOBOD officials allocated to their cocoa village and thirdly, there are relations between the farmers and the Licensed Buying Companies (LBCs).

The first type of social relations is formed mainly through the activities of farmers’ associations that exist in most farming cottages in Ghana’s cocoa sector. These were mostly local associations organised and led by the extension officers of the industry regulator, COCOBOD. As discussed in Chapter 5 above on the importance of such associations for the governance structures of the industry, these meetings of local associations are used by COCOBOD officials to discuss issues concerning cocoa farming within the localities with the farmers and to exercise control over the activities of the farmers.

#### Table 10: Types of Farmers’ Social Relationships in Ghana’s Cocoa Industry

<table>
<thead>
<tr>
<th>Types of Farmers’ Social Relationships</th>
<th>Characteristics</th>
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<tbody>
<tr>
<td>Farmers’ Relationships with Peer Farmers</td>
<td>Mostly made up of ‘strong ties’ (trusting relationships); Communal spirit; Based on shared values &amp; solidarity; Confined to cottage level associations; Tendency to become ‘parasitic’; Used by farmers to ‘get by’</td>
</tr>
<tr>
<td>Farmers’ Relationships with COCOBOD Officials</td>
<td>Weaker ‘strong ties’; Hierarchical (bureaucratic) relationship; Positive feedback on the role of COCOBOD extension officers; Exclusive relationships very important to the business of an</td>
</tr>
</tbody>
</table>
Farmers’ Relations with Licensed Buying Companies

‘Weak ties’; market-based transactional relationships; Distrust between farmers and the LBCs; Close relationship with LBCs very important for the welfare and business of farmers

The survey conducted by this thesis evidenced a lot of commitment to the above described local associations organised by the extension officers with good attendance at meetings of associations. This provided a very good platform for socialisation among the farmers within a cottage and was evidently important for the dissemination of information and know-how about the industry. The formation of such communal spirit among industry players has been identified as important in improving the welfare of such participants especially in terms of how these relations then facilitate market relations (See Narayan and Pritchett, 1999). A number of the farmers we interviewed therefore described how they had used advice from peer farmers in improving aspects of their business including advice on better farming practices and sources of credit for farmers as noted in the discussions of farmers’ social relations in Chapter 5 of the thesis.

However, an important point to note here is that the extent to which these associations’ activities can impact on the welfare of the farmers is affected by the fact that the associations are mostly confined to just the cottage-level and there is very little social organisation on the regional level, and higher up at the national level. These important farmers’ relations are therefore limited, for most farmers, to only socialising with other farmers within a local farming cottage and there is very little knowledge shared among farmers of the industry above the local level. This results in a situation where the local associational relations could actually create silos of information and knowledge with little profitable interactions between the cottages (See Uzzi, 1996). Farmers hence
have more internal linkages and less external social linkages resulting in a state of myopia (See Woolcock, 1998).

Significantly, the richer farmers though faced by similar constraints of only localised associations usually have farms and partnerships with other farmers in a number of cocoa cottages. They are therefore able to interact with more farmers and are not limited to the knowledge and resources of one cocoa cottage. This importantly improves the social capital resource available to richer farmers.

We also noted a tendency among the poorer farmers, during our field trip, to be more focused on their relations with COCOBOD and its officials in furthering their business (due to the dominance and importance of the regulator to the business of such farmers) as compared to business collaborations with other farmers which the richer farmers are more likely to use in furthering their businesses. Farmers relations among the poor are therefore more underdeveloped and likely to be used by them to ‘get by’ rather than ‘get ahead’ (See the discussions in Section 6.2).

Poorer farmers and farmers in poorer regions suffer even more from relations with farmers because of ‘clustering around socioeconomically disadvantaged positions’ (See Lin (2000), and Section 6.2 above). Some of these poor farmers reported that they had been forced, out of solidarity, to advance loans and other forms of support to other poor farmers who have then gone on to default on paying back, resulting in significant losses to their businesses. There were also examples of farmers not honouring their commitments to the group; such as in paying back their personal debt commitments when the farmers go in for group loans from financial institutions (eroding the credit worthiness of the other farmers in that cocoa cottage). These drawbacks have tended to make most of these farmers wary of close collaborations with other farmers on their business activities (See
Uzzi, 1996, Molina-Morales & Martinez-Fernandez, 2009, on the impacts of such over-embeddness within an industry).

The richer farmers and farmers in the richer regions are less likely to be faced with such constraints as they tend to trust each other’s credit worthiness more and also have better relations with major financial institutions that invariably are by far having greater presence and activities in the richer cocoa growing regions of Ghana (Ashanti & Western regions) as compared to the poorer regions.

The second identifiable relationship in the industry is the hierarchical relations between the farmers and COCOBOD. COCOBOD is the bureaucratic structure that regulates the industry and thereby creates a hierarchical social relationship with the farmers. Farmers’ contact with COCOBOD is mainly through its Extension Officers and the study in 12 cocoa cottages showed the feedback from farmers on these officers was extremely positive. It is important to note here that a number of the farmers relate more directly with the extension officers from COCOBOD than they relate with other cocoa farmers. These extension officers meet farmers on a regular basis and provide them with education on new and improved techniques in farming. These officers also deliver to the farmers any inputs that COCOBOD contributes to the development of their business; such as improved seedlings, protective gear and equipment, and a regular supply of pesticides – all important for improving the welfare of the farmers. The direct acquisition of inputs and the access to new knowledge and information evident in the relationship between a farmer and an extension officer would clearly impact on income levels and underscores the importance of such a relationship for the farmer.

We also evidenced, importantly, through our interviews with the farmers that the inputs from COCOBOD are not always shared equitably by the extension officers to the farmers. This results
in a situation where the farmers that have more contact with the Extension Officer or are more important for the goals of COCOBOD, being more likely to benefit from the supplies from COCOBOD than farmers that do not engage with the officials or are less important. This well suits the farmers in the more productive regions who are favoured by COCOBOD in terms of the distribution of resources and contact with COCOBOD officials.

Individual farmers who can also benefit from this unequal distribution of resources are those that court these extension officers aggressively, with various incentives, in order to have exclusive access to the extension officers and to monopolise the limited resources from the industry regulator. There were, for example, situations we encountered during the field trip where some farmers received double their allocation of fertilisers while other farmers did not get any at all. This ‘survival of the fittest’ situation is more likely to benefit the richer farmers who have the resources to ‘incentivise’ or out-rightly bribe the COCOBOD officials to give them more of the inputs such as the fertilisers and pesticides that they regularly distribute.

These result in the benefits of the relations between farmers and the COCOBOD officials being heavily skewed towards the richer regions and only a few farmers who are able to benefit by cultivating close relationships with the COCOBOD officials. Most farmers are therefore only likely to benefit from their relations with COCOBOD through the magnanimity of these officials.

Finally, in the ‘weakest’ social capital form in the industry, farmers are in a transactional relationship with Licensed Buying Companies (LBCs) who buy their cocoa to onward sell to COCOBOD. This is a pure market relationship, with the LBCs paying farmers the COCOBOD approved price for a bag of cocoa beans (See Chapter 4 for details on how the LBCs purchase the cocoa beans from the farmers)
The study showed that the attitude of farmers to the Licensed Buying Companies was overwhelmingly that of distrust. They felt that the LBCs cheated them by manipulating the scales used to weigh their cocoa beans, meaning that they are paid less for their cocoa harvest. They also complained that there are instances where the LBCs will complain that their cocoa was of poor quality (not well dried) and therefore pay them a lower price for each bag of cocoa. These farmers will then later find out that this was merely a ploy to bargain with them in order to purchase their cocoa at a lower rate than the COCOBOD approved price for a bag of cocoa.

Though this means that most farmers do not have a good relationship with their buying companies; those that do are able to develop beneficial relationships with these buying agents that include the provision of a form of informal credit relationship with the LBCs. This credit facility operates by farmers receiving money for cocoa beans that are yet to be harvested – a form of pre-payment for goods. This financial support for some of the farmers from the LBCs maintains the livelihoods of such farmers who have no incomes to rely on in-between the harvests of their cocoa beans. This also relates well with the impact of credit opportunities for improving incomes (noted in Section 6.3 above that identifies the elements of social capital that results in better welfare for the poorest people) and makes the point that farmers’ good relations with their buying companies is usually crucial in providing income at the worst of times for these farmers.

32 The study however, notes that most Licensed Buying Companies have stopped this credit relationship with a number of the farmers as some of the farmers have tended to undermine the informal ‘contractual’ relationship and reported ‘poor’ harvests in order to sell their harvested produce to other Licensed Buying Companies to make more money; while delaying paying up the credit facility owed till their next harvest. This has resulted in losses for the Licensed Buying Companies and has therefore curtailed the impact that this credit arrangement could have on the income fortunes of Ghana’s cocoa farmers. However, the point is still relevant that better relationships with the Licensed Buying Companies could have an important consequence on the economic fortunes of a farmer.
We further observed many instances where the relationships between the farmers and the LBCs can significantly impact on the incomes of farmers. For example, Licensed Buying Companies are also able to provide warehousing facilities for some farmers and this helps such farmers from recording high post-harvest losses and spoilage of their cocoa beans. It also reduces the costs associated with farmers owning and maintaining their own warehouses. There are also the instances where LBCs impact positively on the business of farmers by providing free spraying services for the farmers with whom they have an established business relationship; which helps to improve the final output of the farmers. Finally, we observed some of the LBCs providing training for farmers on good farming and storage practices farmers can employ to improve their yields.

It is evident from the above that the relationship a farmer cultivates with a buyer can be very important for his or her business, probably above the relations of farmers with their peer farmers or COCOBOD officials. This relates well with our review of the literature in Sections 6.2 and 6.3 above which indicates that the ‘weak’ transactional forms of social capital are most important for improving income levels.

However, we also noted that this was also the least developed relationship for most of the farmers; and the mutual distrust between the farmers and the LBCs in the cocoa industry has also undermined the impact of the transactional and ‘weak’ social capital found in such relationships.

Here again, however, we noticed that most of the buying agents gave preferential treatment to the richer farmers, who naturally are more important to their business than the poorer farmers. We also observed that there are more LBCs operating in the richer cocoa regions as compared to the poorer regions. The competition among these LBCs operating in the Ashanti and Western regions results in the buyers engaging more with the farmers and offering auxiliary services (i.e. credit
facilities and warehousing) in order to gain more market share from the competitors. The poorer farmers and regions are hence very disadvantaged in terms of their relationships with the LBCs.

The data from our survey now allows us to further explore the above described relations within the industry in order to understand any variations in the social capitals that may exist among the farmers; and among the cocoa growing regions. The use of a statistical method to complement insights from more qualitative methods such as the above observations and interview data is well founded in the economic literature (See Yin, 1989, Easterby-Smith et. al., 1991, Gable 1994), and adds more weight to the conclusions of a study due to its rigour and objective analysis (See Kuhn, 1970; Kaplan and Duchon, 1988; Remenyi and Williams, 1996)

6.5 Empirical Study

The survey was of 300 cocoa farmers in a six of Ghana’s cocoa regions – Western, Ashanti, Brong Ahafo, Central, Eastern and Volta regions (See Chapter 3 for details on the methodology used). The questionnaire used for the survey included questions on the farmers’ income from their cocoa farming business in the past year, as well as on varying social relations they engage in within the industry. The various social capital items specifically employed to test the differences between regions and income groups are outlined below in Table 1133:

33 There are more items used in for the social capital variables in this chapter than those used for the social capital construct for ‘Relations with other farmers’ employed in Chapter 5 in order to capture the different types of ‘ties’ as discussed in Section 6.3 (i.e. weak ties (more transactional in nature) as against strong ties (more trusting in nature))
Table 11: Social Capital Variables & Items

<table>
<thead>
<tr>
<th>Social Capital Variables</th>
<th>Items</th>
</tr>
</thead>
<tbody>
<tr>
<td>Social Relations with other Farmers</td>
<td>a) Socialise with other farmers in the industry</td>
</tr>
<tr>
<td></td>
<td>b) Part of an informal network among farmers, suppliers and agents in the industry</td>
</tr>
<tr>
<td></td>
<td>c) Communicate with other farmers very often (i.e. at least once a fortnight)</td>
</tr>
<tr>
<td></td>
<td>d) Comfortable receiving advice from other farmers</td>
</tr>
<tr>
<td></td>
<td>e) Participate in Industry run training courses that allow social interactions to take place</td>
</tr>
<tr>
<td></td>
<td>f) Collaborate with other farmers in achieving goals</td>
</tr>
<tr>
<td>Social Relations with COCOBOD</td>
<td>a) Attendance at programmes and workshops organised by COCOBOD</td>
</tr>
<tr>
<td></td>
<td>b) How often do you feel a part of the decisions made by COCOBOD for farmers?</td>
</tr>
<tr>
<td></td>
<td>c) How often do you get in contact with an official from COCOBOD?</td>
</tr>
<tr>
<td></td>
<td>d) How often do you use the cocoa spraying services initiated by COCOBOD?</td>
</tr>
<tr>
<td></td>
<td>e) How often do you receive financial support from COCOBOD?</td>
</tr>
<tr>
<td></td>
<td>f) Extent of utilizing personal ties, networks, and connections with COCOBOD to access funds, information, knowledge or contacts during the past three years</td>
</tr>
<tr>
<td>Social Relations with Licensed Buying Companies</td>
<td>a) Extent of co-operation with Licensed Buying Companies on Seed Capital</td>
</tr>
<tr>
<td></td>
<td>b) Extent of co-operation with Licensed Buying Companies on Disease Prevention</td>
</tr>
<tr>
<td></td>
<td>c) Extent of co-operation with Licensed Buying Companies on Warehousing &amp; Storage</td>
</tr>
<tr>
<td></td>
<td>d) Extent of co-operation with Licensed Buying Companies on Payment for Goods</td>
</tr>
</tbody>
</table>
e) Extent of co-operation with Licensed Buying Companies on Technological upgrading
f) Extent of co-operation with Licensed Buying Companies on Generating new processes

To conduct such a study the sample of farmers was split first into two mutually exclusive groups of farmers in the high production regions (Western and Ashanti) and farmers in the low production regions (Brong Ahafo, Central, Eastern and Volta). The sample was further split into farmers with high incomes; that is those with revenues of £650 (in one harvest season) and above; farmers with mid incomes between £400 and £650; and farmers with low incomes at below £400. A dummy variable was used to distinguish among the groups in each instance, with the high income groups being designated a value of 3, the mid-income group at 2 and the third group (the low income groups) the value of 1.

**Analytical Techniques**

In terms of the analytical techniques, Analysis of Means was used to compare the means of the afore-mentioned social capital variables among the groups (high, mid and low) for both regional and revenue differentiations. This allows us to observe which groups report more social interactions and analyse whether there is a clear trend that emerges from the results. A t-test is also performed to test for significant differences in these means between the two set of groups. Finally, effect sizes (standardised and unstandardised) are calculated to measure the strength of the differences between the means of the groups with the specifications that a result of d=0.2 be considered a 'small' effect size, 0.5 represents a 'medium' effect size and 0.8 a 'large' effect size (See Cohen, 1977).
6.5.1 Analysis of Means

Regional Differences in Social Relations

We begin with the Analysis of Means between regions in tables 12-14 below. Table 12 reports the results for the variable ‘Social Relations with other Farmers’ and shows that almost all the means of social capital items under this variable had significant difference between the highly productive regions and the lower production regions; with the higher production regions having more social relations among the farmers as compared to the lower production regions. The relations that have the most variation in the means between the two groups of regions (according to the level on the likert scale and their effect sizes) is in terms of advice offered by peer farmers and regular communication with other farmers. This, as indicated above in Section 6.4, highlights the better social organisational structure within the productive regions due to COCOBOD’s unequal attention to the association activities in such regions as compared to the less productive regions.

The advice of other farmers and regular communication are also important in facilitating good transactional relationships as farmers that are more engaged in such activities are also more likely to engage in direct business transactions with other farmers.

The only insignificant relationship is the collaboration with other farmers to achieve goals and as we have indicated in Section 6.4 this is due to the fact that most of the farmers are more focused on COCOBOD’s assistance for the development of their businesses rather than engaging in partnerships and other forms of collaborations with peer farmers.
Table 12: Social Relations with other Farmers (Analysis of Means – By Regions)

<table>
<thead>
<tr>
<th>Variables of ‘Social Relations with Other Farmers’</th>
<th>High Production Regions (Ashanti &amp; Western) = 88</th>
<th>Lower Production Regions (Central, Eastern, Brong Ahafo &amp; Volta) = 169</th>
<th>T-Test for Equality of Means</th>
<th>Standardised Effect Size (Unstandardised in brackets)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Socialise with other farmers in the industry</td>
<td>5.07 (2.703)</td>
<td>3.71 (2.739)</td>
<td>3.788***</td>
<td>0.50 (1.36)</td>
</tr>
<tr>
<td>Part of an informal network among farmers, suppliers and agents in the industry</td>
<td>4.47 (2.617)</td>
<td>3.44 (2.736)</td>
<td>2.901***</td>
<td>0.38 (1.03)</td>
</tr>
<tr>
<td>Communicate with other farmers very often (i.e. at least once a fortnight)</td>
<td>6.85 (0.515)</td>
<td>5.01 (2.688)</td>
<td>6.369***</td>
<td>0.95 (1.84)</td>
</tr>
<tr>
<td>Comfortable receiving advice from other farmers</td>
<td>6.83 (0.572)</td>
<td>4.82 (2.587)</td>
<td>7.183***</td>
<td>1.07 (2.01)</td>
</tr>
<tr>
<td>Participate in Industry run training courses that allow social interactions to take place</td>
<td>4.68 (2.723)</td>
<td>2.83 (2.727)</td>
<td>5.084***</td>
<td>0.68 (1.85)</td>
</tr>
<tr>
<td>Collaborate with other farmers in achieving goals</td>
<td>5.16 (2.586)</td>
<td>5.23 (2.538)</td>
<td>-0.213</td>
<td>-0.03 (-0.07)</td>
</tr>
</tbody>
</table>

NOTES: Standard Deviation in brackets; ***Significance at the 0.01 level (two-tailed); **Significance at the 0.05 level (two-tailed); and *Significance at the 0.10 (two-tailed)

Table 13 is on Farmer’s ‘Social Relations with COCOBOD’ and also shows significant results for the differences between the means of the high production regions and the low production regions with more social capital for the high productive regions. There are medium effect sizes for differences in means between how often farmers in the more productive regions get to meet a COCOBOD official as compared to farmers in the less productive regions (d=0.52) and how often
the more productive regions receive financial support from COCOBOD more than the less productive regions (d=0.41).

Significantly, the difference in the means between how farmers in the productive regions feel about being a part of COCOBOD’s decision making showed the largest effect size (d=0.95) and highlights the gulf between how farmers in the richest regions feel about impacting the policy of the regulator through their association with COCOBOD officials, and the perception of farmers in the poorer regions. This finding also has implications for the issues of strategic failure in this thesis, and the argument that the low level of perceptions for the poor in terms of how they can influence decision making results in inhibited creativity and hence their low productivity.

Table 13: Social Relations with COCOBOD (Analysis of Means – By Regions)

<table>
<thead>
<tr>
<th>Variables of ‘Social Relations with COCOBOD’</th>
<th>High Production Regions (Ashanti &amp; Western) = 88</th>
<th>Lower Production Regions (Central, Eastern, Brong Ahafo &amp; Volta) = 169</th>
<th>T-Test for Equality of Means</th>
<th>Standardised Effect Size (Unstandardised in brackets)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Attendance at programmes and workshops organised by COCOBOD</td>
<td>5.69 (2.097)</td>
<td>5.11 (2.453)</td>
<td>1.890*</td>
<td>0.25 (0.58)</td>
</tr>
<tr>
<td>How often do you feel a part of the decisions made by COCOBOD for farmers?</td>
<td>5.58 (1.952)</td>
<td>3.45 (2.519)</td>
<td>6.921***</td>
<td>0.95 (2.13)</td>
</tr>
<tr>
<td>How often do you get in contact with an official from COCOBOD?</td>
<td>6.36 (1.399)</td>
<td>5.31 (2.505)</td>
<td>3.666***</td>
<td>0.52 (1.05)</td>
</tr>
<tr>
<td>How often do you use the cocoa spraying services initiated by COCOBOD?</td>
<td>4.10 (2.626)</td>
<td>3.76 (2.336)</td>
<td>1.057</td>
<td>0.14 (0.34)</td>
</tr>
</tbody>
</table>
How often do you receive financial support from COCOBOD?

<p>| | | | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Extent of utilizing personal ties, networks, and connections with COCOBOD to access funds, information, knowledge or contacts during the past three years</td>
<td>1.40 (1.369)</td>
<td>1.00 (0.000)</td>
<td>3.783***</td>
<td>0.41 (0.40)</td>
</tr>
<tr>
<td></td>
<td>3.78 (2.108)</td>
<td>4.10 (2.194)</td>
<td>-1.022</td>
<td>-0.15 (-0.32)</td>
</tr>
</tbody>
</table>

NOTES: Standard Deviation in brackets; ***Significance at the 0.01 level (two-tailed); **Significance at the 0.05 level (two-tailed); and *Significance at the 0.10 (two-tailed)

Finally, table 14 show very low social relations between the farmers and the Licensed Buying Companies and we have already addressed this in the qualitative analysis of the industry. However, despite the low collaborations, differences in social capital between the productive and less productive regions is very pronounced with higher means for the more productive regions for all of the variable items employed (even in the one instance where the result is insignificant).

This result could indicate how important these transactional relations with the Licensed Buying Companies are in determining the productivity of the Ashanti and Western regions as compared to the other regions. It highlights that despite the current state of poor social interactions between the farmers and their buyers, the presence of more LBCs in the more productive regions has resulted in closer collaborations and in line with our review of literature on the significant impact of such ‘weak ties’ on income levels could be a reason for the productivity of these regions as compared to other regions.
Table 14: Social Relations with Licensed Buying Companies (Analysis of Means – By Regions)

<table>
<thead>
<tr>
<th>Variables of ‘Social Relations with Licensed Buying Companies’</th>
<th>High Production Regions (Ashanti &amp; Western) = 88</th>
<th>Lower Production Regions (Central, Eastern, Brong Ahafo &amp; Volta) = 169</th>
<th>T-Test for Equality of Means</th>
<th>Standardised Effect Size (Unstandardised in brackets)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Seed Capital</td>
<td>2.58 (2.333)</td>
<td>1.71 (1.740)</td>
<td>3.370***</td>
<td>0.42 (0.84)</td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Disease Prevention</td>
<td>2.10 (2.090)</td>
<td>1.78 (1.859)</td>
<td>1.259</td>
<td>0.16 (0.32)</td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Warehousing &amp; Storage</td>
<td>1.81 (1.850)</td>
<td>1.21 (1.114)</td>
<td>3.207***</td>
<td>0.39 (0.60)</td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Payment for Goods</td>
<td>3.90 (2.901)</td>
<td>2.87 (2.631)</td>
<td>2.868***</td>
<td>0.37 (1.03)</td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Technological upgrading</td>
<td>2.09 (1.706)</td>
<td>1.08 (0.488)</td>
<td>7.193***</td>
<td>0.80 (1.01)</td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Generating new processes</td>
<td>2.44 (1.819)</td>
<td>1.19 (0.859)</td>
<td>7.507***</td>
<td>0.88 (1.25)</td>
</tr>
</tbody>
</table>

NOTES: Standard Deviation in brackets; ***Significance at the 0.01 level (two-tailed); **Significance at the 0.05 level (two-tailed); and *Significance at the 0.10 (two-tailed)
Income Differences in Social Relations

Table 15 below reports the differences in means among farmers in the more productive regions with high incomes, farmers with mid-incomes and farmers with low revenues for the social capital variables - ‘Social Relations with other Farmers’, ‘Social Relations with COCOBOD’ and ‘Social Relations with the Licensed Buying Companies’. It shows that for almost all the means of social capital items under these various variables, high earning farmers reported more social capital than both the mid-earning farmers and the low earning farmers within the two regions of Ashanti and Western. However, only one variable (How often do you use the cocoa spraying services initiated by COCOBOD?) had a significant result for the differences in means between the high and low earning farmers. The lack of significant results for the differences in means among the farmers in the more productive regions could be attributed to the established social structures that have been put in place in these ‘rich’ cocoa regions by the COCOBOD and other stakeholders. This ensures that all the farmers in these regions, irrespective of their income levels are encouraged to participate more within the industry and develop their social capital.

Table 16 also shows the differences in means among farmers in the less productive regions with high incomes, farmers with mid-incomes and farmers with low revenues for the social capital variables - ‘Social Relations with other Farmers’, ‘Social Relations with COCOBOD’ and ‘Social Relations with the Licensed Buying Companies’. Again, the results indicate that higher earning farmers had more social relations than lower earning farmers. The exceptions to this was in terms of some variables for a farmer’s social relation with COCOBOD where, in some instances there are significant results that show the poorer farmers engaging more with the regulator than the richer farmers. This could be attributed to poorer farmers being more aggressive (desperate) in courting the extension officers of COCOBOD than the richer farmers. Our earlier discussions had
alluded to the fact that richer farmers have more resources to influence these officials but the statistical results points towards poorer farmers, in the poorer regions, making more of an effort in terms of building relationships with the COCOBOD officials. This is also in line with our earlier observation that the poorer farmers tend to cultivate the relationships with the COCOBOD officials more than they engage with peer farmers as they view the relationship with these officials as more important for their businesses and livelihoods.

Overall, however, social relations in the less productive regions are better for the richer farmers than the poorer farmers similar to the results for the wealthier regions. But unlike the wealthier regions in Table 15, there are more significant results for the poorer regions. This relates to our earlier findings that because there is less focus on these poorer regions by the various stakeholders in the industry including COCOBOD and the dominant multinational firms that operate in Ghana’s cocoa sector, the income effect on social capital development is even more pronounced. This means that the poorer farmers in the poor regions are much worse off than the poorer farmers in the rich regions. In fact, a close look at the means reported in Table 15 and 16 below show that for a number of the social indicators, the poorer farmers in the wealthy regions actually performed better than the richer farmers in the poorer regions.

**Table 15: Social Relations with other Farmers, COCOBOD & LBCs (Analysis of Means—Wealthy Regions by Revenues)**

<table>
<thead>
<tr>
<th>Variables</th>
<th>Farmers with High Revenues (More than £650 annually)</th>
<th>Farmers with Mid Revenues (Between £401 and £650 annually)</th>
<th>Farmers with Low Revenues (Less than £400 annually)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean (Standard Deviation) Comparison with Mid-Revenues Comparison with Low Revenues</td>
<td>Mean (Standard Deviation) Comparison with High Revenues Comparison with Low Revenues</td>
<td>Mean (Standard Deviation) Comparison with High Revenues Comparison with Mid-Revenues</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Activity</th>
<th>Mean (SD)</th>
<th>Mean (SD)</th>
<th>Mean (SD)</th>
<th>Mean (SD)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Socialise with other farmers in the industry</td>
<td>5.60 (2.444)</td>
<td>5.05 (2.838)</td>
<td>4.80 (2.786)</td>
<td></td>
</tr>
<tr>
<td>Part of an informal network among farmers, suppliers and agents in the industry</td>
<td>5.13 (2.416)</td>
<td>4.74 (2.663)</td>
<td>4.02 (2.642)</td>
<td></td>
</tr>
<tr>
<td>Communicate with other farmers very often (i.e. at least once a fortnight)</td>
<td>6.80 (0.561)</td>
<td>6.89 (0.459)</td>
<td>6.84 (0.543)</td>
<td></td>
</tr>
<tr>
<td>Comfortable receiving advice from other farmers</td>
<td>6.67 (0.724)</td>
<td>6.89 (0.315)</td>
<td>6.84 (0.612)</td>
<td></td>
</tr>
<tr>
<td>Participate in Industry run training courses that allow social interactions to take place</td>
<td>5.60 (2.028)</td>
<td>4.53 (2.988)</td>
<td>4.55 (2.781)</td>
<td></td>
</tr>
<tr>
<td>Collaborate with other farmers in achieving business goals</td>
<td>6.07 (1.751)</td>
<td>5.37 (2.692)</td>
<td>4.75 (2.756)</td>
<td></td>
</tr>
<tr>
<td>Attendance at programmes and workshops organised by COCOBOD</td>
<td>6.53 (1.552)</td>
<td>5.79 (2.097)</td>
<td>5.45 (2.148)</td>
<td></td>
</tr>
<tr>
<td>How often do you feel a part of the decisions made by COCOBOD for farmers?</td>
<td>6.07 (1.831)</td>
<td>6.05 (1.545)</td>
<td>5.18 (2.095)</td>
<td></td>
</tr>
<tr>
<td>How often do you get in contact with an official from COCOBOD?</td>
<td>6.73 (1.033)</td>
<td>6.26 (1.522)</td>
<td>6.25 (1.481)</td>
<td></td>
</tr>
<tr>
<td>How often do you use the cocoa spraying services initiated by COCOBOD?</td>
<td>5.47 (2.416)</td>
<td>4.37 (2.891)</td>
<td>3.53 (2.452)</td>
<td></td>
</tr>
<tr>
<td>How often do you receive financial support from COCOBOD?</td>
<td>1.93 (2.120)</td>
<td>1.16 (0.688)</td>
<td>1.31 (1.288)</td>
<td></td>
</tr>
<tr>
<td>Extent of utilizing personal ties, networks, and connections with COCOBOD to access</td>
<td>4.21 (2.190)</td>
<td>4.29 (2.164)</td>
<td>3.49 (1.967)</td>
<td></td>
</tr>
<tr>
<td>funds, information, knowledge or contacts during the past three years</td>
<td>Farms with High Revenues (More than £650 annually)</td>
<td>Farms with Mid Revenues (Between £401 and £650 annually)</td>
<td>Farms with Low Revenues (Less than £400 annually)</td>
<td></td>
</tr>
<tr>
<td>--------------------------------------------------------------------------------------------------------</td>
<td>---------------------------------------------------</td>
<td>-------------------------------------------------------</td>
<td>--------------------------------------------------</td>
<td></td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Seed Capital</td>
<td>Mean 3.07 (0.29)</td>
<td>Mean 2.37 (-0.29)</td>
<td>Mean 2.51 (-0.22)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Comparison 0.22</td>
<td>Comparison -0.06</td>
<td>Comparison 0.06</td>
<td></td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Disease Prevention</td>
<td>Mean 2.40 (0.24)</td>
<td>Mean 1.89 (-0.24)</td>
<td>Mean 2.04 (-0.16)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Comparison 0.16</td>
<td>Comparison -0.08</td>
<td>Comparison 0.08</td>
<td></td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Warehousing &amp; Storage</td>
<td>Mean 2.60 (0.38)</td>
<td>Mean 1.79 (-0.38)</td>
<td>Mean 1.63 (-0.47)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Comparison 0.47</td>
<td>Comparison 0.09</td>
<td>Comparison -0.09</td>
<td></td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Payment for Goods</td>
<td>Mean 4.33 (0.06)</td>
<td>Mean 4.16 (-0.06)</td>
<td>Mean 3.76 (-0.20)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Comparison 0.20</td>
<td>Comparison 0.13</td>
<td>Comparison -0.13</td>
<td></td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Technological upgrading</td>
<td>Mean 2.40 (0.12)</td>
<td>Mean 2.16 (-0.12)</td>
<td>Mean 2.04 (-0.19)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Comparison 0.19</td>
<td>Comparison 0.07</td>
<td>Comparison -0.07</td>
<td></td>
</tr>
<tr>
<td>Extent of co-operation with Licensed Buying Companies on Generating new processes</td>
<td>Mean 3.27 (0.45)</td>
<td>Mean 2.37 (-0.45)</td>
<td>Mean 2.31 (-0.47)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Comparison 0.47</td>
<td>Comparison -0.04</td>
<td>Comparison -0.04</td>
<td></td>
</tr>
</tbody>
</table>

NOTES: Comparisons are standardised effect sizes and unstandardised effect sizes in brackets; ***Significance at the 0.01 level (two-tailed); **Significance at the 0.05 level (two-tailed); and *Significance at the 0.10 (two-tailed)
<table>
<thead>
<tr>
<th>Socialise with other farmers in the industry</th>
<th>5.10</th>
<th>-0.33</th>
<th>0.75</th>
<th>4.25</th>
<th>-0.33</th>
<th>0.39</th>
<th>3.21</th>
<th>-0.75</th>
<th>-0.39</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(2.382)</td>
<td>(0.85)</td>
<td>(1.89)***</td>
<td>(2.745)</td>
<td>(-0.85)</td>
<td>(1.04)</td>
<td>(2.636)</td>
<td>(-1.89)***</td>
<td>(-1.04)</td>
</tr>
<tr>
<td>Part of an informal network among farmers, suppliers and agents in the industry</td>
<td>4.30</td>
<td>0.22</td>
<td>0.47</td>
<td>3.69</td>
<td>-0.22</td>
<td>0.25</td>
<td>3.02</td>
<td>-0.47</td>
<td>-0.25</td>
</tr>
<tr>
<td></td>
<td>(2.812)</td>
<td>(0.61)</td>
<td>(1.28)</td>
<td>(2.774)</td>
<td>(-1.28)</td>
<td>(0.67)</td>
<td>(2.588)</td>
<td>(-1.28)</td>
<td>(-0.69)</td>
</tr>
<tr>
<td>Communicate with other farmers very often (i.e. at least once a fortnight)</td>
<td>5.85</td>
<td>-0.15</td>
<td>0.48</td>
<td>6.14</td>
<td>0.15</td>
<td>0.61</td>
<td>4.65</td>
<td>-0.48</td>
<td>-0.61</td>
</tr>
<tr>
<td></td>
<td>(2.159)</td>
<td>(-0.29)</td>
<td>(1.20)</td>
<td>(1.703)</td>
<td>(0.29)</td>
<td>(1.50)</td>
<td>(2.794)</td>
<td>(-1.20)</td>
<td>(-1.50)</td>
</tr>
<tr>
<td>Comfortable receiving advice from other farmers</td>
<td>5.85</td>
<td>-0.12</td>
<td>0.62</td>
<td>6.07</td>
<td>0.12</td>
<td>0.74</td>
<td>4.42</td>
<td>-0.62</td>
<td>-0.74</td>
</tr>
<tr>
<td></td>
<td>(1.899)</td>
<td>(-0.22)</td>
<td>(1.43)*</td>
<td>(1.685)</td>
<td>(0.22)</td>
<td>(1.65)*</td>
<td>(2.650)</td>
<td>(-1.43)*</td>
<td>(-1.65)*</td>
</tr>
<tr>
<td>Participate in Industry run training courses that allow social interactions to take place</td>
<td>4.05</td>
<td>0.28</td>
<td>0.42</td>
<td>3.21</td>
<td>-0.28</td>
<td>0.13</td>
<td>2.85</td>
<td>-0.42</td>
<td>-0.13</td>
</tr>
<tr>
<td></td>
<td>(3.034)</td>
<td>(0.84)</td>
<td>(1.20)</td>
<td>(2.940)</td>
<td>(-0.84)</td>
<td>(0.37)</td>
<td>(2.728)</td>
<td>(-1.20)</td>
<td>(-0.37)</td>
</tr>
<tr>
<td>Collaborate with other farmers in achieving business goals</td>
<td>5.55</td>
<td>0.49</td>
<td>0.26</td>
<td>4.31</td>
<td>-0.49</td>
<td>-0.22</td>
<td>4.90</td>
<td>-0.26</td>
<td>0.22</td>
</tr>
<tr>
<td></td>
<td>(2.282)</td>
<td>(1.24)</td>
<td>(0.65)</td>
<td>(2.774)</td>
<td>(-0.65)</td>
<td>(-0.59)</td>
<td>(2.670)</td>
<td>(-0.65)</td>
<td>(0.59)</td>
</tr>
<tr>
<td>Attendance at programmes and workshops organised by COCOBOD</td>
<td>4.25</td>
<td>-0.36</td>
<td>-0.32</td>
<td>5.25</td>
<td>0.36</td>
<td>0.05</td>
<td>5.12</td>
<td>-0.32</td>
<td>-0.05</td>
</tr>
<tr>
<td></td>
<td>(2.900)</td>
<td>(-1.00)</td>
<td>(-0.87)</td>
<td>(2.720)</td>
<td>(1.00)</td>
<td>(0.13)</td>
<td>(2.438)</td>
<td>(0.87)</td>
<td>(-0.13)</td>
</tr>
<tr>
<td>How often do you feel a part of the decisions made by COCOBOD for farmers?</td>
<td>2.45</td>
<td>-0.28</td>
<td>-0.37</td>
<td>3.13</td>
<td>0.28</td>
<td>-0.08</td>
<td>3.32</td>
<td>0.37</td>
<td>0.08</td>
</tr>
<tr>
<td></td>
<td>(2.305)</td>
<td>(-0.68)</td>
<td>(-0.87)</td>
<td>(2.527)</td>
<td>(0.68)</td>
<td>(-0.19)</td>
<td>(2.396)</td>
<td>(0.87)</td>
<td>(0.19)</td>
</tr>
<tr>
<td>How often do you get in contact with an official from COCOBOD?</td>
<td>3.80</td>
<td>-0.36</td>
<td>-0.56</td>
<td>4.81</td>
<td>0.36</td>
<td>-0.20</td>
<td>5.32</td>
<td>0.56</td>
<td>0.20</td>
</tr>
<tr>
<td></td>
<td>(2.984)</td>
<td>(-1.01)</td>
<td>(-1.52)**</td>
<td>(2.689)</td>
<td>(1.01)</td>
<td>(-0.50)</td>
<td>(2.441)</td>
<td>(1.52)**</td>
<td>(0.50)</td>
</tr>
<tr>
<td>How often do you use the cocoa spraying services initiated by COCOBOD?</td>
<td>3.10</td>
<td>-0.09</td>
<td>-0.21</td>
<td>3.31</td>
<td>0.09</td>
<td>-0.12</td>
<td>3.57</td>
<td>0.21</td>
<td>0.12</td>
</tr>
<tr>
<td></td>
<td>(2.382)</td>
<td>(-0.21)</td>
<td>(-0.47)</td>
<td>(2.301)</td>
<td>(0.21)</td>
<td>(-0.26)</td>
<td>(2.170)</td>
<td>(0.47)</td>
<td>(0.26)</td>
</tr>
<tr>
<td>How often do you receive financial support from COCOBOD?</td>
<td>1.00</td>
<td>-</td>
<td>-</td>
<td>1.00</td>
<td>-</td>
<td>-</td>
<td>1.00</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td></td>
<td>(0.000)</td>
<td>(0.000)</td>
<td>(0.000)</td>
<td>(0.000)</td>
<td>(0.000)</td>
<td>(0.000)</td>
<td>(0.000)</td>
<td>(0.000)</td>
<td>(0.000)</td>
</tr>
<tr>
<td>Extent of utilizing personal ties, networks, and connections with COCOBOD to access</td>
<td>2.47</td>
<td>-0.73</td>
<td>-0.74</td>
<td>4.13</td>
<td>0.73</td>
<td>0.06</td>
<td>4.00</td>
<td>0.74</td>
<td>-0.06</td>
</tr>
<tr>
<td></td>
<td>(2.154)</td>
<td>(-1.65)*</td>
<td>(-1.53)**</td>
<td>(2.363)</td>
<td>(1.65)*</td>
<td>(0.13)</td>
<td>(2.000)</td>
<td>(1.53)**</td>
<td>(-0.13)</td>
</tr>
</tbody>
</table>
In summary, it was evident from the results that farmers in the high production regions were far more engaged socially within the industry than those in the lower production regions. This was also the case for farmers with higher incomes as compared to those with lower incomes (apart from the unique case for the social relations farmers have with COCOBOD officials in the poorer regions). T-test for the equality of means is statistically significant for most of the results between the regions indicating that there are differences between the means. This also means that for almost

<table>
<thead>
<tr>
<th>funds, information, knowledge or contacts during the past three years</th>
<th>Extent of co-operation with Licensed Buying Companies on Seed Capital</th>
<th>Extent of co-operation with Licensed Buying Companies on Disease Prevention</th>
<th>Extent of co-operation with Licensed Buying Companies on Warehousing &amp; Storage</th>
<th>Extent of co-operation with Licensed Buying Companies on Payment for Goods</th>
<th>Extent of co-operation with Licensed Buying Companies on Technological upgrading</th>
<th>Extent of co-operation with Licensed Buying Companies on Generating new processes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2.80</td>
<td>0.27</td>
<td>0.53</td>
<td>2.13</td>
<td>-0.27</td>
<td>0.29</td>
</tr>
<tr>
<td></td>
<td>(2.821)</td>
<td>(0.68)</td>
<td>(1.21)**</td>
<td>(2.156)</td>
<td>(-0.68)</td>
<td>(0.53)</td>
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<tr>
<td></td>
<td>3.00</td>
<td>0.52</td>
<td>0.54</td>
<td>1.75</td>
<td>-0.52</td>
<td>-0.01</td>
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<tr>
<td></td>
<td>(2.714)</td>
<td>(1.25)</td>
<td>(1.24)**</td>
<td>(2.049)</td>
<td>(-1.24)**</td>
<td>(-0.12)</td>
</tr>
<tr>
<td></td>
<td>1.60</td>
<td>0.13</td>
<td>0.28</td>
<td>1.38</td>
<td>-0.13</td>
<td>0.16</td>
</tr>
<tr>
<td></td>
<td>(1.847)</td>
<td>(0.23)</td>
<td>(0.42)</td>
<td>(1.500)</td>
<td>(-0.23)</td>
<td>(0.20)</td>
</tr>
<tr>
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<td>2.95</td>
<td>-0.07</td>
<td>0.26</td>
<td>3.13</td>
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<td>(2.395)</td>
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<td>(2.872)</td>
<td>(0.18)</td>
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<tr>
<td></td>
<td>1.35</td>
<td>0.42</td>
<td>0.39</td>
<td>1.00</td>
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<tr>
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<td>(1.182)</td>
<td>(0.35)*</td>
<td>(0.33)**</td>
<td>(0.000)</td>
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<td>-0.17</td>
<td>1.19</td>
<td>0.15</td>
<td>-0.04</td>
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<tr>
<td></td>
<td>(0.447)</td>
<td>(-0.09)</td>
<td>(-0.13)</td>
<td>(0.750)</td>
<td>(0.09)</td>
<td>(-0.04)</td>
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</tbody>
</table>

NOTES: Comparisons are standardised effect sizes and unstandardised effect sizes in brackets; ***Significance at the 0.01 level (two-tailed); **Significance at the 0.05 level (two-tailed); and *Significance at the 0.10 (two-tailed)
all the social capital variables employed, farmers with higher incomes and farmers in more productive regions engaged in more social activities than farmers with lower incomes and farmers in less productive regions respectively.

The most intense social relations within the industry were the peer-to-peer relationships among the farmers, followed by the farmers’ relationships with COCOBOD officials; while social relationships between the farmers and the Licensed Buying Companies were significantly low.

Farmers communicated with other farmers very often and were comfortable receiving advice from other farmers. They also ranked very highly their contacts with COCOBOD officials and attendance at programmes and workshops organised by COCOBOD. There was, however, very little cooperation between the farmers and the Licensed Buying Companies, especially in terms of warehousing, technological upgrades and in generating new processes and innovations (albeit the farmers with more wealth also had significantly better relations with their LBCs than farmers in poorer states). This lack of interactions with the LBCs has already been alluded to in the earlier segment reporting on the qualitative observations from the survey.

The differences in the means between the two sets of groups (both by regions and revenues) are also significant enough to suggest an important role for social capital in impacting on the welfare of farmers in Ghana’s cocoa industry. This is in line with our review of the literature that has suggested empirically that social capital is an important tool in improving the welfare of the poorest people (See Grootaert, 1999, Feuer, 2004, Martin et. al., 2004, Johannes, 2009, Brabec et. al., 2007, and Narayan and Pritchett, 1999).

The important role that the transactions-based social relations between farmers and their buyers play in the welfare and income levels of farmers was also discussed. This follows from the
literature that has argued that while social capital broadly impacts on wealth and incomes it is the so called ‘weak ties’ and transactional social capital that are the major differential between the rich and the poor, and are most important in improving the livelihoods of the very poor, such as farmers in Ghana’s cocoa sector (See Hermann & Kopasz, 2011, Wiig, 2003, Feuer, 2004, Woolcock, 2001, Granovetter, 1973, Knudsen & Rousseau, 2005, Putnam, 2002, Briggs, 2003).

6.6 Conclusion

This chapter explores the concept that rich participants within an industry are likely to have better social capital than poorer participants in the context of Ghana’s cocoa industry. The results of the study indicate that high earning farmers and farmers in the more productive cocoa-growing regions have more social capital than poorer farmers and farmers in the less productive regions respectively. These better relations cuts across all three main relations a farmer has in the industry; relations with other farmers, relations with officials of the industry regulator and relations with the Licensed Buying Companies.

The finding also highlights the importance of social capital for the welfare of the farmer and is in line with various literature that has identified a causal relationship between the social capital of a participant and his income levels. The transactional relations between the farmers and the Licensed Buying Companies were also noted as important for a farmer’s welfare and follow the literature which emphasises the importance of ‘weak’ transactional ties for incomes of the poorest.

These present a challenge to policy makers seeking to alleviate poverty in poor communities to focus on improving the social relations of the poor, and probably more importantly on those social ties embedded in market and transactional relations as these are more likely to help individuals
significantly improve on their income levels. Farmers in Ghana’s cocoa sector, for example, should be assisted to develop their relationships with the Licensed Buying Companies in relation to issues such as informal credit arrangements, warehousing and storage, and technology transfer. The well established and ‘stronger’ relationships among the farmers and between the farmers and COCOBOD officials should also be harnessed to facilitate transaction based relations such as joint ventures among the farmers to improve yields and create synergy, and the commercial provision of the farming inputs by COCOBOD to help farmers get access to such services and resources whenever they need them.

Finally, the conclusions of this chapter raises questions about the role of social capital as a sufficient condition in mitigating the negative consequences of the ‘strategic failure’ in Ghana’s cocoa industry, in the light of the finding that there are inequalities in the social capital accessed by the rich farmers and the poor farmers. Social capital’s impact on ‘good’ governance in the industry, as advocated in Chapter 5, may therefore not be a holistic solution to the problems of hierarchical governance because there is a tendency for the benefits of social engagements to be skewed toward the rich as against the poorer farmers. The next chapter draws on these conclusions to better understand the reasons why some participants within the industry (in this case richer farmers and regions) are more engaged as compared to the poorer farmers and regions. It seeks to discuss the motivations of individual farmers in building their social capital through both the literature and empirical evidence from Ghana’s cocoa sector.
Chapter 7 – Participation in Ghana’s Cocoa Cottages

7.1 Introduction

The role of participation in social capital formation, and their subsequent impact on issues such as good governance and hence improvement in livelihoods of industry participants, is well noted in the literature as reviewed in Chapter 2 of this thesis (See also Pretty, 1995, Wu & Pretty, 2004). The importance of such social interactions in the governance of Ghana’s cocoa industry in particular is also highlighted in the findings of Chapters 5 and 6 above. For instance, the findings from Chapter 5 were that social capital variables in Ghana’s cocoa industry – that is the social relations among the farmers, farmers utilising ties with the regulator’s (COCOBOD) officials, and shared values among the farmers – were all positively and significantly associated with higher perceptions of good governance among Ghanaian cocoa farmers. Furthermore, ‘Participation in activities of the industry’ by farmers was the most positively related variable to better perceptions of the governance of the industry.

These results mean that where Ghanaian cocoa farmers were more actively engaged in the industry’s social networks and events, they were more likely to perceive that their interests are being considered at a higher level, and thus they hold a better overall view of the governance process. In this regard, these more engaged farmers may also have a greater influence over COCOBOD’s strategic decisions and resource allocations.

The findings in Chapter 5 then further suggest that these positive social engagements and the governance process appear to work better in the more productive cocoa growing regions (Western and Ashanti), than in the smaller growing regions (Volta, Eastern, Central and Brong Ahafo). Again, a significant number of the poorer farmers surveyed appeared to be disengaged from the
industry as compared to the more prosperous farmers. This was the issue addressed in detail in Chapter 6 of the thesis and it was evident from the results that, in confirmation of the initial suggestions from Chapter 5 findings; farmers in the high production regions were far more socially engaged within the industry than those in the lower production regions. This was also the case for farmers with higher incomes as compared to those with lower incomes.

These conclusions, that suggest that there are inequalities in the participation of the rich farmers as against the poorer farmers, and also between the rich regions and poor regions, raise questions about the opportunities that exist for social interactions in some of the poorer cocoa communities in Ghana. Indeed, these findings could indicate that the ‘good’ governance of the industry that we have earlier alluded to in Chapter 5 may not be uniform across all the different regions and for different types of farmer. This, as noted in Chapter 6, would have consequences for the welfare of such poorer farmers and those in particular regions who, by being disengaged from the industry, are unlikely to be shielded from the impact of strategic decision making within the industry or be involved in the governance processes. This fault is even more pronounced since the effect of ‘strategic failure’ (See Chapter 2) is felt most by the poorest participants within an industry. Therefore the positive results for governance in Ghana’s cocoa industry as shown in Chapter 5 can be severely undermined if the very poorest farmers continue to be excluded from participating in the industry’s activities (See Chapter 6 above, Branston et. al, 2006a).

These issues therefore raise an important question which this chapter seeks to address – and that is why some of the farmers would choose to participate in the industry, particularly through the local associations that are formed in the cottages, and why others choose not to actively engage in such social organisations within the industry. In this regard, the literature has advocated various factors that impact participation in industry associations including the role of social relations (Lake

This chapter therefore analyses the various motivations for participation or non-participation of Ghana’s cocoa farmers from the survey and observations of farmers’ participation in Ghana’s six cocoa growing regions. It will seek to empirically test the impacts of these theorised motivations on the participation of Ghana’s cocoa farmers in their local industry associations by making use of original survey questionnaire data from 257 farmers in all the six cocoa growing regions of Ghana.

The rest of the chapter is therefore set out as follows: Section two of this chapter focuses on insights from the survey of Ghana’s cocoa sector and based on these and the review of literature on motivations for participation (in Chapter 2) sets the hypotheses to be tested. The third section discusses the statistical analysis and results, and the last section is the conclusion of the chapter.

7.2 Farmers’ Participation in Ghana’s Cocoa Cottages

There are different types of associations that exist in most farming cottages in Ghana’s cocoa sector as discussed in Chapter 4 above. The five identified types are Farmers’ cooperative marketing organisations, Cocoa farmer marketing societies, Farmers marketing input companies, Coca
farmers’ production associations, and Farmers’ assistance societies (Baah, 2008). There are also some Buying Companies which are organised as cooperatives of farmers.

The survey conducted for this thesis noted however, that the most active of the associations were the local level cottage associations that were formed in 2010 and are run by the Extension Officers of COCOBOD, in the various cocoa communities.

The Extension Officer for a cocoa cottage forms and organise the associations and meets with the farmers at least once a week. These are regular meetings which have a fixed date and time that all the farmers are aware of and once the ‘village announcer’ beats the drum or goes around to inform farmers of the meeting, the farmers begin to gather. Even when the extension officer has to call an emergency association meeting (as we had to a number of times to conduct the surveys), the use of an announcer was effective enough to bring the farmers together within a few minutes. Though the local associations appoint an executive board from among the farmers including a chairman and secretary, it was observed that the Extension Officers were effectively the heads of the associations. Meetings were organised under the direction and leadership of these COCOBOD officers, and there were instances observed where the officers handpicked the executives rather than through a democratic process of election.

In terms of farmers’ motivations for attending the meetings of the associations, it was observed that most of these farmers arrive for the meetings in pairs or groups emphasising the point made in the literature that such closer social relations was important in promoting participation among the players in an industry (See Lake & Huckfeldt, 1998, Krishna, 2006, Putnam, 1993a, Coleman, 1987, 1988, Tomlinson, 2012). In that same regard, the farmers who clearly had good relations with other farmers and also the extension officers of COCOBOD were seen to be more active in
their associations and took up positions within the organisation. Therefore most of the executives of the cottage associations we visited were easily the most connected and engaged farmers. They were trusted by the other farmers and in most instances were very close to the extension officers (even to the extent of privately loaning out monies to these extension officers as we noted in one instance).

Despite the general enthusiasm of farmers in participating in their local associations, the author and field assistants observed some differences between the much more productive cocoa regions – Ashanti and Western regions and the other regions. For example, the most participative farmers we met who were self-mobilised and engaged in the industry were in Antobrakrom in the Ashanti region while the most disengaged group of farmers was in Aprade in the Eastern region. The differences between the regions we observed was mainly due to the unequal attention and degree of autonomy given to the more productive regions by the COCOBOD officials and other stakeholders in the industry. For instance, not only is Antobrakrom part of a well-structured and resourced regional division in the Ashanti Region, but also its local association was also supported by the Cadbury Cocoa Partnership34, an initiative of the biggest cocoa multinational operating in Ghana, which seeks to encourage stakeholder involvement among the farmers. Such investments in the social organisational structures at the local level results in increased participation as farmers reaped more benefits by engaging in the associations activities and were therefore more likely to attend the local meetings and join in into other industry activities. This was not the case in Aprade

34 The Cadbury Cocoa Partnership started in 2008 in Ghana with the aim of encouraging thriving cocoa communities that will ensure a sustainable cocoa supply chain. The partnership works towards sustainability of cocoa production by focusing on the empowerment of cocoa farmers in rural communities. The cocoa partnership includes Mondelez International (now parent company of Cadbury), Ghana Cocoa Board (COCOBOD), United Nations Development Programme (UNDP), World Vision, Care International, VSO, Kuapa Kokoo, the Ghanaian Ministry of Employment and Social Welfare and smallholder farmer groups
in the Eastern region as there were no such initiatives and the region’s lower importance in terms of productive capacity is reflected in weaker regional structures.

The farmers we interacted with were also more likely to view the associations as an opportunity to meet with the extension officers of COCOBOD and thereby influence the distribution of the scarce resource provided by the regulator in their favour. Different associations sometimes go out of their way to compete for attention by giving favours to officers who usually tend to come from the capital city, Accra, and therefore need all the help they can to survive in the farming hinterlands they have to work in. Therefore even though these farmers were interested in the openness of their associations, they were also very interested in courting the favour of the COCOBOD officials. This is probably in line with the need for the ‘logic of influence’ as well as a ‘logic of membership’ in encouraging participation as discussed in the literature in Chapter 2 above.

In general, there was a lot of commitment to these local associations by the farmers with good attendance at meetings of associations we visited as part of the interviews. The associations are however, confined to just the cottage-level and there is very little social organisation at the regional level, let alone the national level; with these supra-cottage associations existing only in name. Farmers’ participation in the industry is therefore effectively limited to attending the meetings of the local associations. Farmers are motivated to participate in the industry associations by the close ties they have with each other and with the extension officers. Regions with more decentralised and better social structures were also noted to have more participation by the farmers in the meetings at the cottage level. The need to influence the decisions of the COCOBOD officials was clearly an important reason farmers sometimes abandon their farm activities, at a moment’s notice, to gather for their meetings.
These observations, and the literature review in Chapter 2, on social relations, decentralisation, and the mindsets of ‘membership’ and ‘influence’ now set the scene to hypothesise on the motivations for the participation of cocoa farmers in Ghana’s cocoa industry at the local level associations.

Hence the following hypotheses;

H1: **Stronger social relations are associated with higher levels of participation**

H2: **There is a positive association between farmer participation (in local COCOBOD activities) and the level of resources a region receives from COCOBOD.**

H3: **The logic of membership and the logic of influence impact on a farmer’s decision to participate in the activities of the local cocoa associations.**

Based on these hypotheses, the chapter now goes on to explore these motivations for participation using survey data of 257 farmers in Ghana’s cocoa industry. The next segment of the chapter continues with the statistical analysis, findings, and conclusions.

**7.3 Econometric Specification & Variable Construction**

**7.3.1 Model Specification**

The empirical analysis is based on questionnaire data from 300 cocoa farmers in 12 cocoa cottages in all the 6 cocoa growing regions of Ghana. Further details on the survey methodology employed is in Chapter 3 of the thesis.

This chapter makes use of an Ordinary Least Squares (OLS) multiple regression model to analyse the data. The use of OLS rather than an ordered probit method (as in this case where the variables
are categorical) presents results that are more interpretable. As noted in Winship and Mare (1985) quoting Allan (1976), Borgatta (1968), Kim (1975, 1978), Labovitz (1967, 1970), and O’Brien (1979a), multivariate methods for interval-level variables could be used for ordinal variables because the power and flexibility gained from these methods outweigh the small biases that they may entail. Furthermore, the ordered probit model results for the data is included in the Appendix of the thesis and show results that are similar quantitatively to the results produced from the OLS analysis35.

The analysis uses a three stage approach in testing its hypothesis. The first stage regresses the control variables on the dependent variable, including a dummy for more productive regions. The second stage introduces the social capital predictor variables, namely utilising ties with officials, shared values, and trust relations. Stage three regresses the logics of ‘membership’ and ‘influence’ on the dependent variable after taking out the social capital variables from the equation. The separate analysis is due to the issues of multicollinearity36 that arise because the ‘logics’ are strongly correlated with the social capital variables (See Table 17 below). This had the effect of making the regression coefficients insignificant and even changing the impacts of some of the independent variables on the dependent variable. In such instances, dropping some of the predictor variables or measuring some of the coefficient variables in a separate model (as will be applied in

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35 Additional robustness checks were conducted for endogeneity. Following Woolridge (2010) and Antonakis et.al (2010), the independent variables were found to be uncorrelated with the error terms of the models, which places confidence in the direction of causality.

36 Typical signs of multicollinearity in a regression analysis include large standard errors on the regression coefficient, so that estimates of the true model parameters become unstable and low t-values prevail; conflicting conclusions will be reached from the usual tests of significance (such as the wrong sign for a parameter), extreme correlations between pairs of variables; and a good fit not providing good forecasts (See Belsley et.al., 1980). These were evident in the regression model when it included the ‘logics’ variables with the social capital variables.
this analysis) is advocated in the literature (See Chang & Mastrangelo, 2011, Dormann et. al., 2013).

Theoretically also, the separate models enables us to analyse participation as a function of social capital variables as against the role the ‘logics’ play in improving participation (i.e. the ‘actions’ versus the ‘thinking’ of the farmers). Furthermore, the aim of this analysis is not simply to build the predictive model for ‘participation’ but rather to identify the impacts of individual variables on participation in Ghana’s cocoa industry.

Hence, this chapter set up two models as follows;

\[
\text{Participation} = \beta_0 + \beta_1 \text{Ownership} + \beta_2 \text{Regional Dummy} + \beta_3 \text{Bags of Cocoa Harvested} + \beta_4 \text{Utilising Ties with COCOBOD} + \beta_5 \text{Shared Values} + \beta_6 \text{Trust Relations} + \epsilon
\]

Participation = \beta_0 + \beta_1 \text{Ownership} + \beta_2 \text{Regional Dummy} + \beta_3 \text{Bags of Cocoa Harvested} + \beta_4 \text{Logic of Membership} + \beta_5 \text{Logic of Influence} + \epsilon

Table 17: Variables & Question Items Used for Regression

<table>
<thead>
<tr>
<th>Variables</th>
<th>Questions used in constructing variables</th>
<th>Cronbach’s Alpha Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Participation in Associations Activities</td>
<td>How frequently do farmers participate in meetings, associations, and networks of cocoa farmers at the local level?</td>
<td></td>
</tr>
</tbody>
</table>
| Trust Relations              | a) I socialise with other farmers in the industry  
b) There is an informal network among farmers, suppliers and agents in the industry | .838                   |
| Logic of Membership | a) Overall, our cocoa farmers associations are responsive and representative of all farmers | .934 |
|                     | b) In general, forums organised by the associations encourage open dialogue and exchange of views about industry issues |   |
|                     | c) Our associations are accountable to their members. |   |
|                     | d) Our associations are very open and allow anybody to join |   |

| Logic of Influence   | a) The services provided by our associations are important for my business | .695 |
|                      | b) Our associations are a strong lobbying group for our industry |   |
|                      | c) Our associations aid and promote the development of our industry |   |

| Shared Values        | a) You share the same ambitions and vision as other farmers in the industry | .898 |
b) You consider that your business’ future is related to that of other farmers in the industry

c) There is some kind of shared strategy or plan for cocoa farmers in Ghana

d) You pursue the shared goals and strategy of your industry

<table>
<thead>
<tr>
<th><strong>Utilising Ties with COCOBOD</strong></th>
<th>Extent you have utilized personal ties, networks, and connections to access funds, information, knowledge or contacts during the past three years</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Productive Regions Dummy</strong></td>
<td>Productive Regions Dummy (Ashanti &amp; Western=1, Volta, Central, Eastern &amp; Brong Ahafo=0)</td>
</tr>
</tbody>
</table>
| **Control variables**           | d) Ownership (Yes=1, No=0)  
e) Bags of Cocoa Harvested Last Year |

A summary of the variables (and their construction) is provided in Table 17 above, with some further discussion in the next segment. For the four construct variables, appropriate scale items (from the survey) are combined into a single index through a factor analysis using Principal Component Analysis (PCA) as the method of extraction. For each construct, factor scores were calculated in SPSS, each with a standardised mean of 0 and a standard deviation of 1, and these were used in the econometric analysis (see Grice, 2001)).
7.3.2 Construction of Variables

Dependent Variable: Participation

The farmers were asked to indicate the extent to which they participated in the activities of the cottage-level associations. These views ranged from ‘Strongly Agree’ to ‘Strongly Disagree’ on a 7-Point Likert scale. The use of a broad range of varying levels of participatory behaviour (similar to Pretty’s (1995) typology of participation above) for the statistical analysis rather than a simple differentiation of participation versus no participation allows for more elaborate analysis. It provides an enriched data set to derive more empirical conclusions on the motivations for participation among farmers in Ghana’s cocoa industry.

Independent Variables

1. Utilising Ties with COCOBOD

This is a binary variable (1/0) and indicates whether farmers had (over the previous 3 years) exploited any personal ties with COCOBOD officials to gain access to new funds, information, or new networks to benefit their business. It is anticipated that where farmers have developed close (personal) relations with COCOBOD and utilised them in this way, they are more likely to be also active in the local associations.

2. Shared Values

This variable measures the extent to which farmers believe that there is a shared goal and objective among the farmers in his or her cottage. This is measured using a series of question items derived from Tomlinson (2012) and based on Tsai and Ghosal (1998) on the cognitive and relational dimensions of ‘shared values’ (as discussed in Chapters 2 and 5 above). The inclusion of this variable in the regression model for motivations for participation is based on the view highlighted
in the literature that a perception by industry players in a shared or collective goal for the industry is likely to result in greater participation (Tomlinson, 2012).

3. Trust Relations

This construct captures the degree of trust among local cocoa farmers. It is based upon items drawn from Tsai and Ghosal’s (1998) work on social capital and also Molina-Morales and Martinez-Fernandez (2006), who employed a similar construct in their study of Valencian industrial districts. A positive correlation with participation at the local level of the industry is expected.

4. Logic of Membership

This measures a farmer’s perspective on the ‘inclusiveness’ of the cottage’s association. The construct is adapted for the research from Tomlinson (2012) and uses items that ask for the individual’s views on the accountability, accessibility, responsiveness and openness in the associations. These are items used by Tomlinson (2012) and further derived from Jessop (1998), Sacchetti and Sugden (2003, 2009) and Donor and Schneider (2000). Farmers with a mindset of such inclusiveness within the associations are likely to participate in these institutions.

5. Logic of Influence

This construct variable aims to capture a farmer’s perception of the cottage associations’ ability to influence, represent and successfully develop the industry and promote the interest of farmers (Tomlinson, 2012). It also measures the effectiveness of representation and lobbying with the industry regulator on the behalf of farmers by the association’s executives. It is expected that farmers with a ‘logic of influence’ will be more participative than farmers with a logic of membership.
6. Regional Dummy

The regional dummy\textsuperscript{37} captures the difference between two sets of regions; the more productive regions (Ashanti & Western regions, See Chapter 4) where from the field study and also the results of statistical analysis in Chapter 5 & 6 there are more well established and effective associations, as against the less productive regions with less well established cottage associations – Eastern, Central, Brong Ahafo and Volta Regions (see Chapter 6). The value of 1 for the regional dummy therefore represents the impact of the more productive regions as against the less productive regions and it is expected that the productive regions will be more participative.

7. Control Variables

These are to control for a farmer’s wealth status (in bags of cocoa harvested which determines a Ghanaian cocoa farmer’s income annually) and ownership of his farm. In terms of ownership, it is reasonable to think that farmers who own their farms are more likely to have the time and freedom to participate in the local associations activities than farmers who work for others. It is also noted in sections of the literature that individual-level factors such as wealth and status are important determinants of an industry player’s ability to participate (See Bennett and Bennett, 1986, Rosenstone and Hansen, 1993).

\textsuperscript{37} The use of a regional dummy that differentiates between two sets of regions (more productive versus less productive) rather the individual regions’ dummies that was applied in Chapter 5 is to address the errors that arose in this chapter’s regression models when the former dummies were used. Furthermore, the distinction between the two sets of regions in terms of production, decentralization and social engagement have already been well established in preceding chapters and therefore these analyses are in furtherance of issues of uneven governance in Ghana’s cocoa industry that have been addressed in the earlier chapters.
7.3.3 Descriptive Statistics

Table 18 details some descriptive statistics for the variables used in the construction of the models and the correlations between the variables.

Table 18: Bivariate correlations (to two decimal places)

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>SD</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
</tr>
</thead>
<tbody>
<tr>
<td>Participation</td>
<td>6.27</td>
<td>1.69</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ownership</td>
<td>0.81</td>
<td>0.39</td>
<td>0.29***</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Bags of Cocoa Harvested</td>
<td>7.64</td>
<td>14.90</td>
<td>-0.04</td>
<td>0.08</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Utilising Ties with COCOBOD</td>
<td>4.00</td>
<td>2.17</td>
<td>0.27***</td>
<td>0.20***</td>
<td>-0.02</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Shared Values</td>
<td>5.41</td>
<td>2.09</td>
<td>0.12*</td>
<td>0.04</td>
<td>-0.05</td>
<td>-0.05</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Trust Relations</td>
<td>4.75</td>
<td>1.93</td>
<td>0.38***</td>
<td>0.04</td>
<td>0.11*</td>
<td>0.26***</td>
<td>0.09</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Logic of Membership</td>
<td>6.37</td>
<td>1.57</td>
<td>0.77***</td>
<td>0.25***</td>
<td>-0.09</td>
<td>0.34***</td>
<td>0.35***</td>
<td>0.52***</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>Logic of Influence</td>
<td>5.37</td>
<td>1.67</td>
<td>0.77***</td>
<td>0.30***</td>
<td>-0.08</td>
<td>0.28***</td>
<td>0.25***</td>
<td>0.59***</td>
<td>0.89***</td>
<td>1</td>
</tr>
</tbody>
</table>

NOTES: α = Cronbach’s alpha for all multiple-item variables
n.a., Not Available; SD, standard deviation; VIF, variance inflation factor
***Pearson’s correlation is significant at the 0.01 level (two-tailed); **Pearson’s correlation is significant at the 0.05 level (two-tailed); and *Pearson’s correlation is significant at the 0.10 (two-tailed)

7.4 Results & Discussions

7.4.1 Descriptive Analysis

There were significant correlations among the predictor variables; utilising ties with COCOBOD, shared values, trust relations, logic of membership and logic of influence as shown in Table 18
covering the descriptive statistics. All the variables also had significant correlations with the dependent variable, Participation, apart from the measure for the wealth of the farmer which result is insignificant. The Cronbach Alpha scores for the relevant scales were greater or equal to the required level of 0.70. The use of Cronbach Alpha scores for testing the reliability and internal consistency of constructs is well noted in the statistical literature (see Christmann & Aelst, 2006).

The mean score for participation was very high, indicative of the point made earlier that the farmers showed commitment to these local level associations.

7.4.2 Regression Results

The analysis used a five stage model (See Table 19). The dependent variable, Participation, was first regressed on the control variables and regional dummy. The social capital predictor variables were then added, and finally the ‘logics’ variable were added after taking out the social capital variables.

Table 19: Dependent Variable – Participation in Associations Activities

<table>
<thead>
<tr>
<th>Variable</th>
<th>(1)</th>
<th>(2)</th>
<th>(3)</th>
<th>(4)</th>
<th>(5)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Constant</td>
<td>5.198</td>
<td>4.589</td>
<td>4.588</td>
<td>4.884</td>
<td>5.872</td>
</tr>
<tr>
<td>Ownership</td>
<td>1.100</td>
<td>0.856</td>
<td>0.833</td>
<td>0.990</td>
<td>0.275</td>
</tr>
<tr>
<td>Productive Regions</td>
<td>0.692</td>
<td>0.797</td>
<td>0.780</td>
<td>0.400</td>
<td>0.276</td>
</tr>
<tr>
<td>Bags of Cocoa Harvested</td>
<td>-0.008</td>
<td>-0.008</td>
<td>-0.007</td>
<td>-0.010</td>
<td>0.002</td>
</tr>
<tr>
<td></td>
<td>(0.008)</td>
<td>(0.008)</td>
<td>(0.008)</td>
<td>(0.008)</td>
<td>(0.005)</td>
</tr>
<tr>
<td>--------------------------------</td>
<td>---------</td>
<td>---------</td>
<td>---------</td>
<td>---------</td>
<td>---------</td>
</tr>
<tr>
<td><strong>Utilising Ties with COCOBOD</strong></td>
<td>0.191</td>
<td>0.196</td>
<td>0.124</td>
<td>(0.055)***</td>
<td>(0.055)***</td>
</tr>
<tr>
<td><strong>Shared Values</strong></td>
<td></td>
<td>0.187</td>
<td>0.140</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>(0.117)</td>
<td>(0.113)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Trust Relations</strong></td>
<td></td>
<td></td>
<td>1.502</td>
<td></td>
<td>(0.127)***</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>(0.127)***</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Logics</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Membership</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Influence</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Adjusted R Squared</td>
<td>0.11</td>
<td>0.16</td>
<td>0.17</td>
<td>0.24</td>
<td>0.63</td>
</tr>
<tr>
<td><strong>F-Statistic</strong></td>
<td>8.27***</td>
<td>9.58***</td>
<td>8.24***</td>
<td>10.07***</td>
<td>60.47***</td>
</tr>
</tbody>
</table>

Stage 1 in Table 19 shows the results for the control variables and the regional dummy. Bags of cocoa harvested, representative of the wealth of the farmers, does not show any significant relationship with participation. However, ownership of farms, which in Ghana’s cocoa industry is another indicator of the status of a farmer shows positive and significant results for participation. This points to the fact earlier alluded to that farmers who have more control over their time are also more likely to engage in the industry associations.
The dummy for the better resourced regions reported high positive and significant coefficients for almost all the stages of the model indicative of the assertion of this chapter (as well as earlier chapters) that better resourced and therefore better governed regions such as the Western and Ashanti regions of Ghana’s cocoa sector are more participative as they have better social structures. The important role of resourced decentralization in determining participants as can be inferred from the findings in Table 19 also reiterates the point made in Chapter 6 of the thesis that the poorer cocoa regions of Ghana are lacking in terms of their farmers’ organisations at the local level and this is mainly due to some form of neglect by the hierarchy of COCOBOD in favour of the richer cocoa regions (See Dormon et.al., 2004).

Stage 5 shows the addition of all the social capital predictor variables to the equation. Here, Utilizing Ties with COCOBOD and Trust have positive and significant relationships with Participation. This is in line with the literature, and hypothesis one, as discussed in the above segments (also see Tomlinson, 2012) that prescribes a very important role for social capital elements in engendering participation in industrial association. Therefore the farmers that use their relationships with the officials of the regulator to their advantage and have built trust with other farmers are likely to be more participative than farmers that have less social relations within the industry. Results for ‘Shared Values’ is positive but not significant for the OLS model (However, the ordered probit results at the end of the chapter show positive, significant results which is indicative of a relation also existing between the social capital variable of shared values and participation).

The sixth stage now regresses the ‘logic of influence’ and ‘logic of membership’ on participation after taking out the social capital variables to avoid multicollinearity problems. As emphasised in Tomlinson (2012), participation is likely to be driven both by a perception of how much impact
one can have on the industry through association’s activities as well as whether the association is open and inclusive. Also as has been discussed earlier, the farmers we interacted with during the survey were likely to be concerned about their proximity to the officials from COCOBOD through the associations’ activities just as well as by whether the associations allowed open membership or even a platform to hear the concerns of all the citizenry. In fact, most of the farmers who attended the meetings were more than content not to express their opinions themselves but rather through, or in agreement with a chief farmer or executives of the association.

Finally, a test of the prediction power of the models for the dependent variable, using the Adjusted R Squared shows that the predictive power of the social capital variables is much lower than that of the ‘logics’ indicating that how farmers ‘think’ is more likely to influence their participation than what they ‘do’ or engage with. This observation is in line with Tomlinson (2012) which concludes that despite the impact of shared interests on participation, it is the mindset of industry players that is the most important factor in determining their participation or non-participation. This view is also emphasised by looking at the coefficients of the ‘logic’ variables in comparison with the coefficients of most of the social capital variables (apart from ‘Trust’) and it is probably evident that the mind-sets of the farmers is very crucial in forming their participative behaviours.

In summary, the statistical analysis of data from Ghana’s cocoa industry supports this chapter’s hypotheses that social relations, decentralisation and a mindset of ‘membership’ and ‘influence’ are important factors in impacting the participation of individual farmers in the industry’s cottage associations. Furthermore, the way a farmer thinks, in terms of his views on the effectiveness or inclusiveness of the associations, was more important in predicting his behaviour than the actions or activities he engages in.
7.5 Conclusion

This chapter analysed the motivations for participation in industry associations by individual participants using the case study of Ghana’s cocoa industry and a survey of 257 farmers in 6 cocoa regions. It focused on the social relations within the industry and their impact on participation as well as the role that decentralisation of governance processes play in enhancing social structures at the local levels and hence fostering improved participation by players in industry activities.

It also builds on Tomlinson’s (2012) firm-level analyses of the ‘logics’ that determine participation in industry institutions. These logics are the ‘logic of influence’ as against the ‘logic of membership’. Where the ‘logic of influence’ stands for the view of participants about the ability to influence their industry and fortunes through their participation in such associations; and the ‘logic of membership’ relates to how participants feel about the openness and democratic structures present in the association.

The findings of the empirical analysis supports the hypotheses of this chapter, that social relations, decentralisation, and the mindsets of farmers in terms of the influence and inclusivity of the associations are important factors in determining participation in Ghana’s cocoa industry. The results further indicate that the view of the farmers in terms of the effectiveness and inclusiveness of their industry associations is more likely than their actions to influence their decision to participate in the industry associations in their farming cottages. Therefore the ‘thinking’ of these farmers is an even more important factor than their social relations in predicting participative behaviour.

These conclusions have implications for policy in terms of the need to focus on improving the effectiveness of the groups and associations to which policy makers intend to encourage more
participation. This is in variance with much accepted thinking and practise of just focusing on the improvement of the social and democratic structures of such industry associations in order to get more members. Rather, industry players are also more likely to become active participants when they feel that their participation will have a direct impact on their livelihoods and will bring influence with industry regulators and other such industry players.

COCOBOD should also improve its industrial governance across all the cocoa regions by strengthening its regional and local offices to act as ‘Centres of Engagement’ for the farmers and other participants in the industry. These regional bodies must view social engagements with the farmers as an important aspect of their governance while supporting programs that facilitate farmer-to-farmer relationships and participation in activities of the local and regional associations. Countries in formulating industrial policy should consider more decentralised or regionalised governance structures that are social in nature and have as a major objective, the engagement of industry participants and fostering of social relations. It is evident from this research that the poorer cocoa growing regions of Ghana will benefit more if the governance of the industry is decentralised from the national headquarters of COCOBOD to the regional and local offices.
Chapter 8 – Conclusion

8.1 Summary

This thesis focused on the issues identified in the literature on Strategic Choice; that there is the tendency to ignore the wills, aspirations and voices of the ‘publics’ in formulating industrial policies resulting in a state of ‘strategic failure’ (Cowling & Sugden, 1998). This is evident in both government interventionism structures as well as free market economies. The case study of Ghana’s cocoa sector is the classic case of government interventionism where a majority of the industry players, most notably peasant farmers and the Licensed Buying Companies are divorced from the decisions that directly influence their livelihoods.

This hierarchical structuring of governance and its attendant constraining of the ability for individuals to make their own living is always embedded in a social setting. The thrust of the thesis therefore was to explore the consequences of greater social connections on a participant’s perceptions of hierarchical governance structures and costs of strategic choices being made by elites. The major hypothesis tested is that participants in an industry tend to be better off in terms of the effects of strategic policy making when they are better connected or organised socially. In other words, participants that act alone are affected more by the negative impacts of strategic decision-making by elites than those that are more connected together. To test this hypothesis, the thesis made use of case study, interviews and survey questionnaires data from major participants in the cocoa industry of Ghana including the industry regulator – COCOBOD and farmers in all of the country’s six cocoa regions.

A number of conclusions could be drawn from the research work in this thesis and these are now explored below.
8.2 Conclusions

8.2.1 Social Capital, Good Governance & Strategic Failure

First, the findings from Chapter 5 were that social capital variables in Ghana’s cocoa industry - that is the social relations among the farmers, farmers utilising ties with COCOBOD officials and participation in industry activities - were all positively and significantly associated with higher perceptions of good governance among Ghanaian cocoa farmers. Shared vision among the farmers was also positively and significantly related to industry governance.

These results mean that where Ghanaian cocoa farmers were more actively engaged in COCOBOD networks and events, they were more likely to perceive that their concerns are being considered at a higher level, and thus they hold a better overall perception of the governance process. In this regard also these more engaged farmers may feel they have a greater influence over COCOBOD’s strategic decisions and resource allocation.

A high level of socialisation and networked activity (or relational social capital) may therefore lead to greater deliberation and consensus building (shared vision) over industry related issues and this may also facilitate better perceptions of governance (see also Donor and Schneider, 2000, Sacchetti and Sugden, 2003, 2009, Tomlinson, 2012). This result is very much in line with the literature on the Strategic Choice Framework (SCF) such as Sacchetti and Sugden’s (2003, 2009) view that ‘inclusivity’ facilitates participation, consultation, and engagement among networked actors, which is likely to lead to better governance. Branston et al. (2006a) have also argued that if the participants in any organisational structure have solidarity towards the aims of the organisation (shared vision), they are bound to engage better and hold positive views of strategic decision-making. This results in an engaged citizenry and provides a platform for more inclusive
governance structures that are important for shielding participants against the negative effects of hierarchical decision making.

The results indicate that participants with more social relations within an industry are more likely to feel that they had an influence in the decisions of elites and may therefore not be overwhelmed (suffocated) by the dominance of strategic decision making and hence will feel more in charge of their own destinies. Socially engaged participants should feel less ‘caged’ than participants that have low social capital and may therefore make the decisions on their productivity or future prospects, not based solely on the strategic choices of, for example, the industry regulator or transnational companies, but also on their own appreciation of the industry dynamics enhanced by improved information sources and ability to influence. The findings of this thesis is therefore that there is seemingly a strong case for social capital’s role in mitigating the harmful effects of strategic failure among participants within a hierarchical industrial setup.

However, the results also suggested that these social engagements and the governance process appear to work better in the more productive cocoa growing regions of Ghana (Western and Ashanti), than in the smaller growing regions (Volta, Eastern, Central and Brong Ahafo). Also, a significant number of the poorer farmers surveyed appeared to be disengaged from the industry, with low perceptions of governance, as compared to the more well-to-do farmers.

These conclusions hint of differences in the social capital within an industry, with highly productive regions and high-earning participants having more social capital and hence better governance than the lower-productive regions and also poorer participants. This will have consequences for the welfare of such poor participants and regions who by being disengaged from the industry are unlikely to be shielded from the impact of strategic failure within the industry or
be involved in the governance processes. This fault is even more pronounced since the effect of strategic failure is felt most by the poorest participants within an industry. Therefore the worth of social capital in stemming the negative consequences of hierarchical governance is severely undermined if the poorest are unable (or unwilling) to cultivate such social capital resources.

This was the issue addressed in Chapter 6 of the thesis and will now be discussed below in relation to the overall theme of the thesis.

8.2.2 Inequality in Social capital

In Chapter 6, it was evident from the results that farmers in the high production regions were far more engaged socially within the industry than those in the lower production regions. This was also the case for farmers with higher incomes as compared to those with lower incomes. Richer farmers communicated with other farmers very often and were comfortable receiving advice from other farmers. They also ranked very highly their contacts with COCOBOD officials and attendance at programmes and workshops organised by COCOBOD.

There was also more cooperation between the richer farmers and the Licensed Buying Companies, especially in terms of warehousing, technological upgrades and in generating new processes and innovations as compared to the poorer farmers.

This view of differences in how the rich and the poor appropriate social capital is also emphasized in the literature. For example, Lin (2000) makes the point that there is inequality in the acquisition of social capital and this contributes to social inequality such as in terms of socioeconomic achievements and the quality of life. The literature also notes that it is not only in the ‘quantity’ of social capital that one can distinguish the rich from the poor but also in the ‘quality’ of their social relations; that is rich participants in an industry do not only have more social relations but are also
engaged in the richer or more ‘transactional’ forms of social capital – described as ‘weak ties’ in the literature and associated with improved economic attainment and development (See Granovetter, 1973; Woolcock, 2001).

These conclusions, that suggest that there are inequalities in the social capital accessed by the rich as against the poorer participants raises questions about the role of social capital as a sufficient condition in mitigating the negative consequences of ’strategic failure’. The findings of the thesis therefore is that there is a tendency for the benefits of social engagements to be skewed toward the rich as against the poor. This also means that social relations are unlikely to make an impact on those at the very bottom of the hierarchy if the poorest continue to be either unwilling or unable to be socially engaged within their industries. This conclusion leads to the final analysis of the thesis on the issue of what motivates industry players to be more participative within their industries.

8.2.3 Motivations for Participation

Chapter 7 analysed the motivations for participation in industry associations by individual participants. It focused on the social relations within the industry and their impact on participation as well as the role that decentralisation of governance processes play in enhancing social structures at the local levels and hence fostering improved participation by players in industry activities. The third motivational factor considered was based on Tomlinson’s (2012) firm-level analyses of the ‘logics’ that determine participation in industry institutions. These logics are the ‘logic of influence’ as against the ‘logic of membership’. Where the ‘logic of influence’ stands for the view of participants about the ability to influence their industry and fortunes through their participation in such associations; and the ‘logic of membership’ relates to how participants feel about the openness and democratic structures present in the association. Tomlinson’s (2012) view was that
these logics run contrary to each other in deciding whether to participate and the ‘logic of influence’ is likely to be more important in a participant’s decision to engage in industry institutions.

The findings of this thesis are that social relations, decentralisation, and the mindsets of participants in terms of the influence and inclusivity of industry associations are all important factors in determining participation within the industry. The results further indicate that the view of the participants in terms of the effectiveness of their industry associations is as likely as their perception of the inclusivity of the associations, to influence their decision to participate in such associations’ activities. Also, the ‘thinking’ of participants is an even more important factor than their social relations within the industry in predicting participative behaviour. Industry players are therefore more likely to become active participants when they feel that their participation will have a direct impact on their livelihoods and will bring them influence with industry regulators and stakeholders.

8.2.4 Unique Contributions to the Literature

The conclusions of this thesis are unique to the literature because they address the issues of social capital and governance in a developing country context rather than in the situation of a developed country where the literature is much more settled. The analysis of Ghana’s cocoa industry is therefore a significant addition to the body of knowledge on the impact of social capital resources (in a less developed, mostly agrarian and subsistence industries of a developing country) on governance structures, which in the instance of Ghana’s cocoa industry is bureaucratic, government-led; but at the same time heavily influenced by major foreign transnational corporations. The conclusions of the thesis point to similar impacts of social capital on governance in both the developing and the developed world. However, the presence of a larger number of poor
participants who are unable or unwilling to appropriate social capital resources mean that the role of effective and inclusive industry associations is ever more important in the developing countries context and therefore governance systems in such industries must be focused on improving the transactional forms of social capital that are important for improving the welfare of poorer industry players.

Furthermore, the focus on regional level governance is important as decentralisation is increasingly being recognised in the literature as significant for good governance and broad-based participation by stakeholders in decision making. The important differences we note among the various cocoa regions of Ghana in terms of both their social organization and governance structures highlights the need for more focus on research into micro-governance structures to identify clearer solutions to mal-governance practices within industries. Cities and communities must increasingly become the units of economic analysis especially in relations to the issues of good governance and improved participation by stakeholders within an industry.

The thesis also applies social capital in its various forms and makes the point that there are different capital resources embedded in diverse social relations and it is important to disintegrate the concept when applying it to various phenomena in order to enhance the development of social capital as a theoretical concept. The need to improve the ‘weak ties’ of poorer participant is, for instance, a vital conclusion of the thesis and helps narrow down to the specific resource required by the poor to ‘get ahead’ rather than the general prescriptions in most of the literature which focus on broadly expanding social relations for all participants.

Finally, we build on the Strategic Choice Framework (SCF) literature to present ‘strategic failure’ as a central problem of governance – where it is the lack of engagement in strategic decision
making by participants that results in poor governance rather than the inability to organise such participants to engage in collective action. The erstwhile focus of the literature on such ‘collective action’ problems can result in a lop-sided view of what is need to improve governance especially in terms of encouraging broader based decision making and inclusive structures that allow people to be in charge of their own destinies. Focusing the literature going forward on addressing the participation of all relevant stakeholders in the governance process probably makes the literature more relevant to more contemporary definitions of the problems of governance (See UNDP, 1997, Robledo et.al, 2008, World Bank Institute, 2006).

In summary, the thesis makes a case for the development of the theory on governance, social capital and the relationship between social capital and governance. It raises the importance of ‘strategic failure’ considerations in governance and the need to breakdown the analysis of governance from the macro to the micro-level. Social capital should also be defined in less holistic terms and the concept should increasingly be referred to in more specificity based on the characteristics and consequences of the particular social relations being addressed. This further informs new theoretical conceptualisations of the relationship between social capital and governance as not all ‘social capitals’ impact governance and the poor are likely to be significantly disadvantaged in terms of how much their social relations impact on their governance.

8.3 Limitations of the Study & Future Research

It is important to also state some limitations to the findings of this research and to make suggestions for future research in this area of study. First, there is the possibility of reverse causality issues that was not explored fully in this study as there is a probability that good regional governance creates
and enhances social cooperation and therefore the relationships identified run in the opposite direction to our conclusions in Chapter 5 (See De Propis, 2001 on governance impact on inter-firm linkages). Also, there is a probability that participation in industry activities can result in creating the ‘logics’ of motivation in Chapter 7 rather than the other way round as we have concluded in this thesis. However, given previous (and aforementioned) studies have uncovered similar patterns, the author holds a strong degree of confidence in his results and their interpretation.

Secondly, care should also be taken in generalising the conclusions drawn from studying the cocoa industry in Ghana to other industrial governance set-ups; as the particularly bureaucratic structure of the industry regulator, COCOBOD may not be applicable in most other industries. The conclusions arrived at are also drawn from studying cottage level associations in Ghana’s cocoa industry and these are different from other industrial associations which may be bigger and more diverse. Participants join these very small and local cocoa associations’ activities for other reasons – such as ethnicity and community – rather than because of the common ground of belonging to the same industry unlike most other industry associations.

We also note the time window of the current study was relatively short (5 years). While this was, in part, deliberate to focus respondents upon their recent relations with COCOBOD, further follow up studies may be required to provide longitudinal data that capture changes in governance and social capital through time. It might also be insightful for future work to disaggregate COCOBOD given its size and importance to the sector, thereby exploring in more detail the impact of its different functions, possibly in conjunction with some further consideration of the role and impact of industry partner programmes (such as the Cadbury Cocoa Partnership) within the value chain. Similarly future work might have a broader scope, which could, for instance, include exploring the views of farmers who were unable (or unwilling) to attend the central meetings where we
conducted our field work, and also wider issues such as social/cultural factors like gender, migrant status, or relations to the ruling families in the community.

Future studies might seek to explore the themes of social capital and governance in other agricultural sectors (and possibly emerging industries) in other developing countries. Indeed, given the significance of promoting good governance for development, which is now recognised by prominent organisations such as the World Bank and the United Nations (see Section 2), this is an important and possibly fruitful line for research. The direct impacts of good regional governance and better social capital on the fortunes (welfare) of participants in an industry; are also an important follow up to this thesis. This is important because decentralised governance and social capital cannot be ends in themselves and their roles in facilitating development and wealth creation will be an interesting exploration for further research.

Finally, this thesis’ research into issues of governance and social capital are important for sound policy formulation. First, as the world debates new economic governance forms in the light of the financial crisis of 2008 and the on-going global economic downturn that has highlighted a possible flaw in concentrating power to take strategic decisions in the hands of a few elite in world government or major transnational firms, this thesis’ proposition is that improving social capital resources within such hierarchical structures could help improve governance of industries at the decentralised level and therefore result in better and more equal economic outcomes.

Supra-national organisations such as the World Bank that facilitate the development of global and national policies on governance must increasingly focus on lower-level governance structures (within cities and communities) and encourage individual-level participation in strategic decision-making through effective and inclusive associations. Particular focus must be given to poorer
communities who need to be assisted to develop social structures that encourage transactional forms of relationships and create both formal and informal linkages among all stakeholders.

In this same regard, national governance mechanisms such as the COCOBOD, as in this case, must actively pursue the establishment of industry associations in the various communities. These industry associations must open, inclusive and have a ‘voice’ in relation to the final decisions of the regulator. COCOBOD must use its regional offices as ‘centers of engagement’ that will get farmers involved in the governance of the industry. All other stakeholders in the industry, including multinational firms, Licensed Buying Companies, NGOs and academic institutions must have an orientation towards inclusiveness of all farmers in their activities; particularly the poorer regions and farmers.

Finally, ‘strategic failure’ is fundamentally an issue that affects (constrains) the thinking of an individual participant. It makes her more unlikely to be able to make the best use of her abilities and resources to determine welfare and prosperity. The recommendation of this thesis is that persons in such top-down governance structures should ‘gather together’, be more involved in their association activities, cultivate transactional forms of relationships (i.e. with buyers) and operate within regions where more of such social structures exist.
References/Bibliography


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Robledo, C, Laster, J, Byrne, S & Schmidt, K. (2008) *Climate change and governance in the forest sector: an overview of the issues on forests and climate change with specific consideration of sector governance, tenure and access for local stakeholders*. Washington, D.C: Rights and Resources Initiative


Appendices

Appendix 1

Following the procedures outlined in Woolridge (2010) and also Antonakis et al. (2010), the standard robust check is to check if the error term (residuals) is uncorrelated with the regressors in the model (i.e. it is orthogonal with the regressor). In this case, the full model (model 4) is run, and the residuals saved before conducting a bivariate correlation analysis which is presented in the Table below. There is just one case that a regressor (Social Relations) is significantly correlated with the error term, and this is itself highly marginal, being at the 10% level of significance. While this variable may be considered potentially problematic, the higher threshold of significance (10%) – with the p-value being 0.092 - raises the possibility of committing a Type 1 error by rejecting a null hypothesis of no association (i.e. orthogonality). In addition, the strength of the correlation is -0.192, which would indicate a relatively weak relationship. Thus, there is confidence that the issue of causality is not a significant problem with the model specification.

Further, the possibility of utilizing an instrumental variable for the construct variable social relations was explored. Unfortunately, given the nature of the data, it was not possible to find suitable instrument(s) from within the survey data that was i). strongly correlated with the regressor and ii) independent from the error term. Propensity score matching is also not really suitable for a non-binary construct variable, and is again difficult to utilize given the nature of the data-set (i.e. survey data)).
**Significance values show p-values. ***Pearson’s correlation is significant at the 0.01 level (two-tailed); **Pearson’s correlation is significant at the 0.05 level (two-tailed); and *Pearson’s correlation is significant at the 0.10 (two-tailed)**

### Appendix 2

**Ordered Probit Results: Dependent Variable – Participation in Associations Activities**

<table>
<thead>
<tr>
<th>Variable</th>
<th>(1)</th>
<th>(2)</th>
<th>(3)</th>
<th>(4)</th>
<th>(5)</th>
<th>(6)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ownership</td>
<td>1.123</td>
<td>1.450</td>
<td>1.397</td>
<td>1.812</td>
<td>0.654 (0.583)</td>
<td>0.559</td>
</tr>
<tr>
<td></td>
<td>(0.357)***</td>
<td>(0.648)***</td>
<td>(0.403)***</td>
<td>(0.464)***</td>
<td>(0.600)</td>
<td></td>
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<tr>
<td>Productive Regions</td>
<td>1.917</td>
<td>1.769</td>
<td>1.771</td>
<td>0.577</td>
<td>1.151 (0.747)</td>
<td>1.191</td>
</tr>
<tr>
<td></td>
<td>(0.551)***</td>
<td>(0.567)***</td>
<td>(0.586)***</td>
<td>(0.686)</td>
<td>(0.752)</td>
<td></td>
</tr>
</tbody>
</table>

Table (1)

<table>
<thead>
<tr>
<th>Participation</th>
<th>Utilising Ties</th>
<th>Shared Vision</th>
<th>Social Relations</th>
<th>Saved Residuals</th>
</tr>
</thead>
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<td>Participation</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Utilising Ties</td>
<td>0.46***</td>
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<td></td>
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<tr>
<td>Signif (P value)</td>
<td>(0.00)</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Shared Vision</td>
<td>-0.48***</td>
<td>-0.29***</td>
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<tr>
<td>Signif (P value)</td>
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<td>(0.00)</td>
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<td></td>
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<tr>
<td>Social Relations with Farmers</td>
<td>0.14**</td>
<td>0.33***</td>
<td>0.12*</td>
<td>1</td>
</tr>
<tr>
<td>Signif (P value)</td>
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<td>(0.00)</td>
<td>(0.081)</td>
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<td>Saved Residuals</td>
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<td>-0.118</td>
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<tr>
<td>Signif (P value)</td>
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<td>(0.155)</td>
<td>(0.147)</td>
<td>(0.092)</td>
</tr>
<tr>
<td>Bags of Cocoa Harvested</td>
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<td>-0.003</td>
<td>-0.011</td>
</tr>
<tr>
<td>-------------------------</td>
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</tr>
<tr>
<td></td>
<td>(0.010)</td>
<td>(0.011)</td>
<td>(0.013)</td>
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<td><strong>Utilising Ties with COCOBOD</strong></td>
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<td>0.373</td>
<td>0.401</td>
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</tr>
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<td></td>
<td>(0.093)***</td>
<td>(0.107)***</td>
<td>(0.141)***</td>
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<td><strong>Shared Values</strong></td>
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<td></td>
<td>(0.167)**</td>
<td>(0.205)***</td>
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<tr>
<td><strong>Trust Relations</strong></td>
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<tr>
<td></td>
<td>(0.247)***</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Logics</strong></td>
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<td></td>
</tr>
<tr>
<td><strong>Influence</strong></td>
<td>1.990</td>
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<td></td>
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<tr>
<td></td>
<td>(0.304)***</td>
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<tr>
<td><strong>Membership</strong></td>
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<tr>
<td></td>
<td>(0.468)*</td>
<td></td>
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</tr>
<tr>
<td></td>
<td>(0.588)***</td>
<td>(0.648)***</td>
<td>(0.661)***</td>
<td>(0.751)***</td>
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<td>(0.715)***</td>
<td>(0.755)***</td>
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<td>(0.607)***</td>
<td>(0.628)***</td>
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<td>(0.602)***</td>
<td>(0.621)***</td>
<td>(0.695)*</td>
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<td>-1.955</td>
<td>-1.891</td>
<td>-1.891</td>
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<tr>
<td></td>
<td>(0.528)***</td>
<td>(0.599)***</td>
<td>(0.616)***</td>
<td>(0.613)***</td>
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<tr>
<td>Nagelkerke</td>
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<td>0.230</td>
<td>0.258</td>
<td>0.394</td>
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<td>------------</td>
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<tr>
<td>Cox and Snell</td>
<td>0.132</td>
<td>0.194</td>
<td>0.217</td>
<td>0.333</td>
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<tr>
<td>- 2 log likelihood (Final)</td>
<td>251.410</td>
<td>307.329</td>
<td>285.996</td>
<td>245.289</td>
</tr>
<tr>
<td>Chi-square $\chi^2$</td>
<td>34.316 (3 df)***</td>
<td>45.989 (4 df)***</td>
<td>49.777 (5 df)***</td>
<td>76.565 (6 df)***</td>
</tr>
</tbody>
</table>

NOTES: ***p < 0.01; **p < 0.05; *p < 0.10
Values are non-standardized regression coefficients (with errors in parentheses)

Appendix 3

Information Sheet for Interviews

<table>
<thead>
<tr>
<th>Density</th>
<th>a) What is the number of individual farmers in the cocoa sector and where are they located?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>b) What is the number of Licensed Buying Companies and where are they located?</td>
</tr>
<tr>
<td></td>
<td>c) What is the number of officials working for COCOBOD and what is the distribution across the country? Breakdown by departments</td>
</tr>
<tr>
<td></td>
<td>d) What is the number of multinational firms present in the market and where are they located?</td>
</tr>
</tbody>
</table>
| **Centrality (In Your View…)** | **a)** What are important decisions made in this industry?  
| e)** What is the number of auxiliary service providers in the industry?  
| **b)** Who makes these decisions?  
| **c)** In whose interests are these decisions made; or who benefits most from this set-up of decision making?  
| **d)** What are the alternatives to the current form of decision making?  
| **e)** How does COCOBOD ensure the participation of all stakeholders, especially peasant farmers, in the decision making process?  
| **Structure** | **a)** What is the process from planting of the cocoa bean to the production of finished products?  
| **b)** What value is created at each stage and who extracts that value?  
| **c)** What is the formal as against the informal channels?  
| **d)** Are the channels hierarchical or participative?  
| **e)** In your view, who controls this structure and who derives the most benefits from the structure?  
| **Main Actors** | **a)** Who are the main participants in the industry?  
| **b)** What are the supporting industries?  
| **c)** What are their roles and responsibilities?  
| **d)** What are the various benefits that accrue to them?  
| **Linkages** | **a)** What are the links between COCOBOD and farmers?  


<table>
<thead>
<tr>
<th><strong>Description of the Network</strong></th>
<th>a) What is the degree of participation within the industry?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>b) Who is in charge and how does this affect the industry?</td>
</tr>
<tr>
<td></td>
<td>c) Is the industry a loose or structured organisation?</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Goals of the Network</strong></th>
<th>a) What are the identifiable goals of the network?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>b) Who sets these goals and what is the process (if any) of setting them?</td>
</tr>
<tr>
<td></td>
<td>c) In your view, are these goals in the interest of farmers, Licensed Buying Companies, COCOBOD or Multinationals?</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Inclusiveness</strong></th>
<th>a) What constitutes membership of the network?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>b) What are the barriers to entry and exit?</td>
</tr>
<tr>
<td></td>
<td>c) How open is membership at both the level of the individual farmer and also for firms?</td>
</tr>
</tbody>
</table>
History and Evolution

a) What are the timelines and major events in the development of Ghana’s cocoa industry?

b) What stage is the industry currently and what is its market structure; perfect competition, oligopoly or monopoly etc.?

c) What are the projections for the future?

Types of Associations & Social Structuring

a) What are the various farmer and LBC associations present in the industry?

b) What role do they play in the industry?

c) What is their organisational structure and how representative or participative are these associations?

Appendix 4

Survey Questionnaire for Farmers

SECTION 1

About the business of the farmer

We would like to begin by asking you some general questions about your business

1. Do you own all of the farm(s) that you cultivate?

□ Yes

□ No
If No, Please explain…………………………………………………………………………………………

2. How many people work for you on the farms?
   □ Fewer than 5 employees   □ 50-100 employees
   □ 5-15 employees           □ 100 or more employees
   □ 15-30 employees
   □ 30- 50 employees

3. Please specify your goals for your cocoa farming business.

   __________________________________________________________
   __________________________________________________________
   __________________________________________________________

4. In which year did you start cocoa farming? __________

5. How much revenue/profit do you make in a year? __________

6. How many bags of cocoa did you harvest in the last year? __________

7. Over the last 3 years has your sales turnover been: □ Increasing □ Stable □ Decreasing

8. Over the last 3 years has your profitability been: □ Increasing □ Stable □ Decreasing

9. Which of the recommended practices of COCOBOD do you adhere to?

   __________________________________________________________
   __________________________________________________________
   __________________________________________________________
   __________________________________________________________
**SECTION 2**

*Farmer’s Relationship with COCOBOD*

We will like to find out about your relationship with the Government Regulator - COCOBOD

10. **How will you rate the following;**

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>Always</th>
</tr>
</thead>
<tbody>
<tr>
<td><em>How much of the time do you think you can trust COCOBOD to act in your interest?</em></td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td><em>How much of the time do you think you can trust the government to act in your interest?</em></td>
<td>☐</td>
<td>☐</td>
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<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td><em>How often have you attended programmes and workshops organised by COCOBOD?</em></td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td><em>How often do you feel a part of the decisions made by COCOBOD for farmers?</em></td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td><em>How often do you get in contact with an official from COCOBOD?</em></td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td><em>How often do you use the cocoa spraying services initiated by COCOBOD?</em></td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td><em>How often do you receive financial support from COCOBOD?</em></td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
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</tbody>
</table>

11. **What are some of the benefits you get from COCOBOD that we have not talked about?**
12. How will you agree with the following statements on COCOBOD

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
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<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>COCOBOD represents the interest of farmers like me</strong></td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td><strong>COCOBOD is an Open and Transparent Organisation</strong></td>
<td></td>
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<tr>
<td><strong>COCOBOD is an Effective Negotiator for the Industry</strong></td>
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<tr>
<td><strong>COCOBOD is an Efficient source of new and useful information</strong></td>
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<tr>
<td><strong>COCOBOD’s officials have integrity</strong></td>
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</table>

13. How will you describe your relationship with COCOBOD;

<table>
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<tr>
<th>1</th>
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<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>□</td>
<td>□</td>
<td>□</td>
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<td>□</td>
</tr>
</tbody>
</table>
SECTION 4

Farmer’s relationship with Cocoa Farmers Organisations

We will like to find out about your participation in Farmer groups and associations.

14. How frequently do you participate in meetings, associations, and networks of cocoa farmers at the following four levels:

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Never</td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Always</td>
<td></td>
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<td></td>
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<td></td>
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<tr>
<td><strong>Local level (same town)</strong></td>
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<td></td>
</tr>
<tr>
<td><strong>Region</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>National</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td><strong>International</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<td></td>
</tr>
</tbody>
</table>

15. The following opinions have been expressed about farmers associations and associated institutions. Please indicate how strongly you agree or disagree with the following opinions.

<table>
<thead>
<tr>
<th></th>
<th>Strongly Disagree</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Overall, our cocoa farmers associations are responsive and representative of all farmers</strong></td>
<td>□</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>In general, forums organised by the associations encourage open dialogue and exchange of views about industry issues</strong></td>
<td>□</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Our associations are accountable to their members.</strong></td>
<td>□</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Our associations are very open and allow anybody to join</strong></td>
<td>□</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
16. Please indicate to what extent you have utilized personal ties, networks, and connections to access funds, information, knowledge or contacts during the past three years with:

<table>
<thead>
<tr>
<th>The services provided by our associations are important for my business</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Our associations are a strong lobbying group for our industry</td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Our associations aid and promote the development of our industry</td>
<td></td>
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<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Our associations give us the opportunity to make our views heard and to influence the industry</td>
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</tbody>
</table>

17. The following statements relate to the extent to which you interact with other farmers. Please indicate the extent to which you agree/disagree with the following statements:

**SECTION 5**

**Farmer’s relationship with other farmers**

We will like to find out about your relationship with other farmers

17. The following statements relate to the extent to which you interact with other farmers. Please indicate the extent to which you agree/disagree with the following statements:
18. The following statements explore your ambitions and vision with those of other farmers in your industry. Please indicate the extent to which you agree with the following statements. 1 = Strongly disagree, 7 = Strongly Agree

<table>
<thead>
<tr>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>I socialise with other farmers in the industry</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I regularly participate in industry social events and forums</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>There is an informal network among farmers, suppliers and agents in the industry</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I communicate with other farmers very often (i.e. at least once a fortnight)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I feel comfortable receiving advice from other farmers</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Industry run training courses allow social interactions to take place</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I collaborate with other farmers in achieving my business goals</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>You share the same ambitions and vision as other farmers in the industry</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>You consider that your business’ future is related to that of other farmers in the industry</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

266
19. Please indicate the extent to which you co-operate with other farmers on the following activities:

<table>
<thead>
<tr>
<th>Low Co-operation</th>
<th>High Co-operation</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Seed Capital</td>
<td></td>
</tr>
<tr>
<td>Disease Prevention</td>
<td></td>
</tr>
<tr>
<td>Warehousing &amp; Storage</td>
<td></td>
</tr>
<tr>
<td>Payment for Goods</td>
<td></td>
</tr>
<tr>
<td>Technological upgrading</td>
<td></td>
</tr>
<tr>
<td>Generating new processes</td>
<td></td>
</tr>
<tr>
<td>Exchange of information/experiences</td>
<td></td>
</tr>
</tbody>
</table>

20. State any other activities not included in above………………………………………………
…………………………………………………………………………………………………………………………
…………………………………………………………………………………………………………………………
…………………………………………………………………………………………………………………………
…………………………………………………………………………………………………………………………

SECTION 6

Farmer’s relationship with Licensed Buying Companies and Multinational Firms

We would now like to ask you some questions about the extent to which you work with buyers, and multinational firms. This will provide us with an indication as to the nature and importance of such relationships within your business area.
21. With whom do you work? Please indicate the partners you have in each location. E.g. buying agents, companies

<table>
<thead>
<tr>
<th>Name &amp; Type of Partners</th>
<th>Location of Partners</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Local (within 25 miles of your location)</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
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</tr>
</tbody>
</table>

22. Please indicate the extent to which you co-operate with Licensed Buying Companies on the following activities:

<table>
<thead>
<tr>
<th>Co-operation</th>
<th>Low</th>
<th>High</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Seed Capital</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td>Disease Prevention</td>
<td>☐</td>
<td>☐</td>
</tr>
<tr>
<td>Warehousing &amp; Storage</td>
<td>☐</td>
<td>☐</td>
</tr>
</tbody>
</table>
23. State any other activities not included in above

………………………………………………………………………………………………………………
………………………………………………………………………………………………………………
………………………………………………………………………………………………………………

24. Please indicate the extent to which you co-operate with Multinational Firms on the following activities:

<table>
<thead>
<tr>
<th>Low Co-operation</th>
<th>High Co-operation</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1</td>
</tr>
<tr>
<td><strong>Payment for Goods</strong></td>
<td>□</td>
</tr>
<tr>
<td><strong>Technological upgrading</strong></td>
<td>□</td>
</tr>
<tr>
<td><strong>Generating new processes</strong></td>
<td>□</td>
</tr>
<tr>
<td><strong>Exchange of information/experiences</strong></td>
<td>□</td>
</tr>
</tbody>
</table>
25. State any other activities not included in above………………………………………………
…………………………………………………………………………………………………………………………
…………………………………………………………………………………………………………………………
………………………………………………………………………………………………………………………..

26. Please indicate the extent to which you agree/disagree with the following statements

<table>
<thead>
<tr>
<th>Strongly Disagree</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>You can rely upon your partners without any fear that they will take advantage (even if the opportunity arises)</td>
<td>□ □ □ □ □ □ □</td>
</tr>
<tr>
<td>In general your partners always keep their promises</td>
<td>□ □ □ □ □ □ □</td>
</tr>
<tr>
<td>Generally speaking, there is a trusting climate among buyers and farmers in the industry; a feeling that most people can be trusted or that you can deal with people easily</td>
<td>□ □ □ □ □ □ □</td>
</tr>
<tr>
<td>Reciprocal trust in my business relationships with partners is very important for promoting my business</td>
<td>□ □ □ □ □ □ □</td>
</tr>
<tr>
<td>Reciprocal trust in my business relationships with government and state agencies is very important for promoting my business</td>
<td>□ □ □ □ □ □ □</td>
</tr>
</tbody>
</table>

SECTION 7

About Farmer

Finally, we would like to ask you some general questions about yourself.
27. What is your age? __________

28. How large is your household? __________

29. What is your educational level? __________

First Name & Mobile Phone Number (for contact) __________

THANK YOU FOR YOUR TIME