

Developing Main-Contractor -- Subcontractor Long-Term Relationships: Current Practice and Strategies

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Abstract

The competitions in the construction industry has evolved from company and project based to supply chain based and therefore developing long-term supply chain alliance relationship within construction supply chain members become vital in order to remain competitive in the industry. This paper aims to understand the main contractors' perceptions on their long-term relationships with the sub-contractors/suppliers. Fifteen face-to-face semi-structured interviews were conducted with representatives of 8 main contracting firms. A Content Analysis Software "CodeMiner 0.9 Beta" and a spreadsheet software Excel were used to analyze the information gathered from the interviews. The research found that the main-contractors recognize the importance of having long-term relationship with their subcontractors to "enhance the organisational competitive advantages, maximize profit, to enhance customer satisfaction, improve quality, and to gain strategic market position". The research also found that the key elements for establishing successful long-term relationships include: "trusting behaviour between parties, honesty, top management commitment, open communication and integrated information system" and the proactive strategies for establishing long-term relationships include "organize regular meetings, provide incentive financial scheme, maintain constant contacts, taking ownership of the program and well structured documentation".

Keywords: main-contractor, sub-contractor, long-term relationships, trust, commitment, communications

Introduction

In today's business, competitive advantage is no longer inhabited within organizations' own internal capabilities but rather the network of relationship and linkages that the organizations can create with external organizations (Underhill, 1996; Spekman et al., 1999). Many authors suggest that long-term alliance relationship play a critical role in enhancing the competitive advantages of companies by reducing redundant performance and enhancing quality standard (Doz and Hamel, 1998; Holti et al., 1999; Kale et al., 2001). It has been said that the success of managing the construction supply chain will rely critically on the main contractors to make an effort to address the integration and partnership of the subcontractors and suppliers (Akintoye et al., 2000; Dainty et al., 2001a, 2001b). Past research also reminded that the

inability to address the issues of long-term alliance relationship would lead to a failure to gain benefits from the added value that subcontractors and suppliers could contribute (Dainty et al. 2001a, 2001b). However, research (Cox and Townsend, 1998) showed that the supply chain parties have become less trusting and self-structured that operate independently. Parties tend to transfer the unknown and uncertainties to other parties in order to minimize their risk exposure. Numerous studies have found that the relationships between main contractors and subcontractors/suppliers are often confrontational and adversarial (Kumaraswamy and Matthews, 2000; Dainty et al., 2001a, 2001b; Humphrey et al., 2003). It is further demonstrated through the increase in contractual dispute, litigation and a win-lose attitude among them (Hampson and Kwok, 1997). Until now, little effort is given in directing the relationship between main contracting firms and subcontracting firms away from the traditional-arms length contracting towards a more long-term relationship. This is a serious ignorance given the high level of subcontracting within the construction industry (Dainty et al., 2001a, 2001b).

Therefore, there is a need for the main contractors and subcontractors/suppliers, as part of their overall strategies, to shift towards a more cooperative approach in building trust, fairness and respect into their relationship in order to create a win-win situation and achieve mutual objectives. Furthermore, as the main contractor is the key actor in the management and coordination of construction activities, their perceptions and roles in establishing long-term relationships with their subcontractors/suppliers are of paramount importance. This paper aims to identify the perceptions of the main contractors towards their long-term relationship with the sub-contractors/suppliers and develop strategies for development of long-term relationships.

Critical Successful Factors for Development of Long-term Relationships

Substantial research has been conducted in identifying critical successful factors for developing long-term win-win working relationships. Table 1 provides a brief summary of such studies where the elements of trust, communication and commitment have been recognized as the most critical successful factors by all authors.

Table 1 Critical successful factors for long-term relationship development

Authors	Year	Critical successful factors identified
Cheng et al.	2000	Management Support, Mutual trust, Long term commitment, Coordination, Creativity, Effective communication
Black et al	2000	Mutual trust, Effective communication, Clear understanding, Commitment, Acting/behaving consistently, Flexibility to changes
ACA	1999	Commitment, Trust, Respect, Innovation, Fairness, Enthusiasm
Ramaseshan and Loo	1998	Commitment, Inter-organization trust, Inter-organization communication
Hampson and Kwok	1997	Trust, Commitment, Interdependence, Cooperation, Communication, Joint Problem Solving
Miles	1996	Commitment, equity, communication, trust, timely response, culture
Mohr and Spekman	1994	Coordination, Interdependence, Trust, Commitment

Trust

Relationship that based on trust is the basis for management of alliances in maximizing the potential value and increase the probabilities of alliance success (Ramaseshan and Loo, 1998; Doz and Hamel, 1998; Ireland et al., 2002). Trust also affects the willingness of parties to accept risks, to share their idea and resources (Li et al., 2001). In addition, Trust is critical to the development of long-term relationship because

it creates an opportunity for the further alignment of goals allying parties' need to continually monitor one's behaviour which in turn reduces potential tensions created by short term inequities (Howarth et al., 1995 quoted in Sim, 2000). Some authors claim that trust will only exist when the parties had confidence in other's reliability and integrity (Ramaseshan and Loo, 1998; Li et al., 2001). Spekman et al. (1999) strongly emphasized that trust is built over time, once it is violated, it will be very difficult to rebuild.

Communication

Open communication is referred to free flow of resources in terms of ideas, knowledge, information, skill and technology through different effective channels (Cheng et al. 2000). It plays a vital role in problem solution and conflict resolution and most important of all, it stimulates trust among parties (Crowley and Karim, 1995; Wong and Fung, 1999; Cheng et al., 2000). In addition, many authors emphasized that an open honest communication environment can motivate parties to cooperate and collaborate with one another to create congruence in expectations (Mohr and Spekman, 1994; Ramaseshan and Loo, 1998; Cheng et al., 2000). Crane et al. (1997) suggest through regular meetings and interactions, it is able to stimulate an open communication environment that is capable of eliminating any duplication of efforts.

Commitment

Commitment is referred to the willingness for a party or organization to exert force in carrying out a task (Ramaseshan and Loo, 1998; Port et al., 1974 quoted in Cheng et al., 2000). Companies may differ in their strategic goals, organisational cultures and management philosophies (Sim, 2000). Commitment is a type of win-win attitude, which is necessary if an alliance is to continue (Hampson and Kwok, 1997). As such, without commitment, the differences in culture between companies would greatly inhibit the durability of the alliance and its success (Sim 2000). Ramaseshan and Loo (1998) also emphasized that commitment will enhance motivation and increase organization's citizenship behaviour. In order to gain organization wide commitment to an alliance, top management support at all stages of an alliances is essential, and top management needs to act with integrity to stimulate trust and openness so that problems or issues can be brought out into the open for investigation (Howarth et al., 1995 cited in Sim, 2000).

This paper used the above mentioned critical successful factors to test the current practice, barriers, and strategies of development of long-term relationships between main-contractors and subcontractors.

Research Methods

In order to gather valuable information, the samples were drawn from eight major construction companies with an annual turnover more than AS\$300 million and employ more than 300 people. These companies' businesses include building construction, civil engineering, property development, asset/facility management and refurbishment. In total, fifteen interviews were conducted. The questions were built based on the identified factors in literature presented in previous sections. The interviewees were required to indicate their perceptions by answering the close-ended questions using a five-point Likert scale (1 = low, 5 = high) where the numerical numbers signify the intensity of the responses. Interviewees were also given opportunities to provide their open comments. The close-ended questions and open comments were analysed together.

The software content analysis program "CodeMiner 0.9 Beta" and Excel spreadsheet program were used to analyze the information gathered from the interviews. This content analysis program allows the authors to extract the contents obtained from the interviews. The categorization system proposed by Berelson (1971) is adopted in the analysis, namely: subject matter, direction, awareness, and values. 'Grid' format is adopted to systematically summarize the interview findings to ease the comparison and identification of trend between different interviewees.

Research Findings and Discussions

Principal Motivators in Developing Long-term Relationship

The interviewees were asked to indicate the importance of 12 identified factors, based on 2 key elements: organization competitive advantages and attitude towards mutual benefits as shown in Table 2. The individual means for the 12 motivators were ranged from 2.59 to 4.47 (using the scale of 1 to 5). It is clear from Table 2 that the top four motivators are focused on achieving organizational competitive advantages.

However, it should be noted that 11 out of the 12 factors have mean scores above 3.00 (using the scale of 1 to 5) while the simplification of tendering process is being ranked as the least important factor (Mean = 2.59, sd = 0.51). This could be attributed that interviewees perceive tendering as a routine process in the subcontracting process regardless of how 'good' their past relationship with the subcontractors and suppliers.

Table 2 Principal motivators in developing long- term relationship

	Principal motivators	Mean	Min.	Max.	sd
a	To maximize profit and eliminate redundant performance*	4.47	3.25	5.00	0.79
b	To enhance customer's satisfaction*	4.25	4.00	5.00	1.09
h	To improve the quality assurance*	4.09	4.00	5.00	0.52
d	To gain strategic market position*	3.88	3.00	4.50	0.81
f	To create an open communicable project environment+	3.81	3.00	4.50	0.75
e	To create a learning climate with the supply chain+	3.63	3.00	4.50	0.89
g	To improve the level of understanding+	3.50	3.00	4.00	0.63
k	To get rapid response to queries and help+	3.50	3.00	4.00	0.70
c	To overhaul adversarial confrontation relationship+	3.34	2.00	4.00	0.97
l	To achieve profit sharing on a "win-win" basis+	3.16	2.00	5.00	1.34
I	To simplify the construction process*	3.03	2.00	3.50	0.83
j	To simplify the tendering process*	2.59	2.00	3.00	0.51
*	Organization competitive advantages (a, b, h, d, I, j)	3.72			
+	Attitude towards mutual benefit (f, e, k, g, c, I)	3.49			

NB: Symbols are used for easy reference to the factors under the same categories
sd – Standard deviation

Key Elements in Developing Long-term Relationship

Table 3 shows the key elements that interviewees considered when developing long-term relationship with their subcontractors and suppliers. Trusting behaviour between parties (Mean = 4.75, sd = 0.81) was seen as the most important element. This is similar to the findings by Li et al. (2001). The interviewees believed that 'trust' would affect the willingness of subcontractors to accept risks, to share their idea and resources. The second most important element was honesty (Mean = 4.31, sd = 0.58), the interviewees perceived that honesty is the best way to stimulate trust and commitment between the parties. In addition, some interviewees said that honest behaviour would enable an open communication where parties are more willing to share their ideas. It is consistent with Badger and Mulligan's (1995) findings that mutual trust and honesty between alliance partners would be critical to gain mutual understanding and commitment. In addition, the interviewees considered top management commitment and open communication are also important (Mean = 3.72). They claimed that open communication plays a vital role in problem solution and

conflict resolution. The lack of top management commitment in encouraging open communication between parties would hinder the cooperation and collaboration with one another.

With the advent of information technology and the widely available web-based project management software, it is surprising that integrated information system was ranked fifth among the elements (Mean = 3.53, sd = 1.14). 50% of the interviewees commented that not all their subcontractors and suppliers have the necessary advanced information technologies, and this made the integration of information systems difficult between the supply chain parties. It is also found that the alignment of organizations' culture was ranked as the least important factors. Most interviewees perceived that the alignment of organization's culture can only be achieved with the existence of mutual trust, honest, commitment and open communication built in their relationship.

Table 3 Key elements/factors in developing long-term relationship

Elements	Mean	Min.	Max.	sd
Trusting behaviour between parties	4.75	4.00	5.00	0.81
Honesty	4.31	4.00	5.00	0.58
Top management commitment	3.72	2.50	5.00	0.48
Open Communication	3.72	3.00	4.00	0.95
Integrated information system	3.53	2.00	5.00	1.14
Alignment of organization's culture	3.16	2.25	4.00	0.89

NB: sd – Standard deviation

Most interviewees commented that they had spent a lot of time in preparing subcontracting package and documentations. They normally inform their subcontractors and suppliers every detail related to the project, to ensure that all project components were included into their prices. Some interviewees even said, "We don't hide facts from our subcontractors and suppliers, it is our best interest to make sure that our subcontractors and suppliers were aware of every detail". They commented that they were trying to build trust, commitment and open communication with the subcontractors and suppliers through such honest conversations.

Barriers in Developing Long-term Relationship

Table 4 shows the barriers that may hinder the development of long-term relationship between the main contractors and subcontractors. As shown in Table 4, 'inconsistent performance' of subcontractors has the highest mean score (4.78). They also perceived that the inconsistent performance from the subcontractors and suppliers would ultimately lead to other barriers, i.e. lack of mutual trust, lack of positive attitude, lack of mutual understandings and commitment.

Table 4 Barriers in developing long-term relationship

Barriers	Mean	Min	Max	sd
Inconsistent performance	4.78	4.25	5.00	0.60
Lack of mutual trust	4.59	4.00	5.00	0.51
Lack of positive attitude	4.19	3.50	5.00	0.77
Lack of mutual understandings	4.00	3.50	5.00	0.44
Lack of commitment	3.88	3.00	5.00	0.72
Geographic dispersion	1.94	1.00	3.00	0.72

NB: sd – Standard deviation

In addition, it should be noted that trusting behaviour between parties was identified as the most important element in developing long-term relationship as shown in Table 3. However, it appears that there is a lack

of ‘trust’ element in the industry as evident in interviewees’ response given that ‘lack of mutual trust’ was ranked second (Mean = 4.59, sd = 0.60) out of the six identified barriers. It is found that geographic dispersion was the least worried. 90% of the interviewees commented that in light of information technology, the problem of geographic dispersion has already become the past. However, an integrated information system was found to be of low importance in development of long-term relationships as shown in Table 3.

Proactive Strategies in Developing Long-term Relationship

During the interviews, a question was put forward to the interviewees as what proactive strategies their companies have taken in establishing long-term collaborative relationships with sub-contractors. A number of answers were provided by the interviewees and an analysis was carried out using content analysis software *CodeMiner 0.9 Beta*. The contents were grouped into nine main categories as shown in Table 5. The results were summarized by counting the number of times any particular strategies was mentioned by the interviewees. It is clearly shown that organising regular meeting is the most commonly used strategies. Regular meetings will aid in breaking down communication barriers and more importantly, it will stimulate trust. This is similar to the findings by Crane et al. (1997) where organising regular meeting fostered open communication between the supply chain parties. The results showed that implementation of incentive schemes were the second most commonly used strategy in developing long-term relationship. Some interviewees commented that an incentive could be something like early release of progress payment, direct negotiation with the subcontractors and suppliers on new projects, etc. They commented that incentive scheme could be a very effective strategy to gain commitment and trust from their subcontractors and suppliers.

Table 5 Proactive strategies in developing long- term relationship

Proactive Strategies	No of counts	Percentage %
Regular meetings	13	23.00
Incentive schemes	10	16.90
Constant contact	9	15.20
Ownership of program	8	13.50
Well structured documentation	7	11.80
Informal gathering	5	8.40
Survey	3	5.00
Interview	2	3.30
Conduct of training	2	3.30
Total	59	100

Furthermore, the results showed that subcontractors and suppliers are empowered with ownership of program. Such delegations of program ownership will allow the subcontractors and suppliers to have control on time that are critical in labour deployment and materials ordering. On the other hand, the literature revealed that subcontractors were often given unrealistic timeframe to complete their task (Dainty et al., 2001a, 2001b; Davey et al., 2001).

Two interviewees perceived that feedbacks obtained from subcontractors and suppliers through survey or interviews could be useful information in relation to their future management strategies towards building good and long-term relationship with subcontractors and suppliers. In addition, some interviewees considered providing training for their subcontractors could be a positive measure in order to achieve mutual benefits.

Conclusions

Based on the findings from the 15 interviews with senior construction managers of the main-contractors, the research found that the major motivators for long-term relationship are “to maximize profit, to enhance customer satisfaction, to improve quality, and to gain strategic market position” and all these are all related to “organisational competitive advantages”. The motivators related to “attitude towards mutual benefits” come to a secondary consideration and “to achieve profit sharing on a win-win situation and to simplify tendering process” score the lowest. Nevertheless, the main contractors understand the importance of the long-term relationship with their subcontractors and they identified the key elements in developing and maintaining such relationships include: “trusting behaviour between parties, honesty, top management commitment, open communication and integrated information system”. The interviewees perceived the potential barriers as “inconsistent performance, lack of mutual trust/understanding and lack of positive attitude”. However, the main contractors have taken some proactive strategies towards development of long-term relationship with their subcontractors, such as: organize regular meetings, provide incentive financial scheme, maintain constant contact.

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