

Communication Management Practice for Better Project Controls in the Construction Industry of Kenya: Industry Players' Perspective

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Abstract: Communication plays an important role in integrating people, and taking decisions to make project control process a success. However, what constitutes effective communication is lacking as evidenced by failure of projects during implementation. In the construction industry of Kenya for example, several studies have alluded to poor communication within projects as one of the causes of poor project performance during implementation pointing to a missing link between what constitutes effective communication on one hand and its application in the management of projects on the other hand. This study therefore, sought to investigate communication management in the construction industry of Kenya, with emphasis on its adequacy. A mixed-method design was used consisting of analysis of a questionnaire survey and interviews with subject matter experts. Data was collected from active 95No. (NCA1, NCA2 and NCA3) contractors selected by way of stratified random sampling. A similar approach was also used to select 92No. Consultants with a response rate of 54.73% and 46.73% respectively. In addition, 11No. practitioners were interviewed in the current study. The study established six (6No.) issues that need to be given careful attention when managing communication during projects implementation. The issues in order of importance include; Quality of decision making process (RII=0.900), Change approval procedure (RII=0.835), Quality & frequency of project meetings (RII=0.825), Update of project plans (RII=0.811), Project vision (RII=0.799) and progress reporting system (RII=0.636). The study concludes by compiling views of the practitioners on what they consider good practice in improving communication management practice. The study recommends the use of the good-practice checklist developed for better communication management in projects.

Keywords: Communication, Management, construction industry, good-Practice checklist, Kenya.

I. INTRODUCTION

Communication refers to the transmission of resources (e.g. information and other meanings including ideas, knowledge, specific skills and technology) from one party to another through the use of shared symbols and media. According to Swan *et al.*, (2000) cited in Mungeria (2012), Resources have been regarded as a major component in a network structure and since resources are scarce and competitive, it is not common to share resources amongst organizations. Nevertheless, construction structures enable communication to flow in a free manner. That is, the alliance parties have the right to use all resources that are allocated by individual parties shared amongst them.

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When undertaking a project, the main resources are expertise (including knowledge, technology, information, and specific skills) and capital (i.e. intellectual and financial). According to Yang (2009), a construction project usually requires a variety of skills and technology, and so the involved parties belong to different professional backgrounds. A project consists of several phases including planning, design, construction, and commissioning. The phases are in such a way that they are linked in a specific order from the first to the last. The variety of their expertise is always a source of conflict if communicated improperly. In contrast, complementary expertise can be used to strengthen the competitiveness and construction capability of a partnered relationship if managed effectively. performance targets. From the upshot, for better outcomes in a project, communication management has to be effective. this paper therefore, sought to get the views of the industry practitioners in Kenya on the adequacy of this practice and eventually formulate a good practice checklist to enhance its effectiveness.

II. FACTORS FOR EFFECTIVE COMMUNICATION

In the management of projects, communication plays an important role in leading, integrating people, and taking decisions to make project control process a success. There must be shared project vision, where the project manager identifies the interests of all relevant stakeholders that there is buy-in to the project (Yang, 2009). According to Zwikael (2009), once the project objectives reset and the scope clarified, the project must be constant up dates the project progresses. Progress on activities assigned to individuals or groups needs to be monitored with a view to achieving overall goals. These updates must be communicated to the relevant parties. Newton (2005) believes that a detailed communication plan is necessary for the effective dissemination of information. To this end, quality frequent project meetings are necessary.

2.1 Shared Project Vision

For effective Project Control Process, the project manager has to identify the interests of all stakeholders, and ensure that they buy-in to the project vision (Yang, 2009). In a large project the involves more than four departments, the PM will have to get the project sponsor to assist in selling the project vision.



The project vision has to be communicated with relevant parties on a continuous basis throughout the project life-cycle. A well developed and articulated vision has an immense contribution towards achieving project success (Christenson, 2008). From that point, it can be said the vision creates a collective idea that the project and stakeholders like to aspire to achieve and is necessary for the success of the control process.

2.2 Update of project plans.

Once the project objectives have been set and the scope completed the PM has to commence with the second phase of planning. The project plan is a living document which has to be updated as the project progresses. Zwickau (2009), advises that the PM has to use tools such as the work breakdown structure (WBS) to break down work into activities assignable to specific individuals. From that point alone, it appears special focus must be given to activity definition and project plan development as the rework to be critical planning processes that greatly impact on the control process.

2.3 Quality & Frequency of Project Meetings.

In managing the control process, meetings are a way of communicating, but can turn out to be a waste of time, if not carefully planned. Many authors reviewed under the current study have underscored the need for the PM to formulate a detailed communication plan for the entire project duration. The communication plan has to stipulate the name of the person, "how often" and "what" information must be communicated. Essentially, the PM must communicate with the project team, legitimate stakeholders, the client and project sponsor (Newton, 2005). Frequent communication with relevant parties will ensure that everyone is on the same page as the project progresses. It is therefore important to note that by keeping everyone informed about the project through regular review meetings, issues that can negatively impact on the project are addressed early enough hence enhance effectiveness in the control process.

2.4 Client Consultation.

The "client" is referred to here as anyone who will ultimately be making use of the result of the project, as either a customer outside the company or a department within the organization. The need for client consultation has been found to be increasingly important in the project controls. Indeed, Manley (1975), found that the degree to which clients are personally involved in the implementation process will cause great variation in their support for that project. Further, in the context of the consulting process, Kolb and Frohman (1970), view client consultation as the first stage in a program to implement change.

2.5 Performance appraisal.

Regular performance appraisal is central to the success of the project controls. Performance appraisal refers to the project progress measurement by which at each stage of the project implementation, key personnel receive feedback on how the project is comparing to initial projections (Kongere, 2010). Making allowances for adequate

monitoring and feedback mechanisms gives the project manager the ability to anticipate problems, to oversee corrective measures, and to ensure that no deficiencies are overlooked. Schultz and Levin (1975), demonstrate the evolving nature of implementation and model building paradigms to have reached the state including formal feedback channels between the model builder and the user. From a budgeting perspective, Souder *et al.* (1975), emphasize the importance of constant monitoring and "fine-tuning" of the process of implementation.

III. RESEARCH METHODOLOGY

Structured questionnaire Survey was carried out to collect the data. According to Bryman (2012) questionnaire is the best instrument to use in descriptive research especially where the researcher has undertaken some literature review. In this case, review of literature provided an understanding of the subject of research problem.

The relative importance Index method (RII) was used here to determine the contractors and consultants perceptions of the relative importance of the factors identified that are necessary for pre-construction planning. The index was computed as per equation I below; (Cheung *et al.*, 2004; Lyer and Jha, 2005; Ugwu and Haupt, 2007)

$$RII = \frac{\sum W}{A \times N} \text{Equation I}$$

Where,

- W is the weight given to each factor by the respondents and ranges from 1 to 5
- A = the highest weight = 5
- N = The total number of respondents

Data was collected during the period of May 2015 to July 2015 from among 95 active contractors categories NCA1, NCA2 & NCA3 and 92 practicing consultants operating within Nairobi-County in Kenya. A response rate of 50.8% was achieved which was satisfactory to provide necessary information for the analysis.

Interviews were also conducted in the current study. Most Subject Matter Experts (SMEs) occupied managerial positions and were involved in various construction related activities. More than 64% of SMEs had more than 12 years of experience in their field while another 27% SMEs had more than 20 years. The profile information of the interviewees gives credibility to their opinion and helps to ensure data integrity and reliability.

As shown in table 4.1, the SMEs represent contractors, representatives of professional bodies and professional practitioners in the Kenyan construction industry. The information for profiling of the interviews included; position held in their organizations, professional associations, nature of job and work involvement and years of experience. (Table 4.1)



IV. RESULTS AND DISCUSSION

Table 4.1: Profile of Experts Interviewed

| Interviewees (ID) | Representative organization | Position/Profession | Work Experience (Years) |
|-------------------|-----------------------------------|--------------------------------------|-------------------------|
| SME01 | Real Estate Financial institution | Head of projects Monitoring Section. | 9 Years |
| SME02 | Project Management firm | Projects Manager | 12 Years |
| SME03 | Civil Engineering & Construction | Associate director | 19 Years |
| SME04 | Buildings contractor | Quantity Surveying | 27 Years |
| SME05 | Architectural Firm | Studio director | 13 Years |
| SME06 | Architectural Firm | Director | 23 Years |
| SME07 | Quantity Surveying Firm | Contracts Manager | 10 Years |
| SME08 | Project Management firm | Projects Manager | 6 Years |
| SME09 | Architectural Association | Architect | 13 Years |
| SME10 | Civil construction Company | Civil engineer | 7 Years |
| SME11 | Construction Company | Civil Engineer | 33 Years |

Source: Researcher field findings (2015)

Part A: Results and discussion from Questionnaire Survey

4.1. Results and discussion on factors for Communication management

Table 4.1: The relative Importance Index (RII) and rank of factors related to communication management.

| Project Communication | Contractors (N=52) | | Consultants (N=43) | | All Response | |
|------------------------------------|--------------------|------|--------------------|------|--------------|------|
| | RII | Rank | RII | Rank | RII | Rank |
| Project vision | 0.760 | 5 | 0.839 | 3 | 0.799 | 5 |
| Update of project plans | 0.858 | 2 | 0.765 | 5 | 0.811 | 4 |
| Quality of decision making process | 0.904 | 1 | 0.896 | 1 | 0.900 | 1 |
| Change approval procedures | 0.839 | 3 | 0.832 | 4 | 0.835 | 2 |
| Progress reporting system | 0.672 | 6 | 0.600 | 6 | 0.636 | 6 |
| Frequency of Project Meetings | 0.776 | 4 | 0.874 | 2 | 0.825 | 3 |

Source: Researcher's field survey (2015)

It emerged from the relative importance index and rank of factors Table 4.8 for items constituting project communication, that both contractors and consultants consider quality of decision making process during project implementation key to project control process, both respondent groups ranked this first with RII equal to 0.904 and 0.896 respectively. While Contractors consider regular update of project plans as a second important factor (RII=0.858) in ensuring success in project control, Consultants perceive project meetings most important with RII equal to 0.874, this can be attributed to the fact that

Meetings are areaway of communicating, where any grey area in the implementation of a project can be addressed early enough. It does appear then that the PM has to for muleteer detailed communication plan and schedule of meetings and inspections for the entire project duration and to this end, regular meetings are highly encouraged. Contractors consider change approval procedures as the third most influencing factor with RII equal to 0.839, consultants rank this number four in the order of importance with RII equal to 0.832. Overall, considering contractors and consultants perceptions, the following communication factors in the order of importance were therefore confirmed to influence project control; Quality of decision making process (RII=0.900), Change approval procedures (RII=0.835),Project meetings (RII=0.825), Update of project plans (RII=0.811),Project vision (RII=0.799) and Progress reporting system (RII=0.636).

Part B: Results and discussion from Experts interviews

4.2 Experts views on communication management in Kenya

Interviewees were asked to give their opinion on the adequacy of the current communication practice in the construction industry of Kenya and suggest ways this can be improved to enhance effectiveness in project control process. Real estate finance expert (SME01) and project managers (SME08) and (SME02) were of the opinion that effectiveness of communication in projects varies from project to project and depending on the competency of the team involved. Particularly, Real estate finance expert (SME01) attributes poor communication in projects to poor communication plans. Consequently, he has observed that request for information schedules are not acted in good time leading to unnecessary time overruns in projects. A projects manager (SME08) argues that people in most cases do not take time to read project reports and as a result information being requested is often bypassed leading to unnecessary follow ups. On the contrary, a studio director (SME05) is of the opinion that the problems of communication in projects emanate from poor information tracking by the contractors. He further argues that contractors often receive a lot of information from many quarters and sometimes perhaps they already have the information they are requesting, he gives an example where revised drawings are issued to site but the update of drawings by the contractor is lacking. He therefore advocates for proper information tracking system by the contractors.

A leading civil engineer (SME03), reflects that in most projects, communication has been successful despite a few instances of communication breakdown. According to him, this is as a result of how people handle communication projects. Using an example of attendance to site meetings, he observes that in most projects different people from single firm attend site meetings at various times and where at times new people attending such meetings are not adequately briefed hence discontinuity in information flow.

A buildings contractor (SME04) seems to support this view when he attributes poor communication in projects as a result of laxity among project participants especially on site meetings and issuance of requested project information. These findings conquer with literature analysis particularly Newton (2005), who advocates for regular attendance to site meetings by all project participants. According to him, meetings are a great way of communication but can turn out to be a waste of time, if not properly planned. The project manager should formulate a detailed communication plan and it has to stipulate the name of the person, how often and what information must be communicated. Frequent communication with the relevant parties is encouraged to ensure everyone is on the same page as far as project progress is concerned.

A leading civil contractor (SME11) believes having the right people for the project is the best way to go as far as communication is concerned since, he argues, people often develop fatigue as the project progresses and they therefore slow down response rate to requested information. You can only achieve effective communication by having people who are committed to what they are doing. Similar views are shared by a contracts manager expert (SME07) who points out that despite setting out communication procedures early enough in projects, there is often tendency to plead with project participants to provide requested information leading to wastage of construction time and according to him this is a major concern for projects.

4.3 Preparation of good practice checklist for communication management

In summary, the following key observations were made by the interviewees regarding the current communication management

- Effectiveness in communication is impaired by non-adherence to laid down communication procedures by the project participants.
- Information flow to the contractor especially regarding design change often takes time leading to delays in projects.
- There is laxity among project participants in responding to information requested by the contractor.
- Effective information tracking system by the contractors is lacking in most projects.
- Change order procedures have not been effectively managed in most projects hence a major cause of delay in projects.
- Proper documentation on the side of the contractor is lacking in most projects.
- Project reports are often not read by all project participants, that reports become useful only when there is a dispute.
- Delay in issuing requested information is a common problem in most projects.
- Based on the above interviews with practitioners, suggestions were made on how to improve the communication practice. Below is a compilation of the good practices emerging from the interview experts.

Table 4.2: Good practice checklist for communication management.

| Project communication good practice checklist | | |
|--|----------------|---|
| 15. | A | 20. |
| detailed communication plan for the project should be anchored in the contract with penalty measures for non-adherence. | | Adopt a monthly-evaluation system for information flow particularly on response rate and discuss with all the participants. |
| 16. | Conduct | 21. |
| project workshops prior implementation and /brain storm the details of the communication plan | openly discuss | Where possible maintain project participants throughout the project duration in order to minimize breakdown in information flow and ensure prompt resolution to project issues. |
| 17. | Clearly | 22. |
| stipulate the turn-around time in requests for information and thereof for non-adherence | penalties | Adopt a one-month look a head approach when planning for information requests and maintain a regular due diligence checklist. |
| 18. | Adopt a | 23. |
| short turn-around times for information requested and maintain a regular information requested schedule (RFs). | | Adopt a regular (Weekly) in-house information review meetings for both consultants and contractors to address pending matters in projects. |
| 19. | Devise | 24. |
| appropriate information tracking system for projects with corresponding responsibility matrix and firm delivery times for prompt information flow. | | The contractors should delegate duties of information management to single liaison personnel for prompt action on information flow throughout the project duration |

Source: Researcher`s field survey (2015)

V. CONCLUSION

This article sought to investigate factors for communication management; in addition, the views of the industry practitioners were analyzed with a sharp focus on the adequacy of this practice in the construction industry of Kenya. The findings suggest that there is concurrence between the contractors and consultants on the factors identified and their significance. It emerged that communication management is still not sufficient in the construction industry of Kenya and that information flow to the contractors especially regarding design change and request for information (RFIs) often takes time leading to delays in the project. Based on the findings of this study, it's recommended that projects implementers should design a detailed communication plan for projects and anchor them in contracts with penalty measures for non-adherence. In addition, the industry players should embrace the good practice checklist prepared herein in an effort to better communication management in projects.



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