

Causes of Conflict in the South African Construction Industry

Matthieu Bodika¹, Clinton Aigbavboa¹, Ifije Ohiomah²,
and Nita Sukdeo²

¹Department of Quantity Surveying and Construction Management, South Africa

²Department of Quality and Operations Management, Johannesburg 2092,
South Africa

ABSTRACT

The objective of this research was to determine the causes of dispute and conflict within the South African construction industry. The research begins by looking at the reviewed literature. The data was collected through a questionnaire that was distributed to construction professionals based in South Africa. Ninety-one (91) questionnaires were received from one hundred and twenty (120) sent out, 76 per cent response rate. A mean item score was used to rank the findings. Based on the score ranking from the causes of conflict in the south African construction industry. Design errors as a cause revealed that the cheap design team hired instead of the quality design team was ranked 3,79, followed by an inadequate briefing of the design team which was ranked 3,67, ranked last was inept design team with a rank of 3,47. This study revealed that contract variations are the number one cause of conflict; this is a known fact as the South African construction industry is known to have a problem with a budget overrun. It is recommended that clients must ensure that their demand for design changes during the construction period should have no adverse effects on the critical activities to avoid causing delays

Keywords: Conflict, Dispute, Construction industry, Communication, Project

INTRODUCTION

The construction industry is a project-based activity sector made up of multi-stakeholders. These stakeholder efforts among multiple organisations are in pursuit of various project executions (Dulaimi et al. 2003). Therefore, complexity coupled with the many variants of unforeseen circumstances that may arise during a construction project makes conflict inevitable (Yiu & Cheung 2006; Acharya et al. 2006). The conflicts among construction project clients and contractors are the most prevalent. These conflicts often result in allegations and disputes that destabilize the project, cause enormous economic damage, and even result in expensive litigation (Yiu & Cheung 2006). Conflict can be viewed as a discrepancy between two or more members of organisations or groups within the organisation resulting from the use of scarce funds to be used together, joint operations or other status, objectives, and values (Ranupandoyo & Husnan 1995). Because of several variables, Diekmann et al. (1994) pointed out, a project can be considered successful as

Table 1. Common causes of disputes by categories.

Owners Related	Variations initiated by owners Change of scope Late giving of possession Acceleration Unrealistic expectations
Contractor-related	Delays in payment Delays in work progress Time extensions The financial failure of the contractor The technical inadequacy of the contractor Tendering
Design related	Quality of works Design errors Inadequate/incomplete specifications Quality of design
Contract-related	Availability of information Ambiguous in contract documents Different interpretations of the contract provisions Risk allocations
Human Behavior related	Other contractual problems Adversarial/controversial culture Lack of communication
Project-related	Lack of team spirit Site conditions
External factors	Unforeseen changes Weather Legal and economic factors The fragmented structure of the sector

one of the key factors is how members of a building team address the issues and disputes facing the project. Diekman et al. (1994) found that disputes in a project generate a hostile atmosphere, lead to distrust, and dents the construction process's cooperative nature.

CAUSES OF CONFLICT IN THE CONSTRUCTION INDUSTRY

A significant study has been conducted to determine the causes of the construction industry conflicts. To overview the causes of construction conflicts, a literature review was performed. Several kinds of studies have been analysed from separate nations. Then a table is developed, adapted from Kumaraswamy (1997), which summarises the causes of conflicts that several scientists from distinct nations are determining (Cakmak& Cakmak, 2013). In this context, the prevalent causes of conflicts must be classified. Depending on their nature and mode of occurrence, the causes of conflicts are categorised into seven wide classifications. Therefore, this research selected some of the prevalent causes of conflict for further examination. Communication is one of the foremost causes of conflict. Construction professionals communicate differently Carmicheal (2002) identified some factors that cause

Table 2. Sample human systems integration test parameters. (Folds et al. 2008).

	Cronbach alpha
Design errors	0.866
Contractual claims	0.891
Multiple meanings of specifications	0.785
Delays in payments	0.872
Poor communication	0.876
Contract variations	0.843
Differences in evaluation	0.809
Differing site conditions and limitations	0.870
Errors in project documentation	0.877
Public interruption	0.882
Cultural difference	0.909

conflicts among professionals which are lack of coordination, lack of organization, delay or postponement of tasks, inadequate understanding, and conformity, unwillingness to seek clarification. Verma (1998) states that the most common causes of conflicts are lack of communication, disrespect among professionals, imperfect listening skills and opinion divergence. Gray and Strake (1984) stated some factors that cause conflict include inadequate resources, dependent on other professionals' work activities, diversity of activities, communication issues.

RESEARCH METHODOLOGY

In this study, the random sampling technique was preferred and adopted because it gave all the respondents an equal chance to be selected and all participants were selected with the same criterion which was that the participants of this exercise had to be professionals involved in the construction industry and practising in selected cities in South Africa. After establishing the content validity and preliminary data analysis reliabilities tests were run. Scale reliability is the correlation between two scores ranging from 0 to 1.00 where Cronbach's alpha is the most common form of internal consistency reliability coefficient. The generally agreed-upon lower limit for alpha is 0.70. This procedure is adopted because Devillis (2003) stated that the Cronbach alpha coefficient of a scale should be 0.7 and above. The below shows the reliability of the variables. The study used the mean item score (MIS) to present the findings for the Likert questions. this was based on the principle that respondents' scores on all the selected criteria, considered together, are the empirically determined indices of relative importance. The index of MIS of a particular factor is the sum of respondents' actual scores (on the five-point scale) given by all the respondents as a proportion of the sum of all the maximum possible scores on the five-point scale that all the respondents could give to that criterion. After mathematical computations, the criteria were then ranked in descending order of their mean item score (from the highest to the lowest).

Table 3. Cause of conflict in the South African construction industry.

	Mean	Rankings
Contract variations	3,86	1
Differences in evaluation	3,76	2
Contractual Claims	3,70	3
Poor Communications	3,68	4
Multiple meanings of Specifications	3,67	5
Delay in Payments	3,65	6
Differing site condition and limitations	3,63	7
Design Errors	3,60	8
Public Interruption	3,45	9
Errors in project documents	3,38	10
Cultural differences	2,98	11

Table 3 reveals the pattern at which the respondents, revealed the ranking at which the respondents saw the following that causes conflicts in the construction project.

These findings are consistent with the findings of Stanslaus (2011) who ranked cultural differences as last. But this study disagreed with the ranking of findings from Stanslaus (2011) finding as excessive contract variations was ranked overall first, but in the study of Stanislaus (2011), it ranked third. This was the same with the other factors in this study. From the causes of conflicts in design errors, ranked first was design errors is cheap design hired instead of quality was ranked first as consistent with the findings from Stanslaus (2011).

CONCLUSION & RECOMMENDATIONS

Findings from the literature review are not consistent with findings from other studies, such as the studies from Stanslaus (2011) whereby it only agreed with a cultural difference as the only factor which was consistent with our findings. The client must ensure that their demand for design changes during the construction period should have no adverse effects on the critical activities to avoid causing delays. The design team should ensure that all design changes during the execution of the works are handled explicitly while not compromising the desired outcome of the final project. The limitation of this study is the limitation of the study to the Mpumalanga Province, as time will not permit this study to cover the entire South African geographical area. Further improvements can be made by achieving a larger sample size. This will give a wider understanding of how conflicts are viewed by construction professionals. The use of other analyzing methods such as multiple regression analysis as a means of understanding the relationship between variables from the data received from the questionnaire survey is suggested.

REFERENCES

- Acharya, N., Dai Lee, Y. and Man Im, H. (2006), "Conflicting factors in construction projects: Korean perspective", *Engineering, Construction and Architectural Management*, Vol. 13 No. 6, pp. 543–566. <https://doi.org/10.1108/09699980610712364>
- Cakmak, P.I. & Cakmak, E. (2013). An analysis of causes of disputes in the construction industry analytical hierarchy process (AHP). *AEI. ASCE*. 93-101
- Carmicheal, G.D. (2002). *Disputes and international projects*. CRC Press. Central
- Chong, S. (2011). *Conflict Management*. Retrieved May 12-10-2012, 2012, From <http://knol.google.com/k/conflict-management>
- De Vellis, R. F. (2003). *Scale Development: Theory and Applications* (2nd ed., Vol. 26). Thousand Oaks, CA: Sage Publications.
- Diekmann, J.E., Girard, M.J. & Abdul-Hadi, N. (1994). *Dispute Potential Index: A Study into the Predictability of Contract Disputes*, Construction Industry Institute, Boulder, CO.
- Dulaimi, M. F., Ling, Y.Y. and Bajracharya, A. (2003) Organizational motivation and inter-organizational interaction in construction innovation in Singapore. *Construction Management and Economics*, 21, 307-318
- Gray, J.L and Strake, F.A. (1991). *Organizational Behavior-Concepts and Applications* (3rd Ed.) Columbus Bell and Howell Company, (1984) Hanson, E.M. *Educational Administration and Organizational Behavior* (3rd ed), Boston: Allynard Bacon
- Kumaraswamy, M. (1997), "Conflicts, claims and disputes in construction", *Engineering, Construction and Architectural Management*, Vol. 4 No. 2, pp. 95–111. <https://doi.org/10.1108/eb021042>
- Ranupandjojo, H, and Husnan, S.(1994),*Manajemen Personalia*, BPEE, Yogyakarta.
- Stanslaus K.N (2011), *Conflicts in Building Projects in Tanzania "Analysis of Causes and Management Approaches"*, Building and Real Estate Economics, Department of Real Estate and Construction Management Royal Institute of Technology (KTHTRITA – FOB – PHD 2011:2 ISBN 978-91-978692-4-9
- Verma, V.K. (1998). *Conflict management*. Retrieved from <http://www.iei.liu.se/pie/olssonrune/material/attkommaigang/1.309206/confliManagementVer.pdf>
- Yiu, K.T. W., Cheung, S.O. (2006). A catastrophe model of construction conflict behaviour. *Building and Environment*, 41, 438–447. <http://dx.doi.org/10.1016/j.buildenv.2005.01.007>.