

Mediating influence of Individual Commitment and Social Networks on the relationship between Project Communication and Perceived Project Performance: A Structural Equation Modelling Approach

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Abstract

Purpose – The purpose of this paper is to examine the mediating effects of individual commitment and social networks on the relationship between project communication and perceived project performance. Many citizenship projects frequently fail to deliver on time, budget, specifications, and quality or do not deliver value to the public. This could be attributed to ineffective project communication, lack of individual commitment and inadequate social networks.

Design/methodology/approach—A theoretical model and hypotheses are developed from literature review. A cross sectional data set collected from 322 project stakeholders from Uganda is used to validate the model.

Findings – Structural Equation Modelling results reveal that individual commitment and social networks mediate the relationship between project communication and perceived project performance. The results also suggest that social networks elements have a stronger influence towards project performance than individual commitment elements.

Research limitations/implications – The study focuses on behavioural constructs as predictors of perceived project performance. Although these constructs are robust and sufficiently represent the human aspects, the multidimensional nature of behavioural practises can be investigated further. Similarly, since perceived project performance is contextual and evolutionary, additional constructs may be incorporated into the validated model.

Practical implications—The findings suggest that individual commitment and social networks are mediators of project communication and perceived project performance. Managers of citizenship projects need to create social networks with their stakeholders to increase perceived project performance. Similarly, there is need to enhance individual commitment that increases the likelihood of perceived project performance.

Originality/value—Many classical studies are reported in different domains involving these constructs; however no existing empirical study focuses on how they are linked together. This is the first paper to investigate and systemically document the mediating effects on this relationship.

Keywords Project Communication, Perceived Project Performance, Mediation

Paper type Research paper

INTRODUCTION

Globally, many organisations have adopted project management as a means to achieve their strategic objectives. Similarly, in most developing countries, many commercial banks have devised citizenship projects as a competitive strategy to improve organisational performance (Hopkins, 2007; McDonald & Rundle-Thiele, 2008). Citizenship projects are those projects aimed at making a difference in one's community, society and country (Drucker, 1993). Many commercial banks are becoming more involved in activities like improving education, public health, fighting poverty, rehabilitation and fighting social injustices. (Barclay's sustainability review report, 2011). The assumption is that superior firm performance is associated with the success of citizenship projects (Hopkins, 2007; Scott, 2007). Despite the increased involvement of commercial banks in citizenship projects in sub-Saharan Africa like Uganda, anecdotal evidence shockingly reveals that over 70% of Citizenship projects fall short of the expected quality, fail to boost bank awareness, are cost overrun and are completed behind schedule (Stanbic Bank Uganda, 2009; Barclay's bank-Uganda, 2007). This possibly could be attributed to ineffective project communication (Ramsing, 2009; Ruuska, 1996), inadequate social networks (Andrews, 2007; Downes, 2005; Granovater, 1973) and lack of individual commitment to such projects (Meyer & Allen, 1997).

There is a need to ensure that citizenship projects that commercial banks fund meet their expectations. While most previous studies have attempted to examine the predictors of perceived project performance using models from what may be referred to as developed world contexts (e.g. Cho & Cao, 2008; Misra et al., 2009; Raed & Cavana, 2012), no research has been done in Sub-Saharan Africa to corroborate these findings. Most of the research is still speculative, anecdotal and scanty. This paper therefore examines the mediating effects of individual commitment and social networks between project communication and perceived project performance. The rest of this article is organised as follow: The next section reviews the literature on the key concepts to develop hypotheses and a conceptual framework. In section 3, methodology is described and in section 4,

findings, implications, limitations, and future research are discussed.

LITERATURE REVIEW

Project Communication and Individual Commitment

Project communication refers to information exchanges intended to create understanding among project stakeholders (Ruuska, 1996). On the other hand, individual commitment is the willingness by an individual to devote energy and loyalty to a project as expressed in three forms: affective, continuance, and normative (Meyer & Allen, 1997). The net sum of a person's commitment to a project reflects each of these separable psychological states (Meyer & Allen, 1997). Affective commitment is an individual's emotional attachment with (i.e., identification with and involvement in) the project. Continuance commitment refers to the individual's recognition of the benefits of continued association with the project compared to the perceived cost of leaving the project. Normative commitment refers to the employee's feeling of obligation to remain in the project. All three forms of commitment affect the individual's willingness to remain with a project and his or her work-related behaviour.

Many studies have revealed that project communication and individual commitment are critical factors for project success (Chow & Cao, 2008; Ntayi et al., 2011; Raed & Cavana, 2012). Oliver's (1980) cognitive and affective theory suggests that when a manager or team member with a high need for self-esteem, volunteers to work on a project and communicates his intentions to associate within the project, he emotionally gets attached to ensuring the project succeeds. This is because he derives satisfaction from the success of philanthropic engagements. This implies that effective project communication creates a feeling of responsibility and attachment between stakeholders and the project tasks that makes one feel indebted to the project, thereby creating an atmosphere for individual team members to act without much control and coercion. Under such circumstances, what drives a person to work is the emotional attachment to the project as fostered through communication. Therefore:

H1. There is a positive relationship between project communication and individual commitment to the project.

Individual Commitment and Perceived Project Performance

A project is usually defined as "a temporary endeavour undertaken to create a unique product, service, or result" (PMI, 2008, p. 5). Projects undergo a series of stages that include initiation, planning, controlling, implementation, and closing processes (PMI, 2008). Project performance is the completion of the project according to desired specifications, within the specified budget, scope, and time schedule while keeping the customer and other stakeholders happy (Cella et al., 2007). However, Ika (2009) Jugdvev and Muller (2005) argue that project success has been defined and measured differently in the literature. Truly, Pinto and Slevin (1988) had earlier acknowledged three aspects of project success as the implementation process, the perceived value of the project, and client satisfaction with the delivered project outcome. Shenhar et al. (1997) suggest two additional measures: business success and preparing for the future. However, empirical results by Lipovetsky et al. (1997) indicate that the importance of the latter measurement is all but negligible.

Individual commitment influences project performance (Cho & Coa, 2008; Raed & Cavana, 2012). Committed project members more often do not have intentions to quit (Addae et al., 2006). This saves the project the costs of recruiting and orienting new members in terms of both time and money. Similarly, costs of supervision are mitigated if the project members are committed to their project tasks. It follows that where project stakeholders are joyful about the project's success, the investing bank's public image will blossom, as in the case of citizenship projects run by commercial banks. Thus:

H2. There is a positive relationship between individual commitment to the project and perceived project performance.

Project Communication and Social Networks

Social networks are a collection of individuals linked together by a set of relations (Downes, 2005, p. 411). Entities in a network are called nodes and the connections between them are called ties (Downes, 2005). According to Fowler et al. (2009), social networks can be essentially expressed in terms of degree and transitivity. Social network degree is the number of social ties the project has. On the other hand, network transitivity refers to the likelihood that two of a person's contacts are connected to each other.

According to Ruuska (1996), project communication creates and facilitates networks between the various stakeholders of the project together and also the project to its environment, uniting its activities at different levels of development. Ntayi et al. (2010) argue that the strength of the linkage (relationship) grows through a history of communication interactions in which members of a network develop friendship and trust. This implies that stronger relations in a network are fostered through effective project communication over time. Therefore, effective communication with the project stakeholders over time raises the quantity of social ties and the clustering coefficient both directly and indirectly. Therefore:

H3. There is a positive relationship between project communication and social networks.

Social Networks and Perceived Project Performance

Social networking is perceived as a useful means of achieving intended social targets like providing social support (Neergard et al., 2005). Social support is pertinent during implementation given that every project success is characterized by the need to beat deadlines, which usually puts pressure on the project team. Therefore social networks provide the shared maintenance necessary to calm high stress levels and enable achievement of not only timely but also quality outputs (Hogg & Adamic, 2004). Similarly, social networks act as a vehicle for quickly and easily getting the project message to the intended audience, thereby enhancing project awareness and the organization's public image at large (Hogg & Adamic, 2004). Additionally, Burt (2001) reveals that social networks provide access to timely information and referrals to others in the network. Moreover, networks create perceived fairness in exchanges, thereby reducing transaction costs in the form of less detailed contracts and less restrictive clauses with stakeholders (Hoang & Antoncic, 2003). Thus:

H4. There is a positive relationship between social networks and perceived project performance.

Further, when H1, H2, H3 and H4 are connected together in the theoretical model shown in figure 1, there shows a need to investigate the mediating role of the individual commitment and social network elements existing between project communication and perceived project performance. However, whether this mediation role is full or partial deserves more attention. Therefore:

H5. Individual commitment elements mediate the relationship between project communication and perceived project performance.

H6. Social network elements mediate the relationship between project communication and perceived project performance.

Figure 1 demonstrates the theoretical model of relationships between project communication, individual commitment, social network and perceived project performance.

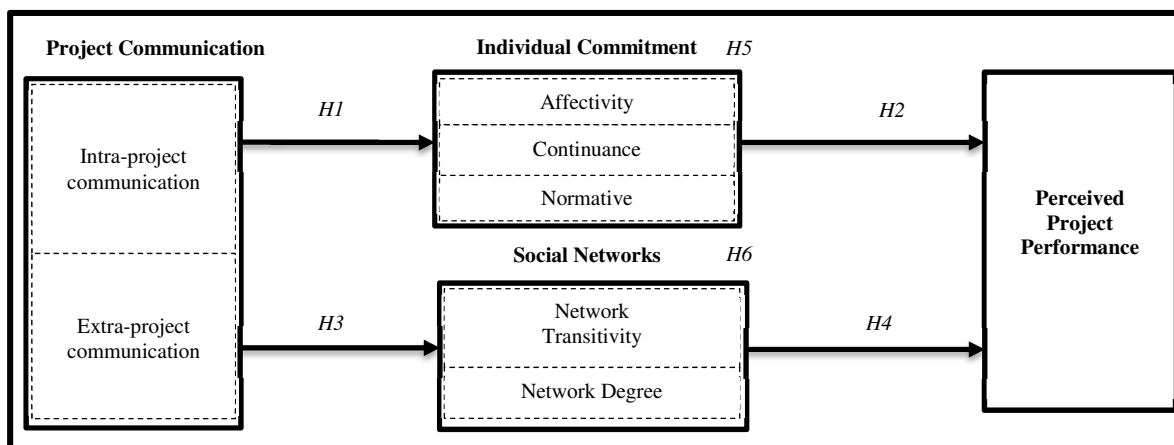


Figure 1: Theoretical model

METHODOLOGY

Survey design

Each construct was measured by at least three questions that were relevant in terms of established theory. The survey questions were brief and to the point, addressed only a single issue at a time and avoided phrases that could elicit socially acceptable responses. A well-designed cover letter was included that explained the purpose and intended use of survey data and promised anonymity of both respondent and company in the reporting. Survey questions captured the perceptions of stakeholders about citizenship projects for which they are expected to be the most knowledgeable. Perceptual measures are frequently used in project management research since they can parallel objective data in accuracy, and cogent arguments have been advanced for using the managers as the key informant for questions regarding the performance of projects within the organization. However, when using single informants, it is desirable to select the most experienced and knowledgeable person. By virtue of their roles, stakeholders are knowledgeable about the progress and benefits of projects. To reduce the possibility of single-informant bias that might result from exaggeration and self-promotion and to encourage participation, the respondents were advised that results would be completely anonymous.

Measures and Operationalization

Project communication was measured using an abridged version of Goldhaber and Rogers' (1979) Communication Audit Survey (CAS) questionnaire. In assessing the level of individual commitment, an

abridged version of the employee Organizational Commitment Questionnaire (OCQ), as developed by Meyer and Allen (1997) was modified. Social networks were measured using a combination of the network degree and network transitivity (Fowler et al., 2009; Rosenthal, 2007, p. 293). Perceived project performance was measured using an amalgam of the research measures used by Pinto and Slevin (1988) and Shenhar et al. (1997) and the competence areas defined in A Guide to the Project Management Body of Knowledge (PMBOK Guide) (PMI, 2008). All the responses in the questionnaire were anchored on a 5-point Likert scale of strongly disagree (1), disagree (2), not sure (3), agree (4), and strongly agree (5).

Survey piloting and validation

The self-administered questionnaire was first piloted on business management professors from Makerere University, Kampala, a major research university in Uganda. Among these, four professors had worked on citizenship projects in Sub-Saharan-Africa for a remarkable time of longer than four years and had widespread experience with this topic. The scales were also pilot-tested using 45 citizenship projects and yielded a 98% response rate. Based on these responses and comments, item scales that were unclear and ambiguous were either improved or deleted.

Sampling Procedure and Sample Size

The population consisted of 125 citizenship projects conducted by at least 23 commercial banks in Sub-Saharan Africa which are based in Uganda (Bank of Uganda, 2011). Simple random sampling method was adopted and the 125 citizenship projects were written down on small pieces of paper and mixed in a box; then 92 of them were randomly picked in accordance with Krejcie and Morgan (1970). This method of sampling gives an equal chance to each project in the sampling frame that was chosen. From each selected bank, at least three project managers, two of whom were from any two conveniently selected branches of the bank and one was from the bank's head office, were sampled. Five employees from each of the bank branches were purposively targeted. Similarly, at least 5 beneficiaries for each project were targeted. This finally added up to a total of 392 target respondents. The inclusion and exclusion criteria were that where a person was picked and found not to have participated in the selected projects, he/she was discarded from the data and replaced with the next convenient person. The responses were 322 usable questionnaires representing an 82% response rate.

Descriptive statistics

The results showed that 54% of respondents had been involved in the execution of citizenship projects for a period of 3 to 6 years; 6.4% and 1.7% had spent 7 to 10 and more than 10 years, respectively. The findings further indicated that most of these projects have existed for about 3 to 6 years (48.8%), less than 3 years (43.6%), or more than 10 years (2.9%). The majority of respondents were females (51.7%), which could imply that more females take up citizenship activities than their male counterparts. A majority of these respondents were either married (52%) or single (46%), with those in the age bracket of 20 to 30 years representing 73.3%. Of the respondents, 72.7% had attained at least a bachelor's degree, and 4% and 15% had masters and professional qualifications, respectively. Regarding the positions held in the execution of citizenship projects by individual respondents, a majority (78.5%) of them revealed that they were team members, while 10.5% were project managers and 4.1% were project beneficiaries. The project types included the categories of health (31.7%), education (19%), environment (11.1%), economic (25.4%), and rehabilitation (12.7%).

DATA ANALYSIS AND FINDINGS

Structural Equation Modelling (SEM) was used in tracing structural relations (Joreskog & Sorbom, 1989). The approach chosen was to separate analysis of the measurement and structural models in a two-step process recommended by Anderson and Gerbing (1988). This allows refinement of measures before testing of the structural model and is consistent with previous studies (Byrne, 2001; Kearns & Sabherwal, 2007). In the first phase, a measurement model was used to measure the fit between the theorized model and observed variables and to establish reliability and validity. In the second phase, results of the measurement model were used to create a structural model in order to measure the strength of the theorized relationships.

Since this study took a confirmatory rather than exploratory approach, the total sample (N=322) was split into two samples (calibration sample (N=161) on which the initially hypothesised model was tested and validation sample (N=161) for testing the validity of its structure) to allow cross-validation of findings (Byrne, 2001, p.249).

The measurement model

Confirmatory Factor Analysis (CFA) was adopted for examining construct validity by assessing how well individual items represent the construct. All eight constructs demonstrated a good model fit when subjected to Hu and Bentler's (1999) criteria and Rigdon's (1996) criteria. The standardised factor loading of each item in all

eight constructs was above .50 hence acceptable (Hair et al., 2009). In addition, all the factor loadings were significant, indicated by their corresponding T-values above 2 (Jung et al., 2008). Following guidelines by Fornell and Larcker (1981), squared correlations values were then calculated for each construct and exceeded 0.25. Similarly, the variance extracted for each of the eight constructs exceeded the suggested threshold of 0.50, indicating that the variance captured by a construct was larger than the variance due to measurement errors (Anderson & Gerbing, 1988). Hence, the construct and discriminant validities of the eight constructs were established.

The reliability analysis was conducted by calculating the Cronbach's alpha coefficient for each construct. The results showed that the Cronbach's alpha measures for all eight constructs well exceeded the recommended critical point of 0.70 (Hair et al., 2009), indicating good internal-consistency reliability.

Table 1 demonstrates the results of construct validity and reliability tests for the eight constructs.

Table 1: Construct validity and reliability

Constructs and final Items	Std loadings	T value	R square	Cronbach coefficient
<i>Intra-project communication</i>				
Am satisfied with the amount of information I receive from my supervisor(s)	.715	10.06	.511	.86
The language we use in our correspondences is familiar to all team members	.705	9.88	.496	
I like the channels that we use to share information amongst team members	.799	11.83	.638	
Informal communication amongst team members is usually active	.779	11.39	.606	
New Information usually circulates amongst project team members in time	.742	10.52	.551	
<i>Extra-project communication</i>				
Our external stakeholders are reliably informed of the progress of our citizenship projects	.722	10.09	.521	.80
Our external stakeholders like the way we communicate with them	.815	11.92	.667	
We have always maintained timely communications with external stakeholders	.817	11.91	.397	
<i>Affectivity commitment</i>				
I am willing to exert more effort to guarantee successful execution of citizenship activities	.630	8.37	.749	.87
I find that my personal values and those of citizenship projects are very similar	.865	13.15	.551	
I feel like part of the family of the citizenship project teams	.742	10.48	.551	
I feel emotionally attached to citizenship projects	.654	8.88	.427	
<i>Continuance commitment</i>				
It would be too costly for me to quit citizenship activities right now	.794	11.20	.630	.84
My life would be upset if I decided not to engage in citizenship activities	.834	11.92	.696	
It would be very hard for me to abandon citizenship activities even if I wanted to	.723	9.73	.522	
I think no other activities can match the benefits that citizenship activities present to me	.688	9.17	.473	
<i>Normative commitment</i>				
I would feel guilty to abscond from taking part in citizenship activities	.623	8.02	.389	.82
I feel I have an obligation to keep performing citizenship activities	.780	10.87	.608	
I have a sense of obligation to the recipients of citizenship projects	.820	11.56	.672	
I owe a great deal to citizenship projects	.589	7.51	.347	
<i>Network degree</i>				
This bank's top management strongly supports citizenship activities	.698	9.43	.487	.80
We trust that many societies are in support of our citizenship projects	.810	11.66	.656	
Through citizenship activities, we have improved the lives of many citizens	.678	9.070	.460	

Many members of the general public know much about our citizenship projects	.743	10.34	.552	
Network transitivity				
I think that the beneficiaries of our citizenship projects become our advocates	.620	7.726	.384	.84
I believe that many consumer groups are pleased with our citizenship projects	.877	12.70	.768	
Community leaders have always welcomed our citizenship projects	.686	8.82	.471	
In my view, our citizenship activities are liked by people of diverse interests	.663	8.32	.439	
Perceived project performance				
In my view many of our customers are aware of our citizenship activities	.801	11.01	.641	.90
I think that many people have known about this bank through its citizenship activities	.675	8.58	.456	
Our citizenship projects have greatly improved the livelihood of many individuals	.586	7.10	.343	
I am satisfied with the outcomes of the citizenship activities this bank has undertaken	.808	11.06	.653	
We do not doubt the quality of our services to the community	.748	9.80	.560	
To a great extent, the citizenship activities we undertake meet our expectations	.697	8.83	.486	
Our citizenship Project team is always committed to beating set deadlines	.744	9.70	.554	
We usually provide necessary information to project stakeholders in time	.767	10.16	.589	
Our project activities from initiation to closure are always timely	.735	9.44	.540	

Common method bias and non-response bias

Common method bias was addressed in three ways; first, using the strategies to ameliorate the problems of self-reports data. Second, Harman's one factor test was used (Podsakoff et al, 2003). No single factor emerged or one general factor accounted for most of the variance implying that no substantial common method variance was present. Finally, CFA approach was used to test a model positing that a single factor underlies the study variables. The model exhibited a poorer fit as compared to the initial and final measurement models suggesting that common method variance was not a problem. Non response bias was established in T-tests by comparing the average values for each of the constructs for the first quartile completed questionnaires received versus the last quartile completed questionnaires (Kearns & Sabherwal., 2007). Mean differences for each of the constructs did not reveal any significant difference between the early and late questionnaires (2-tailed *t*-tests, $p < 0.05$). This comparative test depicted the absence of non-response bias in this study.

The structural model

The final structural model accounts for 85.2% of the variation in perceived project performance. Thus, the model is very successful in accounting for a substantial portion of the variability in perceived project performance. The final structural model with path coefficients is shown in Figure 2. The goodness of fit results indicate that the model fits the data very well ($\chi^2=1169.79$, $df=614$, $\chi^2/df= 1.91$, $p>0.05$), the other fit indices also suggested a good fit to the model (CFI=.93, TLI=.92, RMSR=0.07, RMSEA=.06, AASR=0.05) (Byrne 2001). Figure 2 illustrates the final structural model and standardised path coefficients.

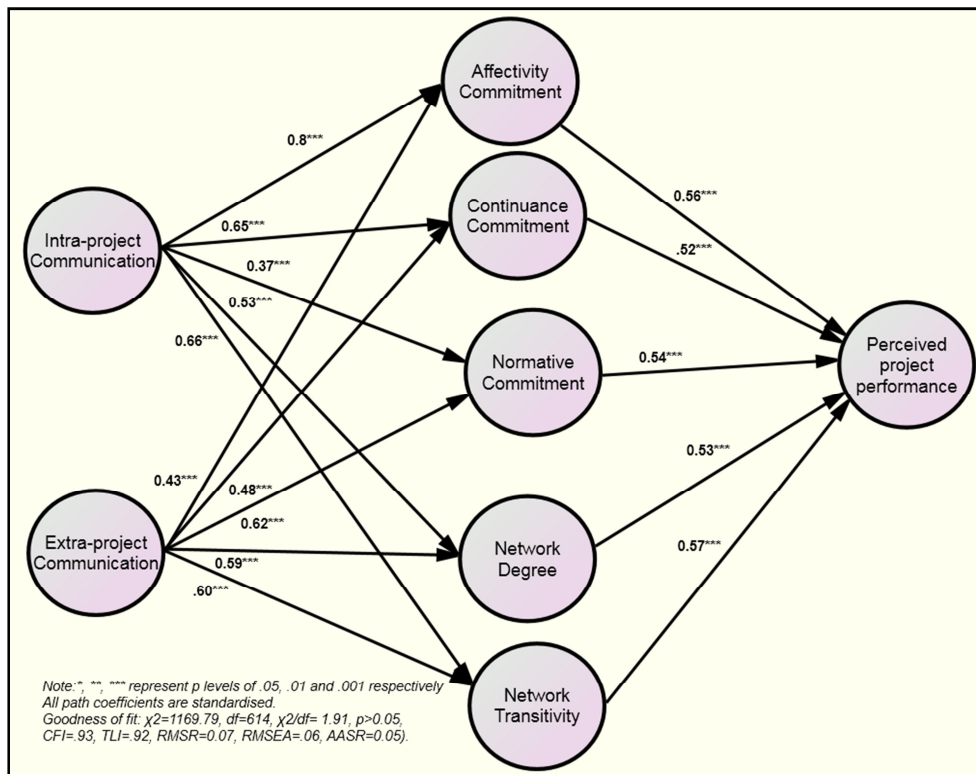


Figure 2: Final structural model

Hypotheses testing

The results of hypothesis testing support *H1*, *H2*, *H3* and *H4*. To further examine whether project communication strategies have direct effects on perceived project performance in addition to the full mediation via project commitment and social network elements, a competing model was developed. The initial model was modified by adding two direct paths from intra-project communication and extra-project communication to perceived project performance. The modified competing model is presented in Figure 3.

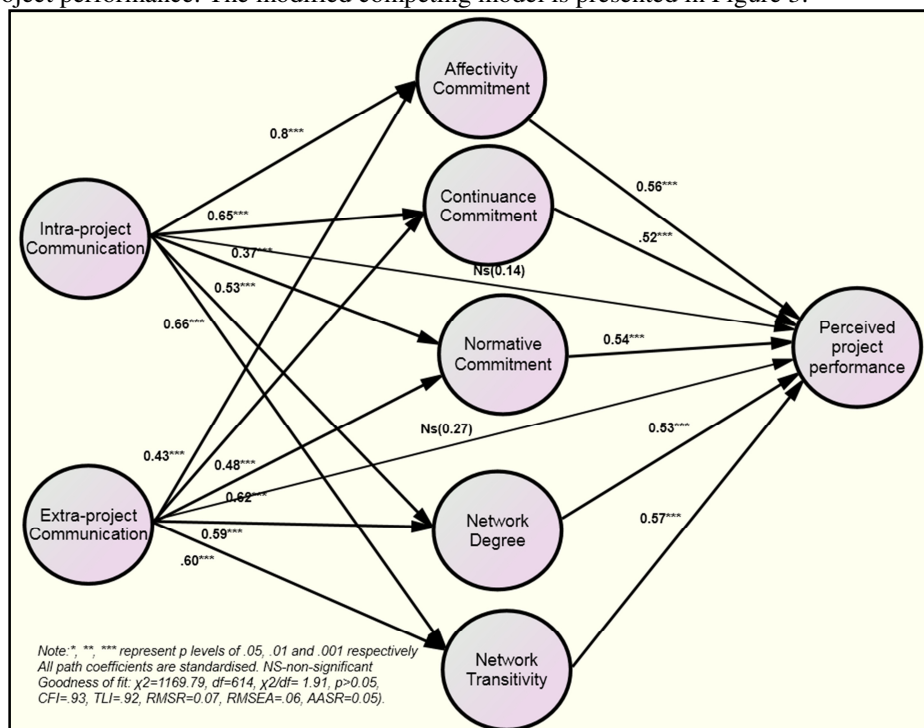


Figure 3: Competing model

As depicted in Figure 3, the overall model fit indices for the competing model were: $\chi^2=1169.79$, $df=614$, $\chi^2/df=1.91$, $p>0.05$, $CFI=.93$, $TLI=.92$, $RMSR=0.07$, $RMSEA=.06$, $AASR=0.05$). Thus, all model fit measures show similar values to those of the initial model. As noted, project communication has non-significant effects on perceived project performance. Subsequently, it can be concluded that the social network elements and continuance commitment elements fully mediate the relationship between project communication and perceived project performance. Other relationships being identical to the initial model, the non-significant relationships between the two project communication variables and perceived project performance suggest a higher nomological validity of the initial model, indicating the superiority of the initial model over the competing model.

DISCUSSION

As initially hypothesised, results reveal that individual commitment and social networks are mediators of project communication and perceived project performance. Thus the final model without such structural relations is supported as presented in Figure 2. Project communication is positively related to all the three individual commitment elements. This means that effective project communication creates a feeling of responsibility and attachment between a stakeholder and the project tasks that makes one indebted to the project thereby creating an atmosphere for individual team members to act without much control and coercion. This is consistent with Ntayi et al (2010) findings that workers with positive attitude about the task carry out certain role behaviors well beyond the basic minimum levels required of them. The emotional attachment to the project drives a person to work as influenced by communication. Similarly, these results concur with Yammarino and Naughton (1988) study that found a positive relationship between amount of time spent communicating and the level of effort expended by each project team member on execution of tasks.

The results further revealed that project communication positively associates with social networks. This indicates that where project managers listen to other stakeholders and incorporate their views in the decisions they implement, over time, many stakeholders are likely to be propelled to act as the bank's advocates and may be depended on by the bank as marketing agents. These findings are in agreement with those of Granovater (1973) and Herkt (2007) who showed that reinforced relationships overtime become dependable. Furthermore, the findings support the fact that project communication determines the extent to which a particular project wins the collective support and efforts of team members which is in line with Jugdvev & Muller (2005).

The results also imply that efforts to promote effective communications lead to strengthening of the relationships that exist amongst stakeholders. These findings are in agreement with those of Hogg and Adamic (2004) who argue that social networks act as a vehicle for quickly and easily getting the project message to intended audience thereby enhancing awareness and the banks' public image at large. The findings also revealed that social networks provide the shared maintenance necessary to calm down high stress levels and enable achievement of not only timely but quality outputs. These findings also reflect studies by Pinto (2000) who argued that there is a need to develop a network of other experts who can be called upon for assistance.

The results further indicate that project communication does not directly influence perceived project success. This means that project communication must work through social networks in order to achieve significant influence on project performance. It should be noted that social network elements have a stronger positive and significant effect on perceived project performance than the commitment elements. This study therefore makes a significant contribution by concluding that social networks and individual commitment fully mediate the relationship between project communication and perceived project performance. This means that projects need social networks and individual commitment to achieve their goals successfully in addition to project communication.

Implications

Unless project sponsors and champions ensure that other project stakeholders have been provided with and are satisfied with the availed project information, the efforts (both financial and otherwise) invested into citizenship projects could be fruitless. In the same vein, where project supervisors are not as attentive to their subordinates' views and no appropriate avenues have been designated to capture feedback from implementers and beneficiaries of the project, there will be a high likelihood of chances of failure of citizenship projects. The project managers in charge of citizenship projects in commercial banks ought to ensure commitment of project staff to achievement of objects by creating an atmosphere of feeling like they are part of the family of the project implementation team. This could be through fulfilling the promises that top management sets forth. In this way, the various stakeholders involved in implementation are likely to perceive the project as a success. This study extends the research frontiers in understanding the role of interpersonal factors (project communication, individual commitment and social networks) in perceived project performance. Despite many studies in project success very few have focused on the role of interpersonal factors and yet as indicated by findings these factors play a significant role. Projects are about managing expectations that have to do with perceptions of success.

When researchers are conceptualizing and building theories they should not ignore interpersonal factors.

Limitations and future research

Although the study provides some interesting findings and makes an important contribution in project management literature, there are latent limitations worth noting. The study used behavioural constructs which originated from the literature review of commonly cited 'soft' factors in the project management literature. Although the three constructs are robust and sufficiently represent the behavioural aspects, the multidimensional nature of behavioural practises in perceived project performance can be investigated further. Further, since the future of project management practises go through evolution, additional 'soft' factors may be incorporated into the validated model.

The data collection instrument was a standard questionnaire which usually limits the ability to collect views about information outside asked question. Similarly, the study used a cross sectional research design, the behaviours of the variables over a long time could not be completely analysed and this restricts the applicability of the findings as a longitudinal study may give different results from the ones that were obtained. Future researcher should employ a bigger sample involving other stakeholders like the regulators, customers, local population, among others. This is so because the study only captured the perceptions of bank staff that had taken part in executing citizenship projects and was intended to justify the continued investment in citizenship projects by commercial banks yet accommodation of various stakeholders could give a different view. Despite the diagnostic statistical testes for common methods bias, it still remains a potential threat. The future studies should try to obtain measurements of the independent and dependent variables from different sources and at different times. Conclusively this study results suggest that the social network and individual commitment fully mediate the relationship between project communication and perceived project performance.

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REFERENCES

- Addae, H.M., Parboteeah, K.P. and Davis, E.E. (2006), "Organizational commitment and intentions to quit", *International Journal of Organizational Analysis*, Vol. 14 No. 3, pp. 225-238.
- Anderson, J. C. and Gerbing, D. W. (1988), "Structural equation modelling in practice: A review and recommended two-step approach", *Psychol. Bull.*, Vol. 103 No.3, pp.411-423.
- Andrews, R. (2007), "Organizational social capital and public service performance". Presentation at the 9th Public Management Research Conference, University Of Arizona, Tucson, USA.
- Barclay's bank-Uganda sustainability review report 2011.
- Bank of Uganda Annual report 2010/2011.
- Bentler, P. M. (1990), "Comparative fit indexes in structural models", *Psychology Bulletin*, Vol.107 No. 2, pp.238-246.
- Burt, R.S. (2001), *Bandwidth and echo: trust, information and gossip in social networks: Integrating the study of networks and markets*, New York: Russell Sage Foundation.
- Byrne, B.N. (2001), *Structural Equation Modeling with AMOS: Basic Concepts, Applications and Programming*, Rahwah, NJ Lawrence Erlbaum.
- Chow, T. and Cao, D. (2008), "A survey of critical success factors in agile software projects", *The Journal of Systems and Software*, Vol.81 No.6, pp.961-971.
- Downes, S. (2005), "Semantic networks and social networks", *The Learning Organization*, Vol.12 No.5, pp.11-417.
- Drucker, P.F. (1993), *Post-Capitalist Society*, Butterworth-Heinemann, Oxford.
- Fornell C. and Larcker, D. F. (1981), "Evaluating structural equation models with unobservable variables and measurement errors", *Journal of Marketing Research*, Vol.18 No.1, pp.39-50.
- Fowler, J., Dawes, C., and Christakis, N. (2009), "Model of genetic variation in human social Networks", *Annual Review of Sociology*, Vol.106 No.6, pp. 1720-1724.
- Gakovic, A. and Tetrick, L.E. (2003), "Psychological contract breach as a source of strain for Employees", *Journal of Business and Psychology*, Vol.18 No.2 , pp.235-46.
- Granovetter, M., S. (1973), "The Strength of Weak Ties", *American Journal of Sociology*, Vol. 78 No.6, pp. 1360-1380.
- Goldhaber, G.M. (1979), *Organizational Communication*, Wm. C. Brown Company Publishers, Dubuque, IA.
- Hair, J.F., Black, W.C., Babin, B.J. and Anderson, R.E (2009), *Multivariate Data Analysis* (7th Ed.). Englewood Cliffs, NJ: Prentice Hall
- Herkt, M. (2007), "What is in it for us?" *PM Network*, Vol. 21 No. 3).
- Hoang, A. and Antoncic, B. (2003), "Network-based research in entrepreneurship: A Critical Review", *Journal of Business Venturing*, Vol.18 No.2 , pp. 165-87.
- Hopkins, M. (2007), *Corporate Social Responsibility & International Development*, London: Earthscan.
- Jugdvev, K. and Muller, R. (2005), "A retrospective look at our understanding of project Success", *Project Management Journal*, Vol.36 No.4, pp. 19-31 .
- Joreskog, K. G. and Sorbom, D, (1989). *LISREL 7: "A Guide to the Program and Applications"*, 2nd ed. Chicago, IL: SPSS.

- Jung, Y.J., Wang, J.W. and Wu, S. (2008), "Competitive strategy, TQM practice, and continuous improvement of international project management: A Contingency Study", *International Journal of Quality and Reliability Management*, Vol. 26 No.2, pp. 161-183.
- Kearns, G.,S. and Sabherwal,R. (2007), "Antecedents and consequences of information systems planning intergration", *IEEE Transactions on Engineering Management*, Vol.54 No.4 , pp.628-643.
- Lievens, A. and Moenaert, R.K. (2000), "Communication flows during financial service Innovation", *European Journal of Marketing* , Vol.34 No.9/10 , pp.1078-1110.
- Ika, L. (2009), "Project success as a topic in project management journals", *Project Management Journal*, Vol.40 No.4 , pp.6-19.
- Lipovetsky, S., Tishler, A., Dvir, D. and Shenhar, A. (1997), "The relative importance of project success dimensions", *R&D Management*, Vol27. No.2, pp.97-106.
- McDonald, M. L. and Rundle-Thiele, S. (2008), "Corporate social responsibility and bank customer satisfaction", *International Journal of Bank Marketing*, Vol.26 No.3 , pp.170-182.
- Meyer, J. P. and Allen, N. J. (1997), "*Commitment in the workplace: Theory, research, and Application*", Thousand Oaks, CA: Sage.
- Misra, S. C., Kumar, V. and Kumar, U. (2009), "Identifying some important success factors in adopting agile software development practices", *Journal of Systems and Software*, Vol.82 No.11 , pp.1869-1890.
- Nangoli, S., (2010), "Project communication, individual commitment, social networks and perceived project performance", Unpublished Master thesis report: Graduate Research centre, Makerere University Business School.
- Ntayi, J. M., Rooks, G., Eyaa, S. and Qian, C. (2010), "Perceived project value, opportunistic behaviour, interorganisational cooperation, and contractor performance", *Journal of African Business*, Vol.11 No.1 , pp.124-141.
- Oliver, R.L. (1980), "A cognitive model of the antecedents and consequences of satisfaction decisions", *Journal of Marketing Research*, Vol.17 No.4, pp.460-9.
- Ofori, D.F. and Hinson, R.E. (2007), "Corporate social responsibility (CSR) perspectives of leading firms in Ghana", *The journal of corporate governance*, Vol.7 No.2 , pp.178.
- Pinto, J.K. (2000), "Understanding the role of politics in successful project management", *International Journal of Project Management*, Vol.18 , pp.85-91.
- Pinto, J. K. and Slevin, D. P. (1988), "Critical success factors across the project life cycle", *Project Management Journal*, Vol.19 No.3, pp.67-75.
- PMI. (2008), "*A Guide to the Project Management Body of Knowledge (PMBOK Guide) (4th ed.)*", Project Management Institute.
- Podsakoff, P. M., Mackenzie, S. B., Lee, J. and Podsakoff, N. P. (2003), "Common methods biases in behavioral research: A critical review of the literature and recommended remedies", *Journal of applied Psychology*, Vol.88 No.5, pp.879-903.
- Raed, S. A. M, M. and Cavana, Y.B. (2012), "Applying the Viable System Model to ICT Project Management", *International Journal of Applied Systemic Studies*, 4(3):186-205.
- Ramsing, L. (2009), "Project communication in a strategic internal perspective", *Corporate Communications: An International Journal* , Vol.14 No. 3, pp.345-357.
- Rigdon, E.E. (1996), "CFI versus RMSEA: A comparison of two fit indices for structural equation modelling", *Structural Equation Modeling*, Vol.3 No.1, pp.369-79.
- Riketta, M. (2002), "Attitudinal organizational commitment and job performance: A meta-Analysis", *Journal of Organizational Behavior*, Vol.23 , pp.257-66.
- Rosenthal, E. (2007), "Social networks and team performance", *Team Performance Management journal*,3(4), 288-294. Vol.3 No.4 , pp.288-294.
- Ruuska, K. (1996), "Project Communication", *IPMA 96 World Congress on Project Management – Paris, France*, pp.67-76.
- Scott, J. (2000), "*Social Network Analysis: A handbook*", Second edition. London: Sage.
- Scott, S. (2007), "Corporate social responsibility and the fetter of profitability". *Social Responsibility Journal*, Vol.3 No.4 , pp.31-39.
- Stanbic Bank Uganda Annual report 2009.
- Yammarino, F.J. and Naughton, T.J. (1988), "Time spent communicating: a multiple levels of analysis approach", *Human Relations*, Vol.41 No.9, pp.655-76.
- Zhong, Y. and Low, S.P. (2009), "Managing crisis response communication in construction projects – from a complexity perspective", *Disaster Prevention and Management*, Vol.18 No.3, pp.270-282.

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