Creative Construction Conference 2019, CCC 2019, 29 June - 2 July
2019, Budapest, Hungary

Construction experts' perceptions on the influence of emotional intelligence on leadership development.

Liphadzi, M^a, Aigbavboa, CO^b, Thwala, WD^c, Kwofie, T^d

a,b,c,d SARCHI in Sustainable Construction Management and Leadership in the Built Environment, Faculty of Engineering and the Built Environment, University of Johannesburg, 2006, South Africa.

Abstract

Notwithstanding the significance of leadership within organisations and social settings, there seems to be less information about the influence of emotional intelligence on leadership development in the construction industry. The purpose of the research was to establish the influence of emotional intelligence on leadership and leadership development in the construction industry. The ongoing leadership challenge in the construction industry seeks research to determine the importance of emotional intelligence in leading teams. The research launched with an extensive review of literature in order to identify the core and sub-variables which embodies emotional intelligence and leadership for leadership development. A three iterative round Delphi technique was conducted to attain consensus of the identified emotional intelligence indicators. A list of experts was generated from peer-reviewed conference proceedings and industry executives. The rating of the influence was rated between low influence and very high influence. Data collected were analysed using Microsoft Excel, a spreadsheet software. The results indicated that emotional intelligence is essential and those that seek to think critically should show a different characteristics of emotional intelligence. The study contributes to the literature and empirical research underpinning on emotional intelligence in the construction industry.

© 2019 The Authors. Published by Budapest University of Technology and Economics & Diamond Congress Ltd.

Peer-review under responsibility of the scientific committee of the Creative Construction Conference 2019.

Keywords: Construction industry; Emotional Intelligence; Construction Industry

1. Introduction

Leadership is defined as the ability to continually deliver superior performance to the benefit of oneself and the organisation. Likewise, given the current construction business context, Charlton [1] deems emotional competencies vital for organisational success. Research on emotional intelligence (EI) in the outlook of leadership has remained a recurring area of interest for more than ten years [2]. Further research has been done concerning leaders' emotional expression in the workplace and the way leadership styles impact on the emotional welfare of employees while developing organisational commitment, proactive behaviour and job performance [3].

Leadership has always been difficult in the changing times, and in the face of such occurrences people look for organisational leaders with integrity, character and can provide direction. Moreover, people who are unable to maintain a degree of control over their emotional life and fight inner battles might have a challenge in providing direction to the

followers [4]. Nevertheless, ongoing debate continues regarding the contribution of EI to our understanding of leadership [5]. Thus, this study focuses on evaluating the influence of emotional intelligence and its sub-variables on leadership development.

2. Leadership

In the midst of many authors Bass [6] defines leadership as an intentional influence by one person over others. Antonakis [5] defines it as a process of organisational influence intertwined with different relationships. Much of the existing leadership studies places emphasis that leadership is the ability to adapt to different situations. Much more to the construction industry, project leaders amount for everything that happens within a project, making it vital for them to understand leadership and its constructs. Moreover, if one word were to define construction management, it would be responsibility. Skipper [7], stated that a leader should always guide followers towards organisational goals. Numerous others have characterized leadership as far as practices, qualities, skills and results of leaders. Stephen Covey has his seven habits for successful people and eight attributes of focused leaders [8]. Bass further distinguishes leadership as a learnable arrangement of practices [9]. These various and uncertain meanings of leadership suggest that leadership can appear to be unique in various circumstances. No one definition is right or superior to the next. Leadership is influenced by various factors and can be seen from a wide range of points of view.

Furthermore, it is important to note that the context of leadership in this article is in the construction industry, and we can define leadership in this setting, as leaders and managers in charge of a construction sites' progress and its success. Project leaders are responsible for all that happens in a project. Moreover, it is also evident that the industry has a greater urgency for leadership than arguably any other industry. Many reasons support this notion, and it is evident by looking at the construction projects, and the constructed products [10].

3. Emotional Intelligence

There has been numerous definitions of Emotional Intelligence (EI) [11] [12] and they all share a similar theoretical foundation, which comprises of awareness of one's own emotions; and awareness of emotions in others; and understanding of emotions and the ability to manage all emotions. The two noticeable models of emotional intelligence incorporate an ability-based model [13] and a skill-based model [14], which differ in their conceptual method toward the application of EI. The ability-based model centres on EI according to intelligence theory, emphasising the cognitive fundamentals of EI and using a performance-based assessment method known as the Mayer- Salovey-Caruso Intelligence Test (MSCEIT). The skills-based model is trait-based and encompasses a broader set of competencies [14]. In this framework, Bar-On [11] defines EI as being a cross-section of interrelated emotional and social competencies, skills, factors and facilitators that determine how effectively we understand and express ourselves, understand others and relate with them and cope with their daily demands [15].

Emotional intelligence discourses the emotional, personal, social and survival extents of intelligence, which are vital for daily cognitive practices. EI elaborates an understanding of self and others. Goleman's dimensions of emotional intelligence include;

Self-awareness: The ability to be aware of which emotions, moods, including impulses one is experiencing, and why. This dimension is also indicative of an individual's awareness of the effects his or her feelings have on others.

Self-regulation: The ability to maintain one's own emotions and impulses and to remain calm and composed in volatile situations, irrespective of one's emotions.

Motivation: The ability to remain focused on goals, despite setbacks. This dimension also indicates an individual who can operate from hope for success rather than a fear of failure.

Empathy: A person's ability to understand the feelings conveyed through verbal and non-verbal messages and providing emotional support when needed.

Social skills: The ability of individuals to handle problems without demeaning others who work with them'. This dimension 'also includes the ability to refrain from letting one's negative feelings towards another individual inhibit collaboration, and to handle conflict with tact and diplomacy.

4. Methodology

The methodology section gives a detail of methodology used to determine the influence of emotional intelligence for leadership development. A Delphi survey was conducted among 14 experts (academics and built environment professionals and business owners) in South Africa. A Delphi study is a group decision mechanism requiring qualified experts who have a deep understanding of the issues at hand [16]. Each expert was required to meet some of the following criteria:

Knowledge: Knows construction management and project management; knowledgeable in leadership research, knowledgeable in the field of management theory. Academic Qualification: Has an earned degree (National Diploma/B-Degree/M-degree/PhD) related to any field. Post-doctoral, training, certification employment and experience focusing on sustainable development issues, psychology, construction management, project management and social sciences. Experience: Has a history or currently is performing consultation and contracting services within the construction industry, individuals, businesses, agencies, companies, and organisations, related to construction and infrastructure context. The experts must exhibit a high degree of knowledge of experience in the subject matter and an extensive theoretical knowledge thereof. Research: Has submitted one or more proposals to or has received research funding (grant/contract) from national, provincial, local government, regional, and private sources that support housing development and studies for the low-income group or other human settlement-related issues. Membership: Be a member of a professional body. Should be the representative of a professional body so that their opinions may be adaptable or transferable to the population. Finally, Willingness: Panel members must be willing to participate in the entire Delphi study fully.

The recommendations of Rowe et al. [17] were adopted for the current study, whereby they stated that the number of respondents should be large enough to ensure that all perspectives are represented, but not so large as to analyse the results unmanageable by the researcher [18]. Five of these criteria items were considered than the customarily recommended two. Experts were required to be in managerial positions and also have an understanding of leadership development. The initial Delphi survey was made up of 20 experts comprising academics and construction professionals who were randomly selected based on the criteria. The experts applied their knowledge on the concept raised in the study, based on the criteria developed in the questionnaire. From the 20 experts invited to participate in the Delphi survey, 14 responded and completed all the three rounds. This number of experts was considered adequate based on the literature recommendations from scholars who have previously employed the technique. [18] suggested that since most studies incorporate between 8 and 16 experts, eight experts are reasonable. Experts were asked to rate the impact factors influencing emotional intelligence for leadership development in the construction industry as shown in table 1. Data obtained from the survey were analysed with Microsoft Excel spreadsheet software. The output from the analysis was a set of descriptive statistics.

5. Findings

Findings from the Delphi survey shows the (13) listed emotional intelligence measurement variables, that were identified by the experts as influencing leadership development. When assessed, findings revealed 12 measurement variables to have reached consensus with IQD cut off ($IQD \leq 1$) score (See table 1). 8 variables managed to reach the median score of 7, which implied a very high impact (HI: 7-8.99). One variable managed to reach a median score of 9 which implied a very high impact (VHI: 9-10).

Table 1. Emotional Intelligence Attributes

Table 1: Emotional Intelligence Attributes	Median	Mean	SD	IQD
Ability to think critically	9	9,14	0,36	0,00
Emotional resilience skills	8	7,71	0,83	0,00
Ability to manage distressing emotions	8	7,93	0,27	0,00
Ability to manage personal fears	8	7,79	0,58	0,00
Ability to know what motivates your employees	8	7,93	0,62	0,00

Self-management features	7	7,14	0,53	0,00
Social awareness features	7	7,07	0,47	0,00
Relationship management features	7	7,07	0,83	0,00
Social judgement skills	7	7,00	0,68	0,00
Ability to understand feelings of team members	7	6,93	0,62	0,00
Ability to listen to moods and emotions of team members	7	7,00	0,68	0,00
Ability to distinguish amongst feelings of team members	7	7,00	0,68	0,00
Self-awareness features	6	6,57	0,76	1,00

SD = Standard deviation; IQD = Interquartile deviation

Results from the survey revealed that the following 13 emotional intelligence measurement variables were considered by the experts to have varying impact on leadership development in the construction industry.

- Self-awareness features (MI)
- Self-management features (HI)
- Social awareness features (HI)
- Relationship management features (HI)
- Social judgement skills (HI)
- Emotional resilience skills (HI)
- Ability to understand feelings of team members (HI)
- Ability to listen to moods and emotions of team members (HI)
- Ability to distinguish amongst feelings of team members (HI)
- Ability to manage distressing emotions (HI)
- Ability to manage personal fears (HI)
- Ability to know what motivates your employees (HI)
- Ability to think critically (VHI)

From the impact ratings of the factors; findings revealed that 12 of the factors had high impact, while only one had a very high impact.

6. Discussion of findings

This section presents the discussions of the findings from the Delphi survey on the impact of emotional intelligence variables on leadership development in the construction industry. Findings revealed greater influence in the ability to think critically as vital and this corresponds with the findings by [1]. Further findings revealed the need for social awareness features which concurs with findings by [10,11,12]. This however calls the need for leadership training in this regard.

7. Conclusion and Recommendations

The purpose of the study was to determine the impact of emotional intelligence on leadership development in the construction industry. Findings revealed that the ability to think critically as a leader is of importance to leadership development. It is recommended that institutions should start introducing leadership education and training programs that can help instil the critical elements of emotional intelligence in the construction industry.

8. References

- [1] Charlton, G. (1993). *Leadership: The human race*. South Africa: Juta and Co, Ltd.
- [2] Malao, M. 2011. *Delivery of infrastructure development through Public partnerships*. Thesis, North West University, North West
- [3] Goleman, D. (1998). *Working with emotional intelligence*. New York: Bantam.
- [4] Goleman, D. (1995). *Emotional intelligence*. New York: Bantam.
- [5] Antonakis, J., Ashkanasy, N.M., & Dasborough, M.T. (2009). Does leadership need emotional intelligence? *The Leadership Quarterly*, 20.

- [6] Bass, B.M. (1981). *Leadership, psychology, and organisational behaviour*. New York: Harper.
- [7] Skipper, C. O., & Bell, L. C. (2006). Influences Impacting Leadership Development. *Journal of Management in Engineering*, ASCE, 22 (2), 68-74 [https://doi.org/10.1061/\(ASCE\)0742-597X\(2006\)22:2\(68\)](https://doi.org/10.1061/(ASCE)0742-597X(2006)22:2(68))
- [8] Covey, S. R. (2012). *The Seven Habits of Highly Effective People: Powerful Lessons in Personal Change*. (pp. 63–309). New York: Fireside.
- [9] Bass, B.M. (1990). *Bass and Stogdill's handbook of leadership*. New York: Free Press.
- [10] Havenga, R. (2002). The new leadership challenge: Teaming principles with practices in times of change. *Management Today*.
- [11] Bar-On, R. (2000). Emotional and social intelligence: Insights from the emotional inventory. In R. Bar-On & J.D.A. Parker (Eds.), *Handbook of emotional intelligence: Theory, development, assessment, and application on at home, school and in the workplace* (pp. 363–388). San Francisco: Jossey-Bass Inc.
- [12] Goleman, D., Boyatzis, R., & McKee, A. (2002) *The new leaders. Transforming the art of leadership into the science of results*. London: Time Warner Books.
- [13] Mayer, J.D., & Warner, R.M. (2004). Emotional intelligence and its relation to everyday behaviour. *Personality and Individual Differences*, 36, 1387–1402.
- [14] Cooper, D (2012). *Leaders and Managers. In leadership for follower commitment*. Abingdon Oxon: Routledge
- [15] Cooper, R., & Sawaf, A. (1997). *Executive EQ ^ emotional intelligence in business*. United Kingdom: Orion Publishing Group.
- [16] Okoli, C. & Pawlowski, S. (2004). The Delphi method as a research tool: An example, design considerations and applications. *Information Management*, 42:15-29. <https://doi.org/10.1016/j.im.2003.11.002>
- [17] Rowe, G., Wright, G. & Bolger, F. (1991). Delphi - A re-evaluation of research and theory. *Technological forecasting and social change*, 39:238-251. [https://doi.org/10.1016/0040-1625\(91\)90039-I](https://doi.org/10.1016/0040-1625(91)90039-I)
- [18] Creswell, J. W. (2014). *Research design: Qualitative, quantitative and mixed methods approaches*. 4th ed. Sage Publications.
- [19] Ciarrochi, J.P. Forgas, & J.D. Mayer (Eds.), *Emotional intelligence and everyday life* (pp. 27–50). New York: Psychology Press.
- [20] Bracke, M.A., & Geher, G. (2006). Measuring emotional intelligence: Paradigm diversity and common ground. In J.
- [21] Linstone, A. & Turoff, M. (1975). *The Delphi method: techniques and applications* Reading, MA: Addison-Wesley.