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The effects of leadership skills on firm performance: The case of textile and garment firms in Vietnam

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C H R O N I C L E

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A B S T R A C T

Leaders are essential for the survival and development of businesses and they can affect and inspire employees, colleagues and other people to dedicate to the company. Among factors associated with leaders, leadership skills are considered as the most important characteristics because leadership skills are the abilities to perform tasks, transform knowledge into leaders' actions and demonstrate the leadership's expertise when applying the acquired knowledge in practices to achieve desired performance. This article focuses on studying the effects of leadership skills on the performance of Vietnamese textile and garment companies, which is one of the most important industries of this developing country. To achieve the objectives of this study, this article uses quantitative approach with various statistical techniques; namely, Cronbach's Alpha, EFA and CFA, SEM to analyze the primary data with SPSS and AMOS software and to test the hypotheses. The results show that strategic skills had the greatest impacts on the performance of Vietnamese textile and garment enterprises followed by interpersonal and business skills. Cognitive skills had the weakest effects on the performance of Vietnamese textile and garment enterprises. Thus, to enhance performance, leaders should improve and develop these skills. This study does not show possible differences in gender, age, experience and position of leader in this relationship, which is considered as the limitation of the survey. Leadership skills affect positively the performance of Vietnamese textile and garment enterprises. The order of the most influencing factors are: strategic skills, interpersonal skills, business skills, and cognitive skills.

1. Introduction

Leaders are indispensable people in any business and they perform leadership functions in the business, run company, determine goals, orient operation and plan the vision of the company. Leaders can affect, inspire employees, colleagues and other people to dedicate to the company. Besides, leaders are those who have great influence on individuals and organizations outside the company to ensure that the goals can be achieved. Among factors belonged with leaders, leadership skills are considered the most important, because leadership skills can contribute to the leaders' abilities (Mumford et al., 2007), impact leaders' behaviors, effectiveness and performance (Campbell, 1977; Connelly et al., 2000; Mumford et

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al., 2000, 2007), contribute greatly to creativity and innovation in organizational settings, and finally, help leaders who are coping with complex environments and contribute to team performance.
Because of their great importance, issues of leadership skills have attracted many scholars. Regarding research content, leadership skills associated studies can be divided into two groups. The first group is exploratory researches to identify important skills that a person will pursue as a leader or an informal leader in the group (Katz 1955; Lord et al., 1986; Stogdill, 1974; Mumford et al., 2000; Moore & Rudd, 2004; Mumford et al., 2007; Da'as, 2017). The other is associated with the relationship between leadership skills and leadership effectiveness in the current management position of leaders (Kehinde et al., 2012; Connelly et al., 2000). About research fields, leadership skill studies are conducted in a variety of areas, such as the military (Zaccaro et al., 2000); education (Kalargyrou et al., 2012; Da'as, 2016; Zilz et al., 2004; Robbins et al., 200; Kehinde, et al., 2012), public services (Haq, 2011), etc.

In Vietnam, most studies on leadership focused on leadership competences and styles. A few authors study the personal traits, the role and other issues such as the relationship between three-dimensional leadership and business performance in Vietnam. Direct researches on leadership skills include PhD thesis on leadership development in non-state enterprises of Vietnam conducted by Trang (2016) and the article on leadership skills of the directors at a regional university in Vietnam posted at the 7th International Education Reform Conference (ICER 2014) of Hung et al. (2014). Through competences studies (ASK model), Do Anh Duc (2014) and Le Thi Phuong Thao (2016) showed that leadership skills could influence on performance in Vietnam SMEs in different locations, however these studies did not clarify this relationship in various industries.

Textile and garment industry is one of the key industries of this country. According to Le Hong Thuan (2017), Vietnam's textile and garment industry has been developing strongly, and plays an important role in the growth process of the national economy, therefore, the performance of textile and garment enterprises is always one of the most concerned issues. This article focuses on studying the effects of leadership skills on the performance of Vietnamese textile and garment companies.

2. Theoretical framework

There are many different definitions of leadership (Yukl, 2013). Leadership is the influent relationship between leaders and followers to implement current change (Rost, 1993), leadership is the ability to influence, motivate, and enable others to contribute toward the effectiveness and success of the organization (House et al., 1999), leadership is the process of influencing others to understand and agree about what needs to be done and how to do it, and the process of facilitating individual and collective efforts to accomplish shared objectives (Yukl, 2013). Most leadership definitions involve an influence process, and it is very difficult to settle on a single definition of leadership that is general enough to accommodate these many meanings and specific enough to serve as an operationalization of the variable (Karmel, 1978). This article uses the definition of Yukl (2013) to study and the terms leader, manager are used interchangeably to indicate people who occupy positions in which they are expected to perform the leadership roles.

Skill is an ambiguous and complex concept. Skills encompass mental and physical proficiency, as well as physical dexterity. Skill is not only the ability to do something but the word implies a dimension of increasing ability (Attewell, 1990; Eagly et al., 1995). According to the Society for Human Resource Management (2008), skills are the ability to perform an activity that contributes to the effective performance of a job task. The term skill refers to the ability to do something in an effective manner, and may be defined at different levels of abstraction, ranging from general, broadly – defined abilities to narrower, more specific abilities (Yulk, 2013). Leadership skills in this paper mean leaders' skills and they are the abilities to do something in an effective manner to perform the leadership role.

Based on observations of executives at work and field research in administration, Katz (1955) identified three categories of skills needed by leaders, including technical skills, human skills, and conceptual skills. Technical skills include knowledge about methods, processes, procedures, and techniques for conducting a specialized activity, and the ability to use tools and relevant equipment. Technical skills also include knowledge about the organization and their products and services. Human skills include knowledge about human behaviors and interpersonal processes, ability to understand feeling, attitudes, and motives of others from what they say and do, ability to communicate clearly and effectively, and ability to establish effective and cooperative relationships. Conceptual skills involve general analytical abilities, logical thinking, proficiency in concept formation and conceptualization of complex and ambiguous relationships, creativity in idea generation and problem solving, ability to analyze events and perceive trends, anticipate changes and recognize opportunities and potential problems. Technical skills are more important for junior leaders, conceptual skills are more important for senior leaders and human skills are needed for all leaders.

Mumford et al. (2000) suggested that leaders need problem solving skills and social judgment skills, but to effectively apply these skills leaders need to have knowledge about works, organization, business and human knowledge. In addition, Mumford et al. (2000) also found that individual characteristics of leadership such as integrated thinking ability, cognitive thinking ability, motivation and personality of leaders influence leadership skills and knowledge. Mumford et al. (2000) emphasize that the skills, knowledge, and personal characteristics of the leader will be governed by the professional experience of the leader, and environmental factors.

The Strataplex model of Mumford et al. (2007), based on previous conceptualizations of leadership skill requirements, suggested leadership in terms of four general skills: cognitive skills, interpersonal skills, business skills, and strategic skills. Cognitive skills are the foundation of the leadership skill requirements and related to basic cognitive capacities, such as collecting, processing, disseminating information, learning, and are the fundamental skills required for a large portion of the activities in which leaders are engaged. Interpersonal skills involve social perceptiveness to allow for an awareness of other's reactions and understanding of why they react the way they do, also includes the skills required for coordination of actions of oneself and other, and negotiation skills to reconcile differences among employee perspectives and establish mutually satisfying relationships, and persuasion skills to influence other to more effectively accomplish organizational objectives. Business skills involve the management of material resources, operations analysis, personnel resources and financial resources. Strategic skills are high conceptual skills needed to take a systems perspective to understand complexity and deal with ambiguity in organization.

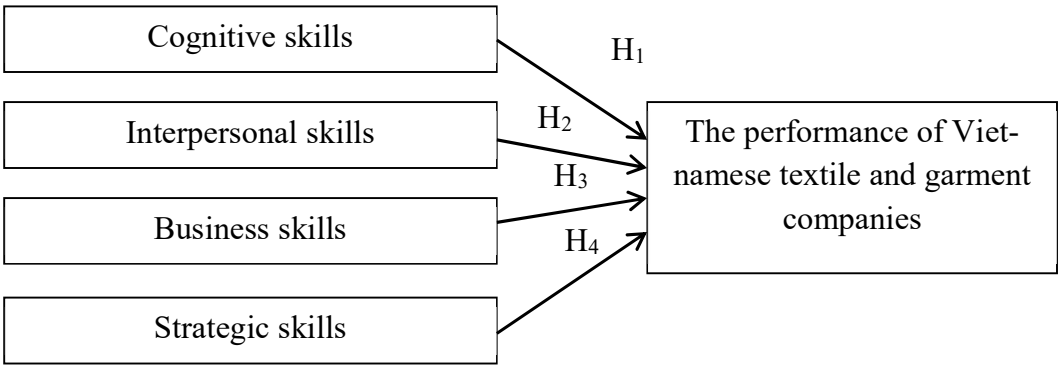

Fig. 1. The effects of leadership skills on the performance of Vietnamese textile and garment companies

These include the skills of visioning, systems perception, identification of downstream consequences and identification of key causes, problem identification, solution appraisal and objective evaluation. Compared with previous models, the leadership skills model of Mumford et al. (2007) was built in 2007 based on synthesizing and analyzing previous leadership skills models. This model is used popularly in recent years and evaluates clearly the leadership skills. So this study uses this model to evaluate the effects of leadership skills on the performance in Vietnamese textile and garment companies.

Hypothesis 1: Cognitive skills of leaders influence on the performance of Vietnamese textile and garment companies.
Hypothesis 2: Interpersonal skills of leaders influence on the performance of Vietnamese textile and garment companies.
Hypothesis 3: Business skills of leaders influence on the performance of Vietnamese textile and garment companies.
Hypothesis 4: Strategic skills of leaders influence on the performance of Vietnamese textile and garment companies.

3. Methodology

3.1. Sample and data collection

Data are collected directly and indirectly through questionnaires. This study is conducted out in two stage, pilot study and official study. In pilot study stage, this study interviewed 30 leaders working at textile and garment companies to get preliminary assessment. After adjusting and adding "lead time" item to measure performance according to opinion of leaders, the official study stage is conducted. The sample consisted of 476 leaders working at textile and garment companies located in many different provinces in Vietnam. These leaders have differences in gender (270 male and 206 female leaders), age (101 leaders under 30 years old, 150 leaders from 30 to under 40 years old, 152 leaders from 40 to under 50 years old, and 73 leaders from 50 years old), position (75 senior, 236 mid, and 165 junior level leaders), and experience years as leader job (166 leaders under 5 experience years, 192 leaders from 5 to under 10 experience years, and 118 leaders from 10 experience years).

3.2. Measures

This study is based on the Mumford et al. (2007) measurement which is based on the Occupational Information Network (O*NET) scales developed by the US department of Labor to assess leadership skills at the Vietnamese textile and garment companies. After that, the study adjusted and separated some observed variables to suit the situation of Vietnamese companies. This article uses balanced scorecard of Kaplan and Norton (1993) to measure the performance of Vietnamese textile and garment companies. Since the balanced scorecard has the balance between short-term and long–term objectives; between desired outcomes and performance drivers of those outcomes; and between hard objective measures and softer, more subjective measures. Four perspectives include financial, customer, internal business process, learning and growth. The items were ranked on a 5 – degree Likert scale describing the self – assessment of leaders of the abilities to do the tasks and agreements with the companies' performance.

3.3. Data analysis

The article used Cronbach's Alpha, Exploratory Factor Analysis (EFA) and Confirmatory Factor Analysis (CFA) to assess the leadership skills and performance measurement, and used structural equation modeling (SEM) to analyze the effects of leadership skills on the performance of Vietnamese textile and garment companies. The reliability of the scale is accepted when Cronbach Alpha ≥ 0.60 and the total correlation coefficient ≥ 0.30 (Nunnally & Bernstein, 1994). In EFA test, the article uses the Principal axis factoring method with Promax rotation, with stops when extracting elements with eigenvalue ≥ 1. The scale is acceptable when KMO is from 0.5 to 1, Bartlett's test with a significance level ≤ 0.05, the

total variance is ≥ 50%, load factors is ≥ 0.4 (Anderson & Gerbing, 1988). For CFA and SEM tests, the article accepts the value of the chi-square test with P-value <0.05; TLI, CFI, GFI≥ 0.9, AGFI ≥ 0.8 (Bentler & Bonett 1980); CMIN/df < 2 or possibly <3 (McIver & Carmines 1981); and RMSEA<0.08 (Steiger 1990), CR>0.6, AVE>0.5, convergence validity and discriminant validity are available. Data was input and analyzed by using SPSS and AMOS version 20 software program.

4. Results

4.1. Cronbach's Alpha reliability test

The first Cronbach's Alpha test shows that the item–total correlations of Cog 3 item is 0.280, this item is not valid, and so is removed. The second Cronbach's Alpha test after removing Cog3 item shows that the Cronbach's Alpha values are 0.859 for cognitive skills; 0.812 for interpersonal skills; 0.875 for business skills; 0.882 for strategic skills; 0.755 for financial perspective; 0.876 for customer perspective; 0.750 for internal business process; and 0.852 for learning and growth perspective. The result shows that the item–total correlation of all items are larger than 0.55.

EFA test

EFA analysis shows that KMO= 0.930; Bartlett's Test of Sphericity with Sig = 0.000, Eigen values = 54.902%, the pattern matrix of EFA test is showed detail in Table 1.

Table 1
EFA test

	1	2	3	4	5	6	7	8
Str6	0.799							
Str5	0.772							
Str7	0.760							
Str4	0.701							
Str2	0.670							
Str1	0.565							
Str3	0.562							
Bus4		0.878						
Bus3		0.750						
Bus6		0.713						
Bus1		0.689						
Bus2		0.677						
Bus5		0.661						
Cog2			0.810					
Cog1			0.799					
Cog5			0.734					
Cog6			0.671					
Cog4			0.643					
Cog7			0.617					
Cus5				0.866				
Cus3				0.854				
Cus1				0.749				
Cus2				0.678				
Cus4				0.644				
Lea2					0.816			
Lea4					0.754			
Lea3					0.711			
Lea1					0.690			
Per2						0.771		
Per3						0.704		
Per1						0.687		
Per4						0.623		
Ino2							0.757	
Ino1							0.716	
Ino3							0.678	
Fin2								0.731
Fin1								0.705
Fin3								0.668
KMO	**0.930**							
Bartlett's Test	**Approx. Chi-Square =8866.753; df = 703; Sig = 0.000**							

(Source: SPSS outputs)

CFA test

The first CFA analysis shows that p – value of the Chi–square test =0.000, CMIN/DF =1.562, TLI =0.953, CFI =0.957, GFI =0.899, AGFI =0.882, RMSEA =0.034. GFI indicator is 0.899, so the model is improved by linking the remainder e23 and e24. The result of the second CFA analysis show that p – value of the chi – square test =0.000, CMIN/DF =1.492; TLI =0.959, CFI =0.963, GFI =0.903, AGFI =0.887, RMSEA =0.032. P – Value of convergent Validity <0.01; Standardized Regression Weights **>**0.6**;** P-value of discriminant validity <0.01; CR >0.8 and AVE >0.5 (details are showed in Table 2).

Table 2
CR and AVE for constructs

Construct	CR	AVE
Cognitive skills	0.862	0.510
Interpersonal skills	0.812	0.519
Business skills	0.876	0.541
Strategic skills	0.882	0.517
Financial perspective	0.754	0.506
Customer perspective	0.878	0.592
Internal business process	0.757	0.510
Learning and growth	0.853	0.592

(Source: SPSS outputs)

Fig. 2 shows the CFA test result.

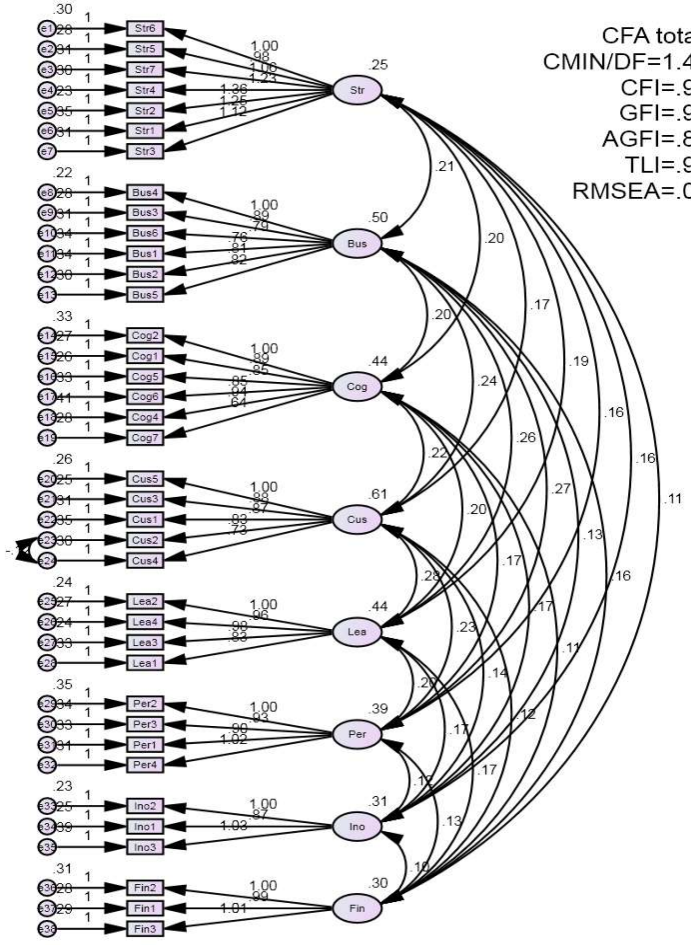

Fig. 2. Confirmation Factor Analysis test

The results show that the suggested model is appropriate for collected data and can be used to assess leadership skills and performance of Vietnamese textile and garment companies.

SEM test

The first SEM analysis shows that p – value of the Chi–Square test =0.000, CMIN/DF =1.521, TLI =0.956, CFI =0.960, GFI =0.899, AGFI =0.885, RMSEA =0.033. GFI indicator is 0.899, so the model is improved by linking the remainder e9 and e12. The second SEM analysis showed that p – value of the chi – square test =0.000, CMIN/DF =1.497; TLI =0.959, CFI =0.962, GFI =0.901, AGFI =0.887, RMSEA =0.032. P – Value of convergent Validity <0.01; Standardized Regression Weights >0.6**;** P-value of discriminant validity <0.01. The SEM test is shown detail in Fig. 3 and Table 3.

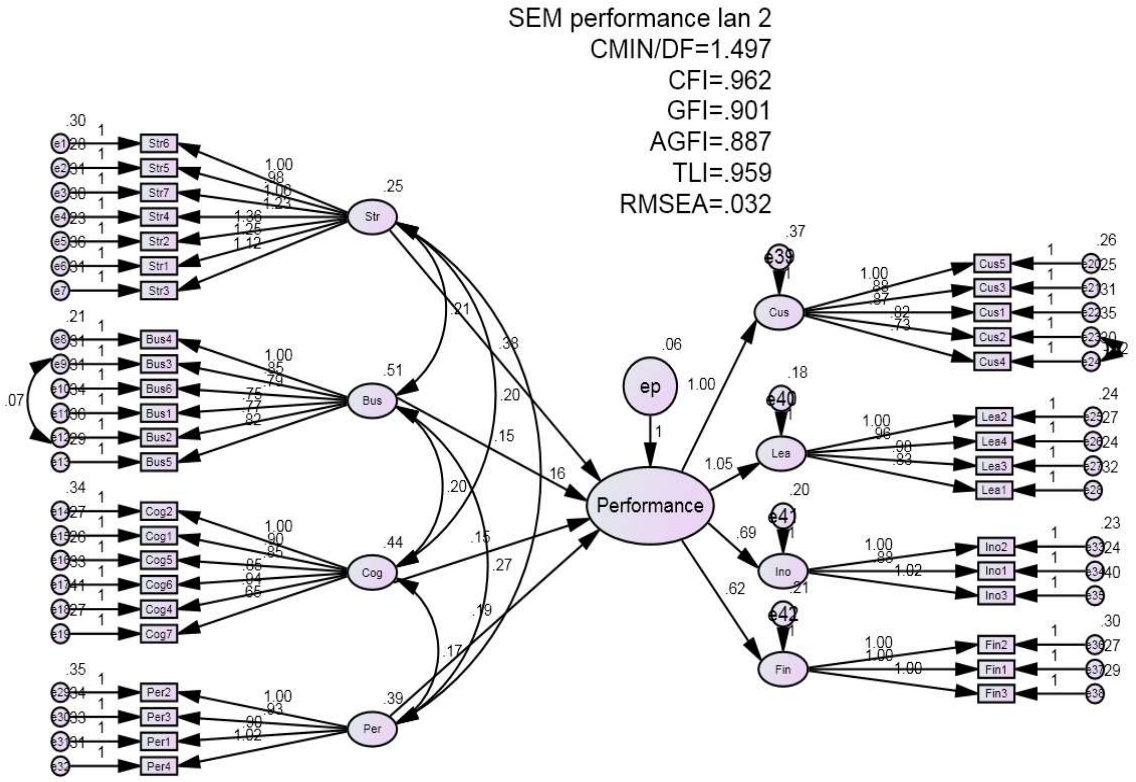

Fig. 3. SEM analysis result

Table 3
SEM results

	Estimate	S.E	C.R	P	Standardized Regression Weights	
Performance ←Str	0.381	0.073	5.215	***	0.388	Hypothesis 4 is accepted
Performance ←Per	0.192	0.051	3.735	***	0.244	Hypothesis 2 is accepted
Performance ←Bus	0.152	0.046	3.326	***	0.222	Hypothesis 3 is accepted
Performance ←Cog	0.148	0.044	3.367	***	0.201	Hypothesis 1 is accepted

(Source: SPSS outputs)

5. Discussion and conclusions

Leadership skills at Vietnamese textile and garment companies can be measured through cognitive skills, interpersonal skills, business skills and strategic skills. Cognitive skills are assessed using six items including: speaking, listening, writing, reading comprehension, active learning and critical thinking. Interpersonal skills are assessed through social perceptiveness, coordination, negotiation, and persuasion. Business skills are measured using items including operations analysis, motivating employees, directing employees, developing employees, management of financial resources, and management of material resources. Strategic skills are measured through some following items, include: visioning, systems perception, system evaluation, identification of downstream consequences, identification of key causes, problem identification and solution appraisal.

In general, the results indicate that the leadership skills affect positively the performance of Vietnamese textile and garment enterprises. This result is supported by some previous results of authors (Kehinde et al., 2012; Abosede et al., 2011; Do Anh Duc, 2014; Le Thi Phuong Thao, 2016) about the impact of leadership skills on the performance. In particular, the strategic skills have the greatest impact on the performance of Vietnamese textile and garment companies with the standardized regression coefficients 0.388; next is the interpersonal skills with the standardized regression coefficients 0.244; the next effect is the business skills with the standardized regression coefficients 0.222. Cognitive skills have the weakest effect on the performance of Vietnamese textile and garment companies with the standardized regression coefficients 0.201.

In terms of the financial aspect of the performance, the financial perspective of Vietnamese textile and garment companies is affected by three skills: strategic skills, business skills and interpersonal skills. The research result does not reveal the influence of cognitive skills on the financial performance of Vietnamese textile and garment enterprises. Therefore, in order to improve financial efficiency, leaders of Vietnamese textile and garment companies should improve strategic skills, business skills and interpersonal skills. In which, strategic skills have the greatest impact on the financial aspect with the standardized regression coefficients 0.235; followed by business skills with the standardized regression coefficients 0.193; and finally, the interpersonal skills with the standardized regression coefficient 0.162. About the customer perspective, strategic skills, business skills, interpersonal skills, and cognitive skills influence the customer satisfaction in textile and garment enterprises in Vietnam. In particular, the most effect is interpersonal skills with the standardized regression coefficient of 0.252; followed by cognitive skills with the standardized regression coefficient of 0.181; and strategic skills with the standardized regression coefficient of 0.146 and finally business skills with the standardized regression coefficient of 0.122. Regarding the internal business process aspect, the strongest effect is associated with strategic skills with the standardized regression coefficient of 0.476 followed by cognitive skills with the standardized regression coefficient of 0.166

In terms of learning and growth perspective of the performance, similar to customer aspect, all four skill groups of leaders have the positive influence on employee's satisfaction at Vietnamese textile and garment enterprises. In particular, the greatest influence is associated with strategic skills with standardized regression coefficients of 0.280 followed by the business skills with the standardized regression coefficient of 0.239; the interpersonal skills with the standardized regression coefficient of 0.171, and ultimately cognitive skills with the standardized regression coefficient of 0.119. Although this study has achieved some significant results as shown above, the article does not clarify differences in gender, age, experience and position of leader in this relationship.

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