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Health Care Leader Competencies and the Relevance of Emotional Intelligence

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As health care leader competencies continue to be refined and emphasized in health care administration educational programs, the ''soft skills'' of emotional intelligence have often been implied, but not included explicitly. The purpose of this study was to better understand what relationship, if any, could be identified between health care leader competencies and emotional intelligence. A quantitative correlational method of study was used, utilizing self-assessments and 360-degree assessments of both constructs. There were 43 valid participants in the study, representing the various types of health care delivery systems. Correlational analysis suggested there was a positive relationship; for each unit of increase in emotional intelligence, there was a 0.6 increase in overall health care leadership competence. This study did not suggest causation, but instead suggested that including the study and development of emotional intelligence in health care administration programs could have a positive impact on the degree of leader competence in graduates. Some curricula suggestions were provided, and further study was recommended. Key words: *competencies, emotional intelligence, health care, leader*

AS THE SYSTEMS of health care in the United States have continued to grow more complex, effective leaders are needed. Members of the Institute of Medicine recommended the establishment of competencies for all areas of health care, including leaders, to improve the quality of care provided in health care systems.[1] Since then, several models of health care leadership competence were developed.[2-4] Each of these models identified various domains of competence, including areas related to people or relationships, organizational development, business execution, and technical skills.[5] To varying degrees, college programs in health administration have adopted competency models as the basis of the curricula used. Despite this emphasis, research has shown that graduates of health administration programs lack competencies, especially in the area of interpersonal competencies.[6] Additional research was warranted.

Emotional intelligence was identified as a factor of effective leadership in a number of business industries,[7,8] but little research has been done to determine the relationship of emotional intelligence with competencies in the health care industry.[9,10] Because health care, as a human services industry, so heavily involves people and relationships, as well as technology and business practices,[11] it would make sense that emotional intelligence would be a relevant construct.[12]

Theories of emotional intelligence have evolved over the past few decades,[13] starting with Gardner's[14] theory of multiple intelligence and Payne's[15] doctoral work. Models of emotional intelligence have developed along 3 general paths, viewing emotional intelligence as

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an ability, a trait, or a mixture of both plus additional characteristics. Salovey and Mayer[16,17] explained emotional intelligence as an ability and developed psychometric instruments for measuring it. They conceived emotional intelligence as an aspect of general intelligence that could be isolated. Others added to the model by developing instruments for measuring emotional intelligence through self-assessment.[18]

The trait-based models of emotional intelligence view the concept as a factor of personality[19] that is best measured through self-assessment. This model of emotional intelligence suggests that some of the traits are innate and cannot be controlled, whereas others may be controlled, nurtured, and developed.[20] The other type of emotional intelligence theories are known as mixed models.[13,21,22] In this viewpoint, emotional intelligence is viewed as a combination of traits, abilities, and characteristics.[23] While the trait-based models of emotional intelligence are best measured through self-assessment, the mixed models of emotional intelligence have been variously measured through self-assessment and 360-degree assessment.[24]

The concern with using self-assessment to gauge emotional intelligence is that because self-awareness is a factor of emotional intelligence, individuals lacking in this area would likely have an inaccurate view of their own level of emotional intelligence. The risk of this unconscious incompetence[25] can be offset by including 360-degree evaluation in the assessment. A meta-analysis of studies relating emotional intelligence with leadership found that the results of the 360-degree assessment of emotional intelligence are often significantly different from the participant's self-assessment.[26] For this reason, in the study referenced here, the choice was made to use an instrument specifically requiring the 360-degree assessment.

While researchers have not agreed on a single model of emotional intelligence, Mikolajczak[27] proposed a unified view that could have applicability in the academic setting. Mikolajczak[27] proposed a 3-level model of emotional intelligence in which the first level was knowledge of the concept, the second level reflected abilities, and the third level was related to the dispositions or tendency to behave in specific ways. In the development of curricula, the goal of providing a context whereby students gain knowledge is standard. Instructors cannot ensure that the knowledge will be grasped by all students, nor can an instructor predict which students may choose to integrate the knowledge and develop abilities in relation to the material learned. It may be few students who reach a dispositional level of learning.[27] The dilemma with attempting to teach emotional intelligence is that the instructor and course material would be provided with the intent to, at a minimum, increase the students' knowledge of emotional intelligence, with the hope that some students would proceed to the ability and dispositional levels. It must also be noted that the study of emotional intelligence is relatively young and continuing to evolve,[28] which may limit the methods available for developing emotional intelligence.

Another consideration with regard to emotional intelligence was whether individuals' emotional intelligence can be improved through training or other developmental activities. Boyatzis et al[29] found that explicitly including emotional intelligence in the course material in a business degree program did increase the emotional intelligence of at least some of the students. More recently, Joyner and Mann[30] reported successfully improving students' emotional intelligence by explicitly including activities in the curriculum intended to develop emotional intelligence. Taking the idea a step further, Allen et al[31] suggested a new construct of Emotionally Intelligent Leadership that could be specifically used in the curricula of college degree programs. The construct of the Emotionally Intelligent Leader, as proposed, included the facets of context, self, and others, with 21 specific categories, some of which could be measured. Although Allen et al did not test the efficacy of this model in course work, with further study this model could provide a useful framework for the development of curricula for the education and training of health care leaders.[31]

A number of health care leader competence models have been established, including the Healthcare Leadership Alliance (HLA) Model[4] adopted by the American College of Healthcare Executives, the Health Leadership Competency

Model (HLCM)[2] published by the National Center for Healthcare Leadership, and the HAL-360 model.[3] The HLA model and the HLCM are both comprehensive and complex, whereas the HAL-360 model is intended to measure leadership behaviors more than knowledge.[3] The HLCM includes 8 technical or knowledge competencies and 18 behavioral competencies.[2] The HLA model includes 300 competencies that include skills, knowledge, and abilities. The HAL-360, in contrast, includes 26 behavioral competencies grouped into 7 domains. The 7 domains are charting the course, developing work relationships, broad influence, structuring the work environment, inspiring commitment, communication, and self-management.[3] Because emotional intelligence is a relational concept, the HAL-360 is a relevant model to use for comparison.

CONCEPTUAL FRAMEWORK

Previously published research has suggested a relationship between emotional intelligence and various models of leadership in a variety of business settings,[32,33] but a review of literature did not identify other quantitative studies of this type specifically related to the health care industry. The primary research question was what relationship, if any, existed between emotional intelligence and health care leadership competencies. The factors of gender, years of management experience, and level of education were controlled in recognition of the fact that these could also impact leader competencies.

METHODS

A quantitative correlational research method was used to examine the relationship between emotional intelligence and health care leader competencies. Two established 360-degree assessment surveys were used: the HAL-360 and the Emotional and Social Competency Inventory (ESCI). The HAL-360 was chosen because it was specifically intended to measure leadership behaviors, rather than knowledge, with a degree of specificity, and it was readily available as an open-source assessment instrument. In addition, the HAL-360 specifically required participant self-assessment as well as 360-degree assessment by peers, subordinates, and superiors.

The ESCI was chosen to study the construct of emotional intelligence.[34] Notwithstanding the continued lack of consensus of whether emotional intelligence should be measured as a trait-based, ability-based, or mixed model, this mixed-model assessment tool was chosen for the study. The ESCI included both self-assessment and 360-degree assessment. Ability-based assessment, while having the added strength of being measured psychometrically, was based on performance rather than lived experience. Trait-based assessments required self-assessment, but most did not include 360-degree assessment. For this study, the availability of a 360-degree assessment was given priority so that the potential error of unconscious incompetence could be minimized,[25] and there would be some standardization between both constructs.

Graduates of the health administration programs at Saint Joseph's College were invited to participate in the study, as were members of the American College of Health Executives (ACHE) who were in the ACHE group in LinkedIn and managers within the Benedictine Health System, a long-term-care organization with 40 nursing homes in the United States. The graduates were sent an invitation to participate from the Director of the Health Administration Program at Saint Joseph's College. A notice was posted in the ACHE group in LinkedIn. A vice president of the Benedictine Health Systems invited, via e-mail, the managers working in that system to participate. In all, the invitation was extended to 2417 managers in health care settings,[5] representing a convenience sampling method. The invitations included a link to the assessments in the SurveyMonkey Web site.

In order for an individual health care manager to be included in the study, a self-assessment and at least three 360-degree assessments had to be received by the researcher.[5] This criterion was met by only 43 participants in the study, barely meeting the minimum sample size of 42 participants suggested by G*Power 3.1 developed by professors at the Heinrich Heine Universitat Dusseldorf, for a high-medium effect.[34] For each participant, the self-assessment and the 360-degree assessment data were averaged,

resulting in total scores for emotional intelligence and health care leader competencies. The total emotional intelligence score was also correlated with each of the competence domains of the HAL-360 for each participant, in order to compare the relationships in more detail.

FINDINGS

Participants in the study were 33% male and 67% female. The respondents reported a range of management experience from 1 year to more than 20 years. The highest levels of education reported by respondents were 47% graduate degree, 47% undergraduate degree, and 6% with some or no college courses.[5] The reported employer types were 56% in long-term care, 37% in hospital or hospital systems, and 7% in ambulatory care settings. The participants representing long-term care in this study were disproportionately higher than that reported by the US Department of Labor for the health care industry as a whole.[5,35] It was recommended that further study be done with participants in hospital and ambulatory care settings to determine if the findings would hold when these areas were more highly represented.[5]

Descriptive analysis found that the data were normally distributed for both constructs.[5] The range for total score of emotional intelligence was between 3.4 and 4.8 on a scale of 1 to 5. The mean was 4.2, and the SD was 0.33. For health care leader competencies, the range for the total score was 3.0 to 4.7 on a scale of 1 to 5, with a mean of 3.9 and an SD of 0.38. An examination of the total scores of emotional intelligence and health care leader competence using correlational analysis found that when the covariables of gender, years of experience, and level of education were controlled, for every 1-point increase in emotional intelligence, there was a 0.63 increase in health care leadership competence with a significance value of .001. Interestingly, in this study, the level of education variable did not influence competence, but the years-of-experience variable was significantly related to competence.[5] This finding also suggested further study was warranted, given the generally accepted assumption that education would increase leader competence.

Further analysis found that emotional intelligence was most strongly related to the leader competence domain of charting the course (0.589) and least strongly related to developing work relationships (0.373) and communication (0.407).[5] This finding was almost the opposite of what would have been expected, given the previously established role of emotional intelligence in relationships and communication.[36] This bears further study, but perhaps the ''soft skill'' of emotional intelligence is more related to what could be viewed as more cognitive skills than was expected.

PRACTICE IMPLICATIONS

There are several benefits to explicitly including emotional intelligence in health care administration curricula. As the management of health care systems and departments continues to become more complex, it makes sense that competencies will be increasingly important to effective leadership. Given the finding that there was a significant, strong relationship between emotional intelligence and health care leader competence, there would be considerable benefit in including the study and development of emotional intelligence in college curricula and organizational development training initiatives. Second, there was a significant body of published research demonstrating a positive relationship between emotional intelligence and leadership effectiveness in general.[32,33] Thus, improving emotional intelligence should increase leadership effectiveness regardless of the setting. Freshman and Rubin[37] also discussed the role of emotional intelligence skills in maintaining social networks in health care organizations. As there is continued emphasis in the coordination of health care services, emotional intelligence may prove to be critical. On an individual and personal level, increasing emotional intelligence could also improve individual well-being, including health, social, and overall performance,[37] as well as improving individual ability to adapt to change.[38]

There were several limitations of this study. The small sample size and the fact that more than half of the participants were managers in long-term-care organizations,[5] whereas only 23% of the total population of health care leaders

work in long-term-care organizations,[35] were limiting. In addition, the population of ambulatory care facility managers was significantly underrepresented in this study, whereas the hospital or hospital system representation was consistent with the population.[35] In other words, the sample size was small overall, and in particular some areas of health care were overrepresented, and others were underrepresented in this study.

Another limitation of the study was that the assessment instruments used to measure each of the main constructs may not reflect the full spectrum of each construct. The HAL-360 assessment instrument measured 1 model of health care leadership,[3] but may not fully represent the National Center for Healthcare Leadership and HLA models of competencies. In fact, a comparison of the models showed that the HAL-360 model included significant emphasis on the relationship or people domain of competencies and less emphasis on technical and execution areas of the competencies.[3] While the variability between the models of health care leader competencies may be a limitation to the reported study, the variance between the constructs of emotional intelligence was more pronounced.[5] The ESCI assessment instrument measured emotional intelligence as a mixed model. The results may differ if ability or trait-based models were used.

The remaining question is how to teach emotional intelligence in a manner that facilitates the development and increase in emotional intelligence in students or participants. There was little research published to suggest how emotional intelligence could actually be taught. The Hay Group and other consulting companies offer training in emotional intelligence, but not in the context of a college education.

As college programs in health administration continue to respond to changes in health care in the United States, some attention should be paid to the role emotional intelligence may play in helping students, leaders, and potential leaders develop health care leadership competence. Curricula possibilities that bear further research include a training developed by Nelis et al[38] to increase emotional competence in the context of an undergraduate program and a spiral model to incorporate emotional intelligence training into a medical school program.[39]

Nelis et al[38] used an 18-hour program in which 6 training sessions were provided. Each session focused on 1 aspect of emotional intelligence, with 2 sessions focusing on understanding the participants' own emotions, 2 sessions focused on expressing emotions and understanding others' emotions, and 2 sessions focused on managing emotions and enhancing positive emotions. Each session included a brief lecture, role-play activities, group discussions, and working in pairs. Each participant also maintained a personal journal in which they recorded an emotional experience they had recognized that day, along with the analysis of the experience. Each participant was also sent 2 brief e-mails each week to reinforce the concepts learned in the sessions, along with a reading assignment. This model was found to increase emotional intelligence, with sustained improvement measured over a 6-month period after the training, assuming that this training would have lifetime impact.[38] This model could be readily adapted for incorporation into a course or courses.

The spiral model developed for use with medical students correlated the teaching of emotional intelligence with the various developmental stages in physician preparation. In brief, this model incorporated training for self-awareness throughout the program, but focused on the social awareness aspect of emotional intelligence with the resident physicians. Self-management was a focus on the training of residents and medical students, whereas relationship management was the focus for medical fellows and faculty. This spiral model revisited each aspect of emotional intelligence throughout the years of medical training, intending to provide a sustained developmental program for the physicians. Stoller et al[40] did not report the outcome of this model, but the notion of adding the study of emotional intelligence across a curriculum in health administration had merit.

In both of these models, the 3-level concept of learning would be applicable. Curricula and instructors should be intentional about assisting students to gain knowledge, while being available to mentor, and encourage students who seek to further gain ability and even develop a

disposition of greater emotional intelligence. While there were several models of emotional intelligence from which to choose, the model chosen is less important than the explicit addition of emotional intelligence into the curricula for teaching health care administrators.

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