

Journal of School Administration

Vol 10, No 4, Winter 2023

ISSN: 2538 - 4724



# Predicting The Performance of School Principals In Leadership Based on Spiritual Intelligence and Spirituality at Workplace With The Mediation of Organizational Intelligence

#### Samereh Moghaddam Hosseini\*1

#### Abstract

performance management has become one of the most effective incentive tools. The performance of school principals in the field of leadership has been less investigated. This research was conducted with the aim of Predicting the performance of school principals in leadership based on spiritual intelligence and spirituality at workplace with the mediation of organizational intelligence. The correlation research method was based on the structural equation model. The statistical population of the research was all the public and girls' senior high schools' principals of Tabriz (N=270). The sample size is 160 people based on the table of Krejcie and Morgan with stratified random sampling. Albrecht's organizational intelligence questionnaires, King's spiritual intelligence questionnaires, Milliman's spirituality at work, as well as the researcher-made questionnaire of school principals' performance in leadership were used to collect data. The psychometric properties of the questionnaires are valid and reliable. PLS software was used for data analysis. The results of the structural equation model showed (P<0.05): the ability to predict the leadership performance of principals based on spirituality at work and spiritual intelligence with the mediation of organizational intelligence at a high level ( $R^2 = 0.85$ ) and the ability to predict organizational intelligence based on spiritual intelligence was significant (Total effect = 0.86). There is a significant positive relationship between spiritual intelligence, spirituality at work and organizational intelligence with performance (P<0.05). Based on research results, promoting spiritual and organizational intelligence in principals, as well as promoting spirituality at work in schools can improve the leadership performance of principals.

ARTICLE INFO Article history:

**Received:** 08/09/2022

Accepted: 11/03/2023

Available online: Winter 2023

#### Keyword:

Performance, Leadership, Intelligence, Spiritual, Spirituality at Work

Moghaddam Hosseini, S. (2023). Predicting the performance of school principals in leadership based on spiritual intelligence and spirituality at workplace with the mediation of organizational intelligence, *Journal of School Administration*, 10(4), 216-237.

<sup>1.</sup> Ph.D., Dept of Educational Administration, Tabriz Branch, Farhangian University, Tabriz, Iran \* Corresponding Author's: Email: samerehmoghaddam@gmail.com

### Introduction

The role of the educational system and schools in the development of human resources and human societies in different dimensions is not hidden from anyone, and school principals play a key role in improving the quality of education and realizing its goals (Talebi & Khalilzadeh, 2016), who as leaders and coordinators are the main providers of school services (Moghadam Hosseini & Talebi, 2018) and according to this, having managers in the role of leaders is strongly felt in schools (Madadi & Talebi, 2020). The leadership role of the principal in the school is more important than other sources because the principal in the role of leader can cause creativity, innovation and encourage human resources to be more responsible and accountable (Pashayee et al., 2021). The performance of school principals has 13 dimensions, which are: educational, pedagogy, financial and executive, goal setting, staff affairs, equipment and facilities. student affairs. schoolcommunity interaction, executive and educational technology, health. prevention of social harm, physical education, leadership (Vaparzeh et al, meantime. the 2019). In the performance of school principals can be evaluated in all areas, and one of the key areas for evaluating the job performance of school principals is the field of leadership.

One of the most important and effective factors in the work performance of principals is their psychological characteristics (Soomro et al, 2022). Intelligence, as one of the psychological characteristics, is one of the factors that make a person successful in life, when people approach success, they go through complex processes that can be interpreted based on the dimensions of intelligence (Armor, management 2017). In and organizational behavior texts, different aspects of intelligence have been considered. Spiritual intelligence and organizational intelligence are dimensions that, despite the fact that there have been studies on the relationship between these two dimensions of intelligence and organizational behavior variables, as well as limited studies on the general performance of principals. Not many studies are available on the relationship between these two variables and the leadership performance of principals.

Spiritual intelligence or metaintelligence or existential intelligence provides a personal sense of the meaning of a person's life and plays an essential role in the work environment, because it can lead to the improvement of satisfaction and performance (Eslampanah Chehri, 2022). & Organizational intelligence, which is related to the collective use of all the skills of the organization, is one of the factors that determine the efficiency, competitiveness performance. and success of an organization (Bilgen & Elçi, 2022). Also, spirituality at work is one of the variables whose relationship with principal's performance in the field of leadership has not been studied much. Researchers believe that spirituality at work can also help people to expand their consciousness and increase their performance and productivity (Liu et al, 2023). A review of recent researches on the performance evaluation of school principals shows that, on the one hand, most of the studies have measured the performance in general or based on the annual performance evaluation, and less have focused on its dimensions based on

the specific duties of school principals. The performance of school principals in the field of leadership has not been studied, and this is because the performance of the field of leadership can play a decisive role in performing other specific tasks. Based on this, this research seeks to answer the question whether the performance of school principals in the field of leadership can be predicted based on spiritual intelligence and spirituality at work with the mediation of organizational intelligence?

# Theoretical Foundation Spirituality at Work

Some researchers consider the new paradigm of responding to future management challenges as "spirituality". They are of the opinion that satisfying the transcendental needs of employees can be sought in the model related to spirituality (Lewis, 2019). Some experts consider the term spirituality at work to describe the experience of employees who are enthusiastic and energetic in their work, satisfies their work them. thev understand the meaning and purpose in their work, and they feel that they have an effective relationship with their colleagues (Lianto, 2023). One of the experts considers spirituality to be the search for guidance, meaning, inner wholeness and being connected with others and the creator of existence. Some have also defined spirituality as being pluralistic (Obregon et al, 2022). Milliman and his colleagues have reported the dimensions of spirituality in the workplace including: meaningful work at the individual level, sense of community at the group level, and alignment of organizational values at the organizational level (Rathee & Rajain, 2020).

Meaningful work includes: one's involvement in one's work in giving meaning and making the work purposeful, achieving one's dreams, wishes and aspirations in one's life, expressing and satisfying the inner needs of one's life and colleagues with others. The sense of community includes: It is a feeling of deep connection and feeling of community with others and it is based on the belief that people know each other in connection with each other and pay attention to the fact that there is a relationship between the inner self of each person and the inner self of others. Values Alignment: Experiencing a strong sense of alignment between employees' individual values with the organization's mission, mission, and values. and includes employees' engagement with the larger organizational purpose (Milliman et al, 2003).

## **Spiritual Intelligence**

Drawing on multiple intelligences theory, Zohar and Marshall (2001) took a giant step and proposed a new intelligence known as spiritual intelligence that works independently and requires a different understanding of the connection between one's inner life. mind, and spirit to the external world (Vaughan, 2002). It is an intelligence that focuses on macro-level problemsolving potentials of learners/teachers/principals,

particularly problems pertaining to meaning and value of different ways of life (Ma & Wang, 2022). Spiritual intelligence is a human capacity to search and ask the ultimate questions about the meaning of life, and at the same time, it is the experience of the integrated connection between each of us and the world in which we live (Pant

& Srivastava, 2019). It goes beyond a mental person's ability and conventional psychological development, linking the personal to the transpersonal and the self to spirit (Estaji & Pourmostafa, 2020). spiritual intelligence is an underlying concept. It is defined as the human ability to generate questions about the meaning of life and, understanding the meaning of simultaneously experiencing them, connections between each of us and the wider world that deliver expectations and transcendence (Skrzypińska, 2021). To put simply, SI pertains to one's capability to behave and perform judiciously and empathetically, while maintaining inner and outer harmony, regardless of the surroundings (Wigglesworth, 2006). To use Gardner's (2006)interpretation, SI is "the intelligence of big questions" that draws on human predisposition to probe fundamental questions about existence. According to Zohar (2010), this type of intelligence can promote one's motivations for exploration, creativity, cooperation, self-mastery, situationalmastery, and service-provision.

In the available literature, many principles and components have been proposed for the construct of SI as a complicated variable. As a case in point, Zohar proposed 12 key principles underlying this crucial construct as what follows (Ma & Wang, 2022): Selfawareness.Spontaneity.Being visionand valueled Holism Compassion Celebration of diversity. Field independence Humility Tendency to ask fundamental "whv?" questions. Ability to reframe. Positive use of adversity Sense of vocation. George (2006) considers the important features of spiritual intelligence to be

Vol 10, No 4, Winter 2023

of understanding, managing changes, and moving from difficult routes. Besides, from King's (2009) point of view, the four main components of spiritual intelligence include:

Critical existential thinking: The ability to critically think of the nature of existence, reality, the universe, space, time, death, and other existential or metaphysical issues.

Personal meaning production: The capability to construct personal meaning and purpose in all physical and mental experiences.

Transcendental consciousness: The ability to recognize transcendent dimensions of the self, others, and the physical world during the normal, waking state of consciousness, supplemented by the ability to detect their relationship to one's self and to the physical setting.

Conscious-state expansion: The capability and exit to enter higher/spiritual states of consciousness at one's own discretion.

### **Organizational Intelligence**

Initially, Matsuda coined organizational intelligence and observed organizational intelligence as combination of human and machine intelligence. The model was defined by him explains the process of human knowledge and science based on machine for sorting out organizational (Shabbir problem et al, 2016). Organizational intelligence, which can be defined as the whole of the abilities make the existence that and sustainability of an organization possible and the use of these abilities (Bilgen & Elchi, 2022). The promise that organizational intelligence gives to a manager is the promise of immediate

access to all data in the organization digital dashboards with and performance indicators (Mahmoudi et al, 2019). organizational intelligence helps people to realize the weaknesses of their organization and strengthen their strengths. They also provide an appropriate platform for creating knowledge management and organizational learning and promote the power of ideation, creativity and which improves innovation. the performance of individuals and also emphasizes the clear expression of strategic goals and missions (Habibzadeh 2021). et al. Organizational intelligence is the organization's ability to mobilize all its available mental forces and focus on the mind's ability to achieve business objectives (Thannhuber et al., 2017). The importance of organizational intelligence highlights an organization's ability innovation. to increase knowledge. information. general effective work. provides and organizations with a competitive advantage by converting information into knowledge (Ahmad et al., 2019). organizational intelligence elements that enable managers to evaluate their organization in a right manner through seven dimensions, which are strategic vision, shared fate, appetite for change, heart, alignment and congruence, knowledge deployment, and performance pressure (Albercht, 2005).

Strategic vision represents the need of the strategic organization for theory, concept, or a principle. In other words, it is the answer to the organization's leader's questions (Hamad, 2019). Shared fate is the association of most people, including parties with interests with the organization. This feeling stems from everyone's awareness that they are in one compound. They create their strength with their collective sense and teamwork (Ismail & Al-Assa'ad, 2020). Appetite for change is a concept that defines change as a challenge, an opportunity for new and existing experiences and practices, or an opportunity for radical change (Ismail & Al-Assa'ad, 2020). According to an organizational psychologist's definition of heart, it is the effort used to assess one's energy as members of the organization to contribute across and above interdependence the and relationship levels to make that estimate. Alignment and congruence explain setting rules for the group of individuals' operations as they will begin to clash and overlap. Designers and leaders work to remove the structural contradictions of intrinsic value, promote the adaptation of one's energy, and harness them to a common purpose (Awamleh & Ertugan, 2021). Knowledge deployment explains that organizational intelligence should ensure a free flow of knowledge through different cultures, taking care to strike a balance between a conversation about the sensitivity of new information and innovations and dealing with an open mind with questions that require attention (Hamad, 2019). Performance pressure is the belief that the employees have for more work and a sense of what they need to accomplish. Leaders promote and support a sense of employees' belief in more work, but this only impacts when all organization members accept and view it as a translation and response to their set of expectations and core processes of shared success (Dana et al., 2020).

### Performance

This concept has been widely discussed and conceptualized in various

ways (Krijgsheld et al., 2022). Work performance is the achievement in work. i.e.. the qualitative and quantitative result of work achieved by an employee in performing the tasks assigned to them (Nurzaman & Amalia, Occupational 2022). performance involves leaning how to acquire efficient work habits, strategies and expertise to apply throughout one's career (Ford & Leist, 2021). Bar-on et al (2022) describes the term performance as action taken for the purpose of achieving some desired outcome or goal and to bring about a change for the better. Occupational performance refers to the ability to perform one's job adequately, to the standards that are required in the specific occupation (Ras et al., 2022). Occupational performance is a person's ability to perform the required activities, tasks, and roles of daily living (Ohno et al., 2021). Based on the 35 frameworks Koopmans et al. identify four main dimensions: task performance, contextual performance, adaptive performance, and counterproductive work behavior (Krijgsheld 2022). et al.. Taqipoorzaheer et al. (2019) defined the performance indicators of schools as: Management and leadership, administrative and financial affairs. teaching-learning processes and effective programs, program-oriented, information and communication technology, the condition of the physical space and educational equipment and facilities, empowering teachers and staff, complementary, extracurricular educational and consulting and activities, supervision and guidance and evaluation, organizational climate and organizational culture, interacting with the environment outside the school and gaining experiences, creating a platform

and developing a culture of study and research and nurturing creativity, creating a platform and developing a culture of studying and researching and nurturing creativity, physical education, health and wellness, participation of employees, parents and students have reported in school affairs (Tagipoorzaheer et al., 2019). The research of Mohajeran et al. (2015) shows that the performance indicators of schools in the field of management include: Continuous and final evaluation, staff performance evaluation, supervision, creativity and response to students' needs and expectations have been reported (Mohajeran et al., 2015).

The researchers conducted on the role of spiritual intelligence, emotional intelligence and spirituality at work have reported different results

The aim of the Javan (2022) research the predictive role of the was components of spirituality in the work environment in job burnout and job performance of elementary teachers in Bent region of Nikshahr city. The results showed that there was a positive and significant relationship between the components of spirituality and job performance. The aim of the research by Sahami & Rahavi Azabadi (2022) was to explain the relationship between social capital and spiritual intelligence with the job performance of the employees of the Education Department of Yazd province. The findings of the research showed that all the components of employees' job performance, except for existential thinking, have а significant relationship with spiritual intelligence. The study of Asadzadeh et al. (2019) was conducted with the aim of investigating the relationship between spiritual intelligence and its

components with the job performance of middle school teachers in Aslandoz city. The obtained results showed that there is a positive and significant relationship between spiritual intelligence and its with components teachers' iob performance, and the components of spiritual intelligence are able to predict percent of teachers' 71.2 iob performance. The aim of Mossadegh & Khoshgamat (2020) research was to examine the relationship between spirituality at work and responsibility educational performance with of primary school teachers in Qom. The results showed that the components of spirituality at work and educational performance of teachers had a positive relationship. In the research of Shafizadeh & Gila (2018), the prediction of the performance of education workers in Pakdasht city based on spirituality in the work environment and organizational support has been evaluated. The results showed that improving the indicators of organizational support and spirituality in the work environment improves the organizational performance of employees; In addition, the mediating role of spirituality in the work environment in the relationship between organizational support and performance was also confirmed. In evaluating the of spirituality in the work role environment on the performance of the employees of Allameh Tabatabai University, the research of Sabetmutlag & Alvani (2018) has found out the role of spirituality in the work environment on the performance.

The results of Labetubun & Dewi (2022) study in Indonesia show that human resource management practices, workplace spirituality, and organizational commitment have a

effect positive on emplovee performance. Nasrullah et al.'s (2022) research with the aim of investigating the effect of job satisfaction and organizational commitment on employee performance with spirituality at work as a moderating variable and deviant behavior as a mediating variable showed that spirituality at work and performance have а positive relationship. The results of Jena's (2022) research in India on 761 employees have shown that spirituality in the workplace increases performance. Moon et al.'s (2020) research with a sample of 306 employees in South Korea shows that employee spirituality is positively related to job performance. The research of Watoni & Suyono (2020) in the Kalimantan province of Indonesia has shown that spirituality in the workplace increases the performance of employees. Andriansyah et al. (2022) in a review of the relationship between emotional intelligence and spiritual intelligence with the performance of managers, reported that these two types of intelligence have a positive role on the performance of managers. The study of Nurzaman & Amalia (2022) on university professors has shown that emotional and spiritual intelligence have a positive role on professors' performance. Altındağ & Öngel (2021) reported, perceived knowledge, which is the sub-dimensions one of of organizational intelligence, has no strong impact on performance, and mental model development has a direct and positive effect on performance. Shabbir (2016) reported et al Organizational Intelligence correlation with employee Performance. Also, Bazrkar & Hajimohammadi (2021), Mahmoudi et al., (2019);Rezaeikalantari and Nouri (2020) have

found that there is a significant managers' relationship between organizational intelligence and their performance. The results of Habibzadeh et al study (2021) revealed that organizational intelligence have a direct impact on organizational performance. Keykha & Abbaspour (2019), Kateb et al. (2023) reported the direct impact of organizational intelligence on organizational performance. Zarei et al. (2015) have reported the absence of a significant relationship between these two variables.

### Methodology

Since the main goal of this research is to explain the relationship between variables through the mediating variable, the correlation research method based on the structural equation model has been used. The statistical population of the research consists of all the public and girls' senior high schools' principals Tabriz of educational districts, in the number of 270 people. The sample size was 160 people based on the table of Krejcie & Morgan and finally 159 questionnaires have been included in the statistical analysis. The method of stratified random sampling was based on the educational district. The following questionnaires were used to collect data.

spiritual intelligence questionnaire (King, 2008)

According to King (2008), the questionnaire (24 Items) consisted of four subscales: "1. critical existential thinking, with seven items 1, 3, 5, 9, 13, 17 and 21; 2. personal meaning production, with five items 7, 11, 15, 19 and 23; 3. transcendental awareness included seven items: 2, 6, 10, 14, 18, 20 and 22; and 4. conscious state expansion, which included five items: 4, 8, 12, 16 and 24. All of the items were

totalled, with the exception of item number 6, which was regarded as the only reverse coding." To analyse the result, the relatively higher the score, the relatively higher the respondent's level of spiritual intelligence (king, 2008). In Alrashidi et al (2022) study, spiritual questionnaire had intelligence an internal consistency coefficient of 0.86. In this research, the third item of the questionnaire has been removed in order to increase the fit of the model, and the values of convergent validity, divergent validity, construct validity and factor load of the items and the amount of explanation of spiritual intelligence based on its dimensions are valid.

Organizational Intelligence **Ouestionnaire**: Albrecht (2002)standardized organizational intelligence questionnaire was used to measure organizational intelligence. This questionnaire was in the form of 49 items and 7 components that include strategic vision that evaluate with (1-7) items, shared fate (8-14) items, the appetite to change (15-21) items, heart (22-28)items, alignment and congruence (29-35)the items. knowledge deployment of (36-42) items and the performance pressure evaluated with (43-49) items. In evaluating the fit of the research model, items 1, 23, 28, 43, 45, 46 of this questionnaire have been removed due to the factor loading lower than 0.4 or in order to improve the fit of the model. The modified model has valid values of convergent validity, divergent validity, factor loading and explanation organizational of intelligence for its dimensions.

Spiritual at workplace questionnaire (Milliman et al., 2003): The SW questionnaire measured the degree to which the individual experiences work spirituality in the workplace. In this research, Milliman et al. questionnaire has been designed to be used for measuring organizational spirituality. It has 18 questions and 3 components, including meaningful work (items 1 to 5), sense of community (items 6 to 11), and alignment of organizational values (items 12 to 18). The 18-item questionnaire displayed Wagner et al. face, content, and construct validity in previous researches. Studies by Wagner et al. showed that Cronbach's alpha for the spiritual at workplace construct was 0.92 (Wagner et al, 2016). In the evaluation of the fit of the research model, no item was removed from this questionnaire, and the values of convergent, divergent, construct. validity of the items and the amount of prediction of spirituality in the work environment for its dimensions are valid.

Researcher-made questionnaire for performance evaluation

In order to measure the principals' leadership performance variable, based on the theoretical background and so theirs' description of job duties, a questionnaire was designed and in order to evaluate the content validity, it was given to 16 principal and professors of the field. The content validity of this questionnaire was confirmed in the final 18 items both in the content validity index and in the content validity ratio.

All questionnaires were answered using self-report by the principals themselves. The answers of all four questionnaires were 5 degrees with Likert scale. In the current research, for all four questionnaires used, construct validity has been confirmed using first and second order confirmatory factor analysis. The reliability of all the questionnaires and its dimensions in modified model, has been obtained using composite reliability and Cronbach's alpha coefficient above 0.7. To analyze the collected data, the structural equation model with PLS software was used at a significance level of less than 0.05.

### Results

The present study sought to test the following research hypothesis: Performance of school principals in leadership based spiritual on intelligence and spirituality at workplace with the mediation of organizational intelligence is predictable.

Considering the demographic characteristics of the studied sample, all principal studied were women. 128 people (80.5%)had bachelor's education, 24 people (15.1%) had master's education and 7 people (4.4%)had doctorate education. 22 people (13.8%) have experience less than 10 people 86 (54.1%)have vears. experience between 10 and 20 years and 51 people (32.1%) have experience more than 20 years. According to table 1, the mean and standard deviation of the main variables show that LP, OI, SI, SW of the principals of the studied schools were above average with a mean and standard deviation of 76.66±13.97;  $181.44 \pm 27.00;$ 95.06±15.92; 74.54±12.20, respectively.

Variable	Min	Max	Mean± SD	Status
Critical Existential Thinking	12	30	24.78 ±4.68	Higher than Average
Conscious State Expansion	12	25	20.74±3.64	Higher than Average
Personal Meaning	10	25	20.79±3.58	Higher than Average
Production				
Transcendental Awareness	17	35	28.72±4.87	Higher than Average
Strategic vision	13	30	25.13±4.14	Higher than Average
Shared fate	14	35	29.60±5.02	Higher than Average
Appetite for change	14	35	30.19±4.32	Lower than average
Heart	10	25	21.30±3.39	Lower than average
Alignment and congruence	14	35	29.79±4.54	Lower than average
Knowledge deployment	14	35	28.96±5.63	Lower than average
Performance pressure	8	20	16.44±2.84	Lower than average
Meaningful work	12	25	19.98±3.72	Lower than average
Sense of community	12	30	25.11±4.06	Higher than Average
Alignment of organizational	15	35	29.44±5.54	Higher than Average
Leadership performance	36	94	76.66±13.97	Higher than Average
Organizational intelligence	88	215	181.44±27.00	Higher than Average
Spiritual intelligence	51	115	95.06±15.92	Higher than Average
Spirituality at work	40	90	74.54±12.20	Higher than Average

Table 1: Descriptive indicators of research variables

Based on the data in Table 2 and according to the evaluation criteria of the model fit, because the coefficient of determination ( $\mathbb{R}^2$ ) is equal to 0.85 and higher than 0.67 in the model for predicting the leadership performance of principals, it indicates a higher-thanaverage relationship and a good fit structural model. Also, based on the goodness-of-fit (GOF) index, it can be said that considering that in predicting the leadership performance, this index is equal to 0.42 and higher than 0.36, the model has a high goodness of fit, and based on this, the presented general model is valid. According to Table 2, other fit indices also show a high fit of the structural equation model.

Fit Index	Value	Acceptable Fit	Good Fit
$\mathbb{R}^2$	0.857	$0.67 \le R^2 \le 0.33$	$0.99 \le R^2 \le 0.67$
GOF	0.42	$0.36 \le \text{GOF} \le 0.25$	$0.99 \le \text{GOF} \le 0.36$
NFI	0.95	$0.90 \le \mathrm{NFI} < 0.95$	$0.95 \le NFI \le 1.00$
SRMR	0.042	$0.05 \leq SRMR \leq 0.08$	$0 \leq \text{SRMR} < 0.05$

Based on Figure 1, in examining the standard path coefficients of the total effect of spiritual intelligence on leadership performance, the path coefficient was 0.65, the effect of spirituality at work on leadership

performance was 0.27, the effect of organizational intelligence on leadership performance was 0.43, and all three path coefficients are significant with a significance level of less than 0.05. Also, the total effect of spiritual

#### 226 a Predicting the performance of school principals in leadership based on...

intelligence on organizational intelligence was significant with a path coefficient of 0.86, but the total effect of spirituality at work on organizational intelligence was not significant with a path coefficient of 0.1. In Figure 1, the values inside the circles represent the average variance extracted (AVE) of each of the variables, which indicates the construct validity of the variables, and its value must be higher than 0.5, and according to this, all the variables have valid construct validity. In this figure, the factor loading values of each of the items also show, in the modified model, the factor loading values of all items are higher than 0.4 and valid, and it can be said that the modified model has high internal and external fit.

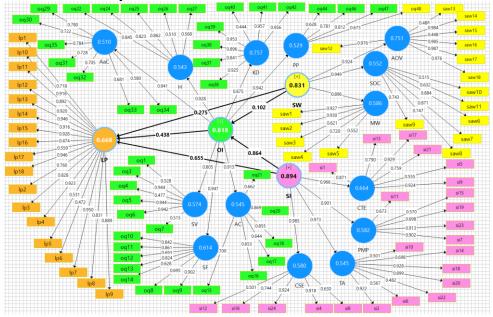


Figure 1. Values of the total effect coefficients of the leadership performance prediction with Average variance Extracted (AVE) and item's outer loading of modified model

Figure 2 shows the values of indirect effects of spiritual intelligence and spirituality at work variables on leadership performance with the mediation of organizational intelligence. Based on this figure, spiritual intelligence with a path coefficient of 0.37 and spirituality at work with a path coefficient of 0.04 at a significance level of less than 0.05 can play an effective role on leadership performance through the mediation of organizational intelligence.

In Figure 2, the values inside the circles show the coefficient of

determination of leadership performance and organizational intelligence variables. Based on these values, both the prediction value of performance leadership based on organizational intelligence, spiritual intelligence and spirituality at work variables and the prediction value of organizational intelligence based on spiritual intelligence and spirituality at work are higher than 0.67, in other words above average, and it can be said that the overall research model also shows its high validity. Based on figures 1 and 2 and the path coefficients of the

effects of all predictor variables on leadership performance, the results showed: Leadership performance was most influenced by SI with an impact factor of 0.65, followed by organizational intelligence with an impact factor of 0.43 and spirituality at work with 0.27 has an effective role on principals' leadership performance.

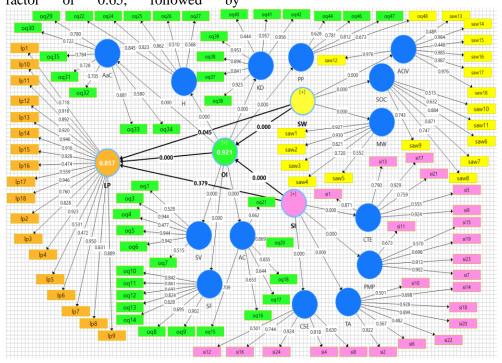


Figure2. Values of the indirect effect coefficients of the leadership performance prediction with R square adjusted of modified model

### Discussion

The results of the present study showed that spiritual intelligence, organizational intelligence and spirituality at work have a direct effective role on the performance of school principals in leadership. Also, spiritual intelligence plays an effective role by mediating organizational intelligence on the performance of school principals in leadership.

The results of the present study have been discussed according to predictor variables. In examining the effective role of spirituality at work on the performance of principals, our coherent with findings are the findings of the researches of Sabetmoltaq & Alvani (2018),Nasrullah et al. (2022), Shikha (2017) and the findings of Soha et al. (2016) is incoherent.

explaining In this finding. attention should be paid to the nature and characteristics of spirituality at work. Spirituality in the organization framework means а of organizational values that, through promotes processes, work the

experience of excellence and the feeling of connection with others in such a way that the feeling of perfection and satisfaction is provided (Arad et al, 2022). In schools, principals who have a deep sense of meaning and meaning in their work, believe that people are connected with each other, feel community with others in the work environment, see their values and goals in line with the values of the school. Spirituality at work is an awareness of the fact that reciprocity, respect and recognition are not limited to ourselves and our private environment, but also apply to all those with whom we work on a regular or casual basis, not just at school. Not only will they lead to more favorable working conditions, but they will also lead to an increase the performance of school in principals in other work areas.

In examining the effective role of intelligence spiritual on the performance of principals, our findings are coherent with the findings of Ghashghaeizadeh et al. (2019), Bavandisani et al. (2019), Asghari et al.(2016), Dehghani et al. (2019), Malik & Tariq (2016), Haque et al. (2022).spiritual intelligence defined as the human ability to generate questions about the meaning of life and, understanding the meaning of them, simultaneously experiencing connections between each of us and the wider world that deliver expectations and transcendence (Skrzypińska, 2021) Managers' possession of spiritual

intelligence can be seen in leadership skill indicators such as: work-life balance skill. leadership skill *·leadership* transcendence meaning and purpose production skill leadership mindfulness skill . leadership virtue behavior (Al eid et al, 2022). The nature of spiritual intelligence as a super-intelligence can help school administrators in determining the position of school management as a link between the educational system of the country and the social system and families, and manifesting the specific task of schools in responding to the needs of students and society and paying attention to Provide environmental changes. Based on this, school principals can rely on spiritual intelligence to have a higher influence and persuasion among school staff and teachers and perform more effective leadership.

In examining the effective role of organizational intelligence on managers' performance, our findings are coherent with the findings of Thannhuber et al. (2017), Shabbir (2016). Rezaeikalantari & Nouri (2020), Habibzadeh et al (2021). From Liebowitz's point of view, organizational intelligence is a collection of all intelligences that help to create a common vision, problem diagnosis, collect, interpret and transmit technical and political information needed in decisionmaking, renewal and orientation for the organization (Bilgen & Elci, 2022). Organizational intelligence is the intelligence of creating policies

and comprehensive organizational management (Awamleh & Ertugan, 2021) and its existence in schools can help solve more problems in

# Conclusion

schools.

Spiritual intelligence is by searching for the meaning of life and the same time connecting at individual activities and behaviors with the meaning of life and making it coherent based on the connection with the world in which we live. This intelligence helps determine and characterize the way of living and working in a community, which can be linked to the desire to preserve internal and external peace (Severino-González et al., 2022). School is with the meaning of life and attention to its connection with the surrounding world, and based on this, they can create higher satisfaction in teachers and students and lead teachinglearning activities in schools with a transcendental orientation. principals who pay attention to spirituality at work also pay attention to personal and family values and employees' enjoyment of work and other aspects of life. They prioritize personal, work the and psychological well-being of employees and are aware of the realities around them, as they really are. With deep spiritual thinking and meaningful sense of work and life, they seek professional values. They pay close attention to all the details in the work environment and can make important and effective work decisions, manage their own and

others' emotions in the work environment, see work with a more comprehensive view with optimism and positivity in the face of work challenges. These variables also help to solve and reflect on everyday problems in search of individual and social well-being (Becerra & Becerra, 2020). Another important concept for organizations in today's challenging organizational conditions is intelligence (Bilgen & Elçi, 2022). Organizational intelligence includes the manager's ability to deal with complexity, the ability to capture, share and extract meaning from market signals, the ability to face survival challenges, adapt to environmental needs, understand the organization as a learning and creative system, and principals who have higher organizational have intelligence will higher performance than principals who have low organizational intelligence. possession Managers' of organizational intelligence leads to a more accurate diagnosis of strengths and weaknesses and methods of problem solving and more accurate access to operational solutions in the possible inadequacies. face of Organizational intelligence includes the knowledge, experience. and information, perception of organizational problems, which can create a smart organization by focusing on knowledge and learning (Torkamani & Maymand, 2016). It is considered as the ability to increase organizational members' performance, to develop information jointly, and to discuss the meanings of organizational learning within the organization (Neyişci & Erçetin, 2020).

Based spiritual this. on intelligence, emotional intelligence spirituality the work and in environment improve the can performance of school principals in leadership. The main limitation of this research is the use of quantitative research methods and questionnaire tools in collecting research data. Based on the findings of the research, it is suggested that in the selection of school principals, consideration should be given to the managers' possession of organizational intelligence, spiritual intelligence, and the orientation of spirituality in their work, as well as the empowerment of current school principals in terms of improving the dimensions of intelligence and the orientation of their work spirituality. Based on the results of the present research, it is possible to be sure of the appointment of managers who are more likely to perform better in schools, through the use of tests to dimensions measure the of intelligence, especially spiritual intelligence and organizational intelligence, as well as spirituality in the workplace. Also, due to the fact that the dimensions of multiple intelligences can be improved, it is possible to improve the emotional spiritual intelligence and of managers through special training courses.

#### **Ethical considerations**

During the implementation of this research and the preparation of the article, all national laws and principles of professional ethics related to the subject of research, including the rights of statistical community, organizations and institutions, as well as authors and writers have been observed. Adherence to the principles of research ethics in the present study was observed and consent forms were consciously completed by all statistical community.

### Sponsorship

The present study was funded by the authors of the article.

### **Conflict of interest**

According to the authors of the present article, there was no conflict of interest.

This article has not been previously published in any journal, whether domestic or foreign, and has been sent to the Journal of School Administration Quarterly for review and publication only.

#### References

Ahmad, B. S., Sadq, Z. M., Othman, B., & Saeed, V. S. (2019). The impact of the quality of work life on organizational intelligence. *International Journal of Psychosocial Rehabilitation*, 23(2), 931– 946.

Albrecht, K. (2002). Organizational intelligence & knowledge management: Thinking outside the silos. *Executive White Paper*, 1-17.

Al Eid N., Arnout B., & Almoied A. (2021). Leader's spirtual intelligence and religiousness: Skills, factors affecting, and their effects on performance (a qualitative study by grounded theory) *J. Public Aff.* ;**21**: e219.

Alrashidi, N., Alreshidi, M. S., Dator, W. L., Maestrado, R., Villareal, S., Buta, J., Pangket, P., Mostoles, R. J., Gonzales, A., Mina, E., & Pasay an, E. (2022). The Mediating Role of Spiritual Intelligence on Well-Being and Life Satisfaction among Nurses in the Context of the COVID-19 Pandemic: A Path Analysis. *Behavioral sciences (Basel, Switzerland)*, 12(12), 515.

Altındağ, Ö., & Öngel, V. (2021). Information Management, Organizational Intelligence, and Innovation Performance Triangle: Empirical Research on Turkish IT Firms. *SAGE Open*, *11*(4),

Andriansyah, E. H., Rafsanjani, M. A., & Priastuti, D. N. (2022). The Importance of Emotional, Spiritual Intelligence, and Self Efficacy on The Principal's Performance in Sekolah Penggerak Program Based on Merdeka Curriculum. Jurnal Kependidikan: Jurnal Hasil Penelitian dan Kajian Kepustakaan di Bidang Pendidikan, Pengajaran dan Pembelajaran, 8(4), 922-930.

Anwar MA, Osman-Gani AM. (2015). The effects of spiritual intelligence and its dimensions on organizational citizenship behaviour. Journal of Industrial Engineering and Management; 8(4):1162.

Arad, M., Alilu, L., Habibzadeh, H., Khalkhali, H., & Goli, R. (2022). Effect of spiritual intelligence training on nurses' skills for communicating with patients an experimental study. *Journal of education and health promotion*, *11*, 127.

Armor, D. (Ed.). (2017). Maximizing Intelligence (1st ed.). Routledge.

Asadzadeh, N., Mohajeran, B., Ghaleei, A., Divband, A., & Javadi, P. (2019). The relationship between Spiritual intelligence and its Components with Job Performance: A case of Teachers of Aslanduz city. *Journal of School Psychology*, 8(2), 7-21.

Asghari, N., Hamidizade, A., & Abedi, R. (2016). Studying the Mediating Role of Creativity, Innovation and Mental Health in the Effect of Spiritual Intelligence on Individual Performance. *Journal of Public Administration*, 8(3), 533-552.

Awamleh, F., & Ertugan, A. (2021). The relationship between information technology capabilities, organizational intelligence, and competitive advantage. *Sage Open*, *11*(2), 21582440211015201.

Bar-On, R., & Fiedeldey-Van Dijk, C. (2022). The Bar-On Model and Multifactor Measure of Human Performance: Validation and Application. *Frontiers in psychology*, *13*, 872360.

Bazrkar, A., & Hajimohammadi, M. (2021). The investigation of the mediating

role of innovation and organizational intelligence on the relationship between knowledge management and financial performance of the organizations active in the e-banking industry. *Independent Journal of Management & Production*, 12(1), 054-079.

Bavandisani, S. M., Malekzadeh, G., & Pooya, A. (2019). Investigating the Effect of Spiritual Intelligence on the Job Performance of the Employees by the Mediating Role of Individual Innovations (Case of Mehre Eghtesad Bank in Khorasan Razavi). *Journal of Social Sciences Ferdowsi University of Mashhad*, 15(2), 173-212.

Becerra, B., & Becerra, D. (2020). Design and validate a scale to measure the profile of spiritual intelligence, in a sample of health workers, *Journal of Rev. Med. Panacea, 9 (1), 23-30.* 

Bilgen, A., & Elçi, M. (2022). The mediating role of organizational intelligence in the relationship between quantum leadership and innovative behavior. *Front Psychol*, *13*, 1051028.

Daňa, J., Caputo, F., & Ráček, J. (2020). Complex network analysis for knowledge management and organizational intelligence. *Journal of the Knowledge Economy*, *11*(2), 405–424.

Dehghani, F., Foroughian Yazdi, F., & Askari, R. (2019). The Job Performance of Emergency Nurses and its Relationship with Spiritual Intelligence and Occupational Hardiness [Original Journal Article]. of Research Development in Nursing and Midwifery, 16(2), 1-10.

Eslampanah, R., & chehri, K. (2022). The mediating role of citizenship behavior in the relationship between spiritual intelligence and organizational performance of Kermanshah University staff. *Journal of New Approaches in Educational Administration*, *13*(1), 102-92.

Estaji, M., & Pourmostafa, P. (2020). The mediating role of spiritual intelligence and teaching experience in perceived leadership styles of EFL teachers: a structural equation modelling analysis. *J. High. Educ. Policy Leaders. Stud* 1, 82–106.

Estanesti, S. (2016). The study of impact spiritual intelligence on job performance of manager. International Academic Journal of Organisational Behavior and Human Resource Management, 3(5). 1–8.

Ford, K. J., & Leist, A. K. (2021). Returns to Educational and Occupational Attainment in Cognitive Performance for Middle-Aged South Korean Men and Women. *Gerontology & geriatric medicine*, 7, 23337214211004366.

Gardner, H. (2006). *Multiple intelligences*. New York: Basic Books.

George, M. (2006). How intelligent are you. really? From IQ to EQ to SQ, with a little intuition along the way. *Train Manage Dev Methods*. 20,411–25.

Ghashghaeizadeh, N., Hoseinpour, M., & jamei, M. (2019). The Prediction of Nurse's Adaptive Performance based on Psychological Capital and Spiritual Intelligence (Case Study: Shaidzadeh Hospital of Behbahan) [Nursing Management and Administration]. *Iranian Journal of Nursing Research*, *13*(5), 52-57 (Persian).

Habibzadeh, S., Mohajeran, B., Ghaleei A., & Hasani, M. (2021). Structural Analysis of the Mediating Role of Organizational Commitment in the Relationship between Organizational Agility and Organizational Intelligence with Organizational Performance (Case Study: Northwest University Jihad Units). *Iranian Evolutionary and Educational Psychology*; 3 (3): 332-344.

Hamad, Z. M. M. (2019). Talent management as a facilitator of organizational intelligence. *Management Science Letters*, 9(6), 809–822.

Haque, A., Chowdhury, N. A., Islam, M. A., Hossain, M. S., & Sarker, M. A. (2022). Tracing the route to organisational performance through expatriate leadership effectiveness: the role of emotional, cultural and spiritual intelligence. *Int. J. Business Excellence*, *10*.

Ismail, H., & Al-Assa'ad, N. (2020). The impact of organizational intelligence on organizational agility: An empirical study in Syrian private banks. *International Journal of Academic Research in Business and Social Sciences*, 10 (2).

Javan, Rabieh. (2022). The predictive role of spirituality in job burnout and job performance of elementary teachers in Nikshahr city, Bent region. *Ormazd research paper*. 58 (2); 114-136 (Persian).

Jena, L.K. (2022). "Does workplace spirituality lead to raising employee performance? The role of citizenship behavior and emotional intelligence", *International Journal of Organizational Analysis*, Vol. 30 No. 6, pp. 1309-1334.

Kateb, A., Arabzadeh, M., & Zarei, S. (2023). The relationship between organizational intelligence and organizational performance with the mediation of creativity. *Journal of*  *Innovation and Value Creation*, 21(11), 77-90. (Persian).

Keykha, A., & Abbaspour, A. (2019). The Relationship between Organizational Intelligence and Organizational Performance with the Mediation of Creativity (Case Study: University of Tehran). *Journal of Innovation and Creativity in Human Science*, 8(4), 1-32 (Persian).

King DB., & De Cicco TL. (2009). A viable model and self-report measure of spiritual intelligence. *Int J Transpers Stud.* 28, 2–8.

King DB. (2008) *Rethinking claims* of spiritual intelligence: A definition, model,and measure. Peterborough, Ontario: Trent University.

Krijgsheld, M., Tummers, L. G., & Scheepers, F. E. (2022). Job performance in healthcare: a systematic review. *BMC Health Serv Res*, 22(1), 149.

Labetubun, M. R., & Dewi, I. G. A. M. (2022). Organizational Commitment: It's Mediating Role in the Effect of Human Resource Management Practices and Workplace Spirituality on Employee Performance. *European Journal of Business and Management Research*, 7(2), 112–123.

Lewis, P. v. (2019). Intrinsic Spirituality as a Context for Motivation. *Journal of Organizational Psychology*, 19(5).

Lianto, L. (2023). Spirituality at Workplace: A Brief Literature Review. *Journal of Social Research*, 2(2), 271-280.

Liu, Y., Zhang, F., Liu, P., Liu, Y., & Liu, S. (2023). "I'm energized to" & "I'm able to": A dual-path model of the influence of workplace spirituality on high-speed railway drivers' safety performance. *Safety Science*, 159, 106033.

Ma, Q., & Wang, F. (2022). The Role of Students' Spiritual Intelligence in Enhancing Their Academic Engagement: A Theoretical Review. *Frontiers in psychology*, *13*, 857842.

Madadi R., & Talebi B. (2020). Structural Analysis of Teacher's Job Innovation Based on Transformational Leadership. *MEO*; 8 (2): 83-102 (Persian)

Mahmoodi, A., Yousefi, B., Khazaei, A., & Eskandari, S. (2019). Designing the related structural equation model of organizational intelligence and organizatio performance in sport of organizational experts Tehran Municipality: The mediating function of the deployment process of Six Sigma. Journal of Sport Management, 11(1), 133-154

Malik, M., & Tariq, S. (2016). Impact of Spiritual Intelligence on Organizational Performance. *International Review of Management and Marketing*, 6, 289-297.

Milliman J., Czaplewski A., & Ferguson J. (2003) Workplace spirituality and employee work attitudes. *Journal of Organizational Change Management*, 16(4):426-47.

Moghaddam Hosseini, S., & Talebi, B. (2018). A Partial Least Squares Path Model of Principals' Performance in School Health Services Based on Spiritual Intelligence in Tabriz Female High Schools. *International Journal of School Health*, 5(3), 1-8.

Mohajeran, B., GHalenoi, A., & Rahmani, E. (2015). Model of Comprehensive Evaluating of the Performance of Schools with Integrated Model. *The Journal of Modern Thoughts in Education*, *10*(3), 104-189 (Persian).

Moon, TW., Youn, N., Hur, WM., & *et al.* (2020) Does employees' spirituality enhance job performance? The mediating roles of intrinsic motivation and job crafting. *Curr Psychol* **39**, 1618–1634

Mossadegh, H., & Khoshghamat, A. (2020). The Study of the Relationship Between Spirituality in Work and Responsibility with Educational Performance of Teachers of Elementary School in Qom City. *The Journal of Theory and Practice in Teachers Education*, 5(8), 111-126 (Persian).

Nasrullah, M., Ginting, G., & Hidayah, Z. (2022). Impact of Workplace Spirituality and Deviant Behavior on Personnel Performance Moderating and Mediation Effects. *International Journal of Multicultural and Multireligious Understanding*, 9(11), 7-18.

Neyişci, N., & Erçetin, Ş. Ş. (2020). The effect of social network interactions on development of organizational intelligence. *Hacettepe University Journal of Education*, 35(2), 354–374.

Nurzaman, L., & Amalia, L. (2022). The Effect of Emotional Intelligence and Spiritual Intelligence on Lecturer Work Performance. *Eligible: Journal of Social Sciences*, *1*(1), 50-71.

Obregon, S.L., Lopes, L.F.D., Kaczam, F., & et al. (2022) Religiosity, Spirituality and Work: A Systematic Literature Review and Research Directions. *J Bus Ethics*, 179, 573–595.

Ohno, K., Tomori, K., Sawada, T., & Kobayashi, R. (2021). Examining minimal important change of the Canadian Occupational Performance Measure for subacute rehabilitation hospital inpatients. J Patient Rep Outcomes, 5(1), 133.

Pant N., & Srivastava SK. (2019). The impact of spiritual intelligence, gender and educational background on mental health among college students. *J Relig Health.* ; 58:87–108.

Pashayee, J., Talebi, B., & Daneshvar, Z. (2021). School Human Resource Development's Policymaking Model: A Grounded Theory Study. *School Administration*, 9(4), 148-161.

Ras, J., Smith, D. L., Kengne, A. P., Soteriades, E. E., & Leach, L. (2022). Cardiovascular Disease Risk Factors, Musculoskeletal Health, Physical Fitness, and Occupational Performance in Firefighters: A Narrative Review. J Environ Public Health, 2022, 7346408.

Rathee, R., & Rajain, P. (2020). Workplace Spirituality: A Comparative Study of Various Models. *Jindal Journal of Business Research*, 9(1), 27-40.

Rezaeikalantari, M., & Nouri, A. (2020). The Relationship between Moral Intelligence and Organizational Intelligence with Job Performance of Mazandaran Province Police. *NAJA Human Resources*, 11(60), 85-108 (Persian).

Sabetmotlagh, M., & Alvani, M. (2018). Designing a Model Explaining the Relationship of Spirituality in the Workplace with Human Resource and Organizational Performance. *The Journal of Productivity Management*, *12*(3(46)), 39-67 (Persian).

Severino-González, P., Toro-Lagos, V., Santinelli-Ramos, M. A., Romero-Argueta, J., Sarmiento-Peralta, G., Kinney, I. S., Ramírez-Molina, R., & Villar-Olaeta, F. (2022). Social Responsibility and Spiritual Intelligence: University Students' Attitudes during COVID-19. *International journal of environmental research and public health*, 19(19), 11911.

Sahami, S., & Rahavi Azabadi, M. (2022). Investigating the relationship between social capital and organizational spiritual intelligence with the job performance of employees of Yazd Education Department. *Work Psycologhy*, 1(1), 35-44 (Persian).

Shabbir, M. Q., Khalid, W., & Ali, M. H. (2016). Organizational Intelligence and Employee Performance: The Mediating Role of Distributive Justice. *Information Management and Business Review*, 8(5), 39-47.

Shafizadeh, H., & Gila, M. (2018). Predict the performance of employees based on spirituality in the workplace and organizational support. *The Journal of Productivity Management*, *12*(2(45)), 177-198.

Shikha, Vyas-Doorgapersad. (2017). Workplace spirituality for improved productivity: A gendered perspective, *International Journal of Social Sciences and Humanity Studies*. Vol 9, No 2, 143-156.

Skrzypińska, K. (2021) Does Spiritual Intelligence (SI) Exist? A theoretical Investigation of a Tool Useful for Finding the Meaning of Life. *J. Relig. Health.* 60: 500–516.

Soha, H M., Abdullah, O., Shahrul, N S., Safizal, A., & Norfaizzah R. (2016). "The Relationship of Work Influence, Sense of Community and Individual Spirituality Towards Organizational Performance." *Procedia Economics and Finance* 35, 591-96.

#### 236 🔉 Predicting the performance of school principals in leadership based on...

Soltani, M., Mohammadi, M., & Aghiliattar, M. (2019). Investigating the relationship between the deepening of spirituality and the performance of IRGC employees. *Islamic management*. Vol 27, No 2; 43 - 67 (Persian).

Soomro, B.A., Saraih, U.N., & Tunku Ahmad, T.S. (2022). "Personality traits, organizational cynicism and employee performance among academic leaders", *International Journal of Educational Management*, Vol. 36 No. 7, pp. 1152-1175.

Taqipoorzaheer, A., Taheri, A., & Jafari, P. (2019). Study Components and Main Indicators of School Performance Evaluation. *Social Science Quarterly*, 69-95 (Persian).

Talebi, B., & khalilzadeh, A. (2017). Explaining School principals' conflict management based on their job burnout and stress in Khoy and Chaypareh. *Sociological studies*, *10*(34), 51-68 (Persian).

Thannhuber, M. J., Bruntsch, A., & Tseng, M. M. (2017). Knowledge management: Managing organizational intelligence and knowledge in autopoietic process management systems Ten years into industrial application. *Procedia CIRP*, *63*, 384–389.

Torkamani, B., & Maymand, M. M. (2016). Investigation of the relationship between organizational intelligence and strategic thinking and determination of its role in creation of a mindful organization: A case study research. *Mediterranean Journal of Social Sciences*, 7(3, S2), 79– 85.

Vaparzeh, F., Talebi, B., & sameri, M. (2019). Structural Analysis of School Administrators Performance Based on Professional Ethics in Health Promoter Schools. *School Administration*, 7(3), 212-195.

Vaughan, F. (2002). What is spiritual intelligence? *J. Humanist. Psychol.* 42, 16–33.

Zarei, A., Farsizadeh, H., Syahsarayi, M., & Dehghanisoltani, M. (2015). The impact of organizational intelligence on organizational performance using marketing capacities. *Journal of Executive Management*, 7(13), 2-2 (Persian).

Zohar, D., & Marshall, I. (2001). SQ Spiritual Intelligence: The Ultimate Intelligence. London: Bloomsbury Publishing.

Zohar, D. (2010). Exploring spiritual capital: An interview with Danah Zohar. *Spirit. High. Educ.* 5, 1–8.

Wagner JIJ., &Brooks D. (2016). Urban AM. Health Care Providers' Spirit at Work Within a Restructured Workplace. *West J Nurs Res*, 40(1):20-36.

Watoni M., & Hibbul, Joko S. (2020) The influence of workplace spirituality and workplace climate on employee performance, *International Journal of Economics, Business and Accounting Research*, 4, 01.

Wigglesworth, C. (2006). Why spiritual intelligence is essential to mature *leadership. Integ. Leader. Rev.* 6, 1–17.

# Author: Samereh Moghadam Hossein Email: samerehmoghaddam@gmail.com

has a Ph.D. in educational administration and has several published articles in scientific research journals and various scientific conferences. She has published two books on "intelligence in public administration" and "Educational administration"

