



Modelling the factors of workplace spirituality in healthcare organization

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Abstract

The term spirituality has got gravid and diverse meanings than we observe and most often it got confused with religion. Spirituality and religion are not identical and has different connotations. It is considered as an important entity in every organization as it can productively contribute in uplifting the work systems. The objective of this paper is to understand various spirituality factors influencing at work systems in hospitals. In order to study this, Interpretive Structural Modelling (ISM) approach is used to analyse the relationship among the factors of workplace spirituality. The paper projects forwards the most influential factors of workplace spirituality as pro-environmental behavior, job overload, and environmental passion which influence to its fullest in regulating the efficiency of the system, especially hospitals.

Keywords: Workplace Spirituality; Organizational Commitment; Job Satisfaction; Interpretive Structural Modelling

1. Introduction

The word "spirituality" was derived from the Latin word "Spiritus" which means breath, courage, vigor, the soul life. It has a variety of meanings, most people have a different opinion like Spirituality is the nature of art, god-like presence, it is a feeling of constancy, it is the inner life, it helps to recognize what is going on within you and tunes us in some sort of situation. Even though spirituality and religion have different meaning, they are two related, but separate concepts. While spirituality and religion are commonly believed as identical, researchers have recognized the differences between the two. There are more false notions about spirituality in the workplace.

Spirituality is essential for interactions with employees, consumers and community in an organization. The linkage between faith or religiousness delivers a positive health outcome. Organizational barriers provide a greater insertion of spirituality in healthcare for developing a helpful association. These include causing widespread input from all staff and clinicians in identifying a core or common values, ethics, and a philosophy of care.

2. Literature review

The literature is comprised of two parts, namely workplace spirituality factors in organisations and it is followed by ISM approach.

2.1. Literature review on workplace spirituality

Afsaret al. (2016) discussed that positive emotions, enthusiasm and ingenuity make more contribution in the workplace. This is a moral behavior and it influences the pro-environmental actions such as contentment, gratification and spiritual welfare. Environmental passion makes a big difference in the organization by contributing to preserving the environment. Environmental passion

and pro-environmental behavior relate to one another in such a way environmental passion brings out affirmative inspiration in an individual who wishes to engage in pro-environmental behaviors. This makes the individual tackle the environmental issues and helps them in understanding the significance and impetus of work. Data was collated from experienced employees from across numerous industries in Thailand. The studies' results show that spirituality has a constructive impact on pro-environmental behavior. Altaf and Awan (2011) discussed that an employee undergoes stress due to work overload. This, in turn, affects the organization, employee's family and friends as they undergo pressure by working extra time. Also, many workers face troubles when their workload and timings increase and their leisure time get decreased day by day. This eventually declines their Health condition and becoming a major social issue. In order to reduce the stress level, most companies have started to provide training for the employees to be active and improve their social behavior. The data was collected from 76 employees of an organization. The study results in Workplace spirituality have an impact on job satisfaction.

Dehaghiet al. (2012) analyzed that the obligation to carry forward in order to complete the given task with respect to every employee. Employee commitment is nothing but the degree to which an employee wants to participate continuously actively. The findings indicate that those employees that encounter spirituality at work, felt more in touch with their organization and also perceived a sense of commitment and faithfulness.

Promsri (2016) investigates the degree of completeness one achieves while performing his duty. Promsri (2016) discusses the Employee's intention to stay or leave the current organization. The author also states that workplace spirituality is an originative fore-runner to relationship-oriented selling characteristics. Their results indicated that workplace spirituality and work satisfaction had a significant negative effect on intention to leave.

Marschke et al.(2011), investigated organizational dedication and its connection with spirituality in the workplace. The data was collected based on research points. This paper says about the at-

tachment of an employee towards the organization. This study shows an affirmative association between workplace spirituality and devotion to the organization, and that when any organization faces economic recession and global rebellion it is imperative that the senior management utilize this spirituality angle.

Sorakraikitikul and Siengthai (2014) analyses the importance of the institution’s edification on information disseminating attitude of staff and workplace spirituality. The data was collected from employees of various Thai Industries and tested using structural equation modeling. The results found that a productive association exists between organizational learning system and workplace spirituality, partly effectuated by knowledge-sharing behaviors.

Pradhan and Jena (2016) examined the angle of workplace spirituality in employee conduct through the construct of employee involvement and organizational dedication. Data was collated from academicians and HR executives. The study found that factors of workplace spirituality notably sway job behavior approach.

2.2. Literature review on ISM

ISM approach is applied in the various areas and it is demonstrated in Table 1

Table 1: ISM Approach Applications

Sl.No	Authors	Application area
1	Govindan et al. (2013)	Analysis of green SCM practices in Brazil’s electrical/electronics industry using ISM.
2	Talib et al. (2011)	Analysis of hurdles in TQM implementation using ISM.
3	Govindan et al. (2012)	Review of 3 rd party reverse logistics provider using ISM.
4	Alawamleh and Popplewell (2011)	Analysis of threat sources factors in a virtual organization using ISM.
5	Thakkar et al. (2008)	Analysis of IT-enablers in manufacturing organizations using ISM.
6	Mehta et al. (2014)	Analysis of TQM implementation factors in engineering education using ISM.
7	Azevedo et al. (2013)	Study on automotive SCM performance factors using ISM.
8	Saleeshya et al. (2012)	Framework developed for agility assessment in supply chain network using ISM with analytic hierarchy process
9	Ambika Devi Amma et al. (2015)	Applied ISM for analysing major threads of cloud computing
10	Patri and Suresh (2017b)	Applied total ISM for analysing agile factors in healthcare organisation.

3. Methodology

The following steps are used to illustrate modelling procedures of ISM (Patri and Suresh, 2017a):

- 1) Identification of factors through expert interview and literature survey. Table 2 depicts the identified factors affecting spirituality in workplace.
- 2) Self-structured interaction matrix: Deriving a contextual association between the pair of factors, which are mentioned below:

- V: i alters j
- A: j alters i
- X: i and j alters each other
- O: J and I are unrelated

The pair wise comparisons of factors are taken from opinions of 10 experts. The highest mode of opinion is selected from the opinions of all experts. The “Self-Structured Interaction Matrix” (SSIM) extracted from mode of opinions of each pair is depicted in Table-3.

- 3) “Initial reachability matrix”: The evolution of “Initial Reachability Matrix” from SSIM and the conversion steps are mentioned below:

From SSIM(i, j) entry	V	A	X	O
To initial reachability matrix (i, j) entry	1	0	1	0
To initial reachability matrix (j, i) entry	0	1	1	0

The initial reachability matrix for workplace spirituality in hospital is shown in Table 4.

- 4) “Final reachability matrix”: Expansion of the ‘Final Reachability Matrix’ from initial reachability matrix through transitivity analysis, which follows that

First level transitivity (for 1*): if X=Y; Y=Z; then X=Z
The results are shown in Table 5.

- 5) Partition of the final reachability matrix:

Partitions of the final reachability matrix are mainly based on the three sets, i.e. reachability set, antecedent set and intersection set. The row elements of final reachability matrix are present in the reachability set, column elements of final reachability matrix are present in the antecedent set. The common elements are present in the intersection set. Iteration-1, the intersection elements are only present in the reachability set, those enablers are removed from the set and designated as level-1 factors. Then go to next iteration, repeat the process until all the factors are removed from the set. At the end of this process we get partitioned reachability matrix in to different levels and it is depicted in Table 6, 7, 8, and 9.

- 6) Digraph Creation

Digraph is created using information from final reachability matrix and level partitions. In digraph factors are placed in ascending order i.e. first level factor at top of the digraph and second level factor at second position and so on until the lowest level factor is placed at the lowest level in the digraph. The ISM model is depicted in Figure 1.

Table 2: Identified Factors Affecting Workplace Spirituality in Healthcare

Factors	Description	Reference
Organizational Commitment (F1)	Attachment of an employee towards the organization	Marschke et al., (2011)
Job Overload (F2)	A situation in which one individual has multiple tasks to do in a very limited time frame	Altaf and Awan (2011)
Organizational learning culture (F3)	It is a process of transferring and creating knowledge inside the organization	Sorakraikitikul and Siengthai (2014)
Work Satisfaction (F4)	The degree of completeness one achieves while performing his duty.	Promsri (2016)
Intention to leave (F5)	Employee’s intention to stay or leave the current employing organization	Promsri (2016)
Sense of responsibility (F6)	The obligation to carry forward and complete the given task	Dehaghiet al.(2012)
Employee commitment (F7)	The element of dedication shown by an employee	Dehaghiet al.(2012)
Employee engagement (F8)	Employees getting involved in the works that is assigned to them	Pradhan and Jena(2016)
Environmental passion (F9)	An emotion by which an individual engages in Pro-Environmental behaviors	Afsaret al. (2016)
Pro-environmental behavior (F10)	Proactive employee attitude that aims to resolve environmental issues.	Afsaret al. (2016)

Table 3: SSIM for Workplace Spirituality in Healthcare

	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
F1	1	O	V	V	A	O	O	O	A	O
F2		1	O	O	V	V	O	O	O	X
F3			1	O	A	X	O	X	O	A
F4				1	V	O	V	O	O	O
F5					1	O	V	O	O	O

F6					1	X	O	O	O
F7						1	O	O	O
F8							1	O	O
F9								1	A
F10									1

Table 4: Initial Reachability Matrix

	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
F1	1	0	1	1	0	0	0	0	0	0
F2	0	1	0	0	1	1	0	0	0	1
F3	0	0	1	0	0	1	0	1	0	0
F4	0	0	0	1	1	0	1	0	0	0
F5	1	0	1	0	1	0	1	0	0	0
F6	0	0	1	0	0	1	1	0	0	0
F7	0	0	0	0	0	1	1	0	0	0
F8	0	0	1	0	0	0	0	1	0	0
F9	1	0	0	0	0	0	0	0	1	0
F10	0	1	1	0	0	0	0	0	1	1

Table 5: Final Reachability Matrix

	F1	F2	F3	F4	F5	F6	F7	F8	F9	F10
F1	1	0	1	1	1*	1*	1*	1*	0	0
F2	1*	1	1*	1**	1	1	1*	1**	1*	1
F3	0	0	1	0	0	1	1*	1	0	0
F4	1*	0	1*	1	1	1*	1	1**	0	0
F5	1	0	1	1*	1	1*	1	1*	0	0
F6	0	0	1	0	0	1	1	1*	0	0
F7	0	0	1*	0	0	1	1	1**	0	0
F8	0	0	1	0	0	1*	1**	1	0	0
F9	1	0	1*	1*	1**	1**	1**	1**	1	0
F10	1*	1	1	1**	1*	1*	1**	1*	1	1

Table 6: Iteration -1 of Level Partition of Factors

Factors	Reachability Set	Antecedent Set	Intersection Set	Level
1	1, 3,4,5,6,7,8	1, 2,4,5,9,10	1,4,5	I
2	1, 2,3,4,5,6,7,8,9,10	2,10	2,10	
3	3,6,7,8	1, 2,3,4,5,6,7,8,9,10	3,6,7,8	
4	1, 3,4,5,6,7,8	1, 2,4,5,9,10	1,4,5	
5	1, 3,4,5,6,7,8	1, 2,4,5,9,10	1,4,5	I
6	3,6,7,8	1, 2,3,4,5,6,7,8,9,10	3,6,7,8	
7	3,6,7,8	1, 2,3,4,5,6,7,8,9,10	3,6,7,8	I
8	3,6,7,8	1, 2,3,4,5,6,7,8,9,10	3,6,7,8	I
9	1, 3,4,5,6,7,8,9	2,9,10	9	I
10	1, 2,3,4,5,6,7,8,9,10	2,10	2,10	

Table 7: Iteration -2 of Level Partition of Factors

Factors	Reachability Set	Antecedent Set	Intersection Set	Level
1	1, 4,5	1, 2,4,5,9,10	1,4,5	II
2	1, 2,4,5,9,10	2,10	2,10	
4	1, 4,5	1, 2,4,5,9,10	1,4,5	II
5	1, 4,5	1, 2,4,5,9,10	1,4,5	
9	1, 4,5,9	2,9,10	9	II
10	1, 2,4,5,9,10	2,10	2,10	

Table 8: Iteration-3 of Level Partition of Factors

Factors	Reachability Set	Antecedent Set	Intersection Set	Level
2	2,9,10	2,10	2,10	III
9	9	2,9,10	9	
10	2,9,10	2,10	2,10	

Table 9: Iteration-4 of Level Partition of Factors

Factors	Reachability Set	Antecedent Set	Intersection Set	Level
2	2,10	2,10	2,10	IV
10	2,10	2,10	2,10	IV

4. Results and discussion

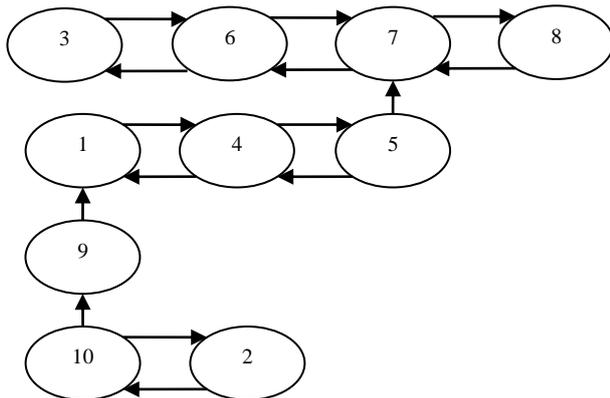


Fig. 1: ISM Model for Workplace Spirituality in Healthcare.

Level IV Factors: 10 and 2

Factors 10 and 2 are pro-environmental behavior and job overload. All these factors are interdependent on each other. When an employee is overburden with their work duties, then they don't have time for volunteering the environment issues. Also factor 10 influences factor 9. An individual need to have passion towards the work they do.

Level III Factor: [9]

The environmental passion influences organizational commitment.

Level II Factors: [1-4] and 5

Factors [1-4] and [5] are organizational commitment, work satisfaction and intention to leave. Factor 1 and Factor 4 are interdependent on each other. When an employee has a positive attachment towards the company he/she work then they feel the completeness in the job they do. Factor 4 and Factor 5 are interdependent on each other. Factor 4 and 5 are work satisfaction and intention to leave. When an employee is not satisfied with the work he/she in an organization then there are more chance of them to quit their job. Whereas when he/she is satisfied with the work environment in their organization then they will stay in that organization. Factor 5 is influencing Factor 7. Factor 7 is employee commitment. When an employee is having an intention to leave the organization then the amount of commitment they put in the organization will be less.

Level I Factors: 3, 6, 7 and 8

Factors 3, 6, 7 and 8 are Organizational learning culture, sense of responsibility, employee commitment and employee engagement. Factor 3 and Factor 6 are interdependent on each other. It is the responsible of all the employee in organization to transfer and create the knowledge inside the organization. Factor 6 and Factor 7 are interdependent on each other. When the employee is having the obligation to complete the task given then they want to continue actively participating or involve in the activities. Factor 7 and Factor 8 are interdependent on each other. If the employee wants to continue to participate in the activities then the employees will get involved in the things they do. So, these two factors are interdependent on each other.

5. MICMAC analysis

MICMAC analysis is the cross-impact matrix multiplication applied to classification and it's an operational method. MICMAC rank helps to classify the identified factors based on their driving power and dependence power. In this MICMAC analysis, the variables involved in the study are classified broadly into four categories viz. autonomous factors(zone-I), dependent factors(zone-II), linkage factors(zone-III), independent/key factors(zone-IV) and corresponding MICMAC graph is presented in Figure 2.

		Zone-IV					Zone-III				
Driving Power ↑	10	F2,F10									
	9										
	8			F9							
	7						F1,F4,				
	6										
	5										
	4									F3,F6,	F7,F8
	3										
	2										
	1										
		1	2	3	4	5	6	7	8	9	10
		Zone-I					Zone-II				
		Dependence Power →									

Fig. 2: MICMAC Graph.

In this graph, none of the autonomous factors falling in the zone-I. The factors (F3, F6, F7 and F8) organizational learning culture, sense of responsibility, employee commitment and employee engagement are the weak drivers but have strong dependence power. So, these factors should be considered with care as these factors can influence the workplace spirituality in health care. The linking factors (F1, F4 and F5) organizational commitment, work satisfaction and intention to leave have strong driving power and strong dependency power. They have high significance in workplace spirituality. The factors in the zone IV (F2, F9 and F10) job overload, environmental passion and pro-environmental behavior have a powerful driving influence and feeble dependence influence which can create a great impact in the workplace spirituality in health care.

Table 10 conveys "MICMAC" rank from the analysis whereby the first rank is consonant with the most imperative factors and Rank 4 links to the minimally crucial factors among all.

Table 10: MICMAC Analysis of Factors Rank

Factor	Driving power	Dependence power	Driving power / Dependence power	MICMAC rank
F1	7	6	1.167	3
F2	10	2	5.000	1
F3	4	10	0.400	4
F4	7	6	1.167	3
F5	7	6	1.167	3
F6	4	10	0.400	4
F7	4	10	0.400	4
F8	4	10	0.400	4
F9	8	3	2.667	2
F10	10	2	5.000	1

6. Conclusion

This paper aims to provide a complete angle of the workplace spirituality in healthcare. Also, this study helps in providing information for healthcare sector in a way to improve productivity, efficiency, employee engagement, safety culture and also improves the happy living by considering both work and life. This study takes into consideration of ten factors which includes the overall consideration of spirituality in workplace. The ISM approach helps in identifying critical factors that affects performance of employees in healthcare. This study provides the interpretation of interaction between each and every factors and it is one of the pioneer works in workplace spirituality factor analysis in healthcare sector, especially in an Indian context. The job overload and pro-environmental behavior is the most influential factors to improve the workplace spirituality. The usage of MICMAC approach in this study is added advantage of ranking variables will help to identify specific one, which cause a problem. This also aids us to get deep insights about inter-connection among multiple attributes by answering the below questions.



RQ1: What is the relationship among the factors that influence workplace spirituality in hospitals?

RQ2: How do these factors affect one another?

RQ3: Can we rank these factors?

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