

Job Stress among Health Care Professionals in Selected Hospitals with Special Reference to Age and Gender

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Abstract: Health care profession is known to be a stressful job. These professionals working at selected hospitals affected with more stress. The aim of the present study has been carried out to investigate the levels of stress among various health care professionals (doctors, nurses and supporting staff) to identify the difference according to the age groups, gender and marital status. The cross sectional survey of the health care professionals were (n=1200) chosen randomly from eight selected hospitals at four different places in south India. A self-administered questionnaire was used for data collection; this questionnaire contained various items on psychosomatic symptoms, socio-demographic data, job satisfaction, health problems and emotional load. The findings of the present study suggest that, the health care professional's age > 41 years feels significantly ($p < 0.05$) higher level of job stress when compared to other age groups. Further, based on the gender, the male health care professionals feel significantly ($p < 0.05$) high stress when compared to females. According to the marital status, the married health care professionals feel significantly ($p < 0.01$) higher level of job stress when compared to unmarried professionals. The results showed that, the married male health care professionals with the age of > 41 years feel more job stress when compared to other health care professionals.

Keywords: Job stress, Health care professionals, Age, Gender, Marital status.

1. Introduction

Interest in stress and its effects on human beings has received considerable attention during the past several years. According to Selye (1956) stress is "any external event or internal drive which threatens to upset the organism equilibrium". Stressful work may propagate substances abuse amongst workers, which they might use to reduce or cope with stress (NIH, 2008). Job stress can be defined as the harmful physical and emotional responses that occur when the requirements of the job do not match the capabilities, resources or needs of the worker (Bhatia *et. al*, 2010).

Stress is an unavoidable characteristic of life and work. In any job, there are wide variety of potential causes of stress, some of which are common to both men and women, and others are specific to each group. Occupational stress describes physical, mental and emotional wear and tear brought about by incongruence between the requirement of job and capabilities, resources and needs of the employee to cope with job demands (Akinboye *et al.*, 2002).

Stress can reduce the enjoyment of life, cause hypertension, cardiac problems, reduce immunity, contribute to substance abuse, lead to frustration, irritability and reduce the overall status of mental and physical wellbeing. Stressful work may propagate substance abuse amongst workers, which they might use to reduce or cope with stress (NIH, 2008).

The present study reveals that there is any relationship between age, gender and marital status influencing the job stress among health care professionals working in selected hospitals.

2. Review of Literature

Reddy and Ramamurthy (1991) analyzed the influence of age on stress experience of a person. The sample consisted of 200 executives. The results revealed that executives in the age group of 41-50 experienced more stress than the age group of 51-60. Moderating variables among executives experiencing stress include not only age but also the years of service in the employment. Virk *et al.* (2001) conducted a study on occupational stress and work motivation in relation to age, job level and type-A behaviour. He reported that age and job can have strong influence on job stress. Rastogi and Kashyap (2003) conducted a study on "occupational stress and work adjustment among working women". Sample consisted of 150 nurses, clerks, and teachers. The average age of the sample is quite matured and experienced, which help them to ignore the stress and maintain the smooth adjustment in the organization. Anitha Devi (2007) aimed at identifying the degree of life stress and role stress experienced by professional women. A total sample of 180 women professionals belonging to six occupations were chosen for the study. The results revealed that, the older person experience lower life stress and role stress. Younger people experience more stress as compared to older people. The greater the numbers of years of service the greater life and role stress. The lower the income, greater stress experienced *i.e.* stress decreases with increase in income.

Sahu and Mishra (1995) made an attempt to explore gender differences in relationship between stresses experienced in various areas of life. The sample for the study was 120 men and 120 women teachers. The result revealed the significant positive relationship between

works related stress and society related stress in males. On the other hand, in females, a significant positive relationship was observed between family stress and society related stress. Bhagawan (1997) studied on job stress among 53 male and 47 female teachers from 20 schools in Orissa. It was found from the results that male teachers experienced more stress compared to female teachers. Barkat and Asma Praveen (1999) studied the effect of gender on organizational role stress. The sample consisted of 50 managers, 25 male and 25 female of SBI. The age range of the subjects was between 36-55 years. Results indicated that females showed lower degree of role stress than their male counterparts.

Pradhan and Khattri (2001) studied the effect of gender on stress and burn out in doctors. They have considered experience of work and family stress as intra-psychic variables. The sample consisted of 50 employed doctor couples. Mean age was 40 years for males and 38 years for females. The result indicated no gender difference in the experience of burn out, but female doctors experience significantly more stress. Triveni and Aminabhavi (2002) conducted a study to know the gender difference in occupational stress of professional and non- professionals. The sample consisted of 300 professionals (doctors, lawyers and teachers) and 100 non professionals. The result revealed that women professionals experience significantly higher occupational stress than men due to under participation.

3. Methodology

The research is descriptive in nature. The data was collected from eight selected hospitals doctors, nurses and supporting staff from four cities like Hyderabad, Bangalore, Tirupati and from Nellore through a standard questionnaire, known as “Hari, S. (2005) Stress Inventory”.

4. Tool Used

The stress inventory was developed by Hari, S. (2005) is a tool to measure the amount of stress experienced in daily life. It is a 66 – item scale with five alternatives (5 point scale), ‘fully agree’ ‘agree’, ‘undecided’, ‘disagree’ ‘fully disagree’. This Stress inventory is based on the writing of James (1982), Sutherland and Cooper (1990) and Pohorecky (1991).

5. Reliability of the Scale Sampling

Convenient sampling method was used to select the sampled units within the hospitals for the study. Twelve hundred (1200) questionnaires were collected from doctors, Nurses and Supporting staff from eight hospitals and identified the difference between male and female health care professionals and to identify the job stress among different age groups. These eight hospitals were taken from four different cities. Two are from major cities and two are from minor cities respectively.

Statistical data analysis: Data was analyzed using appropriate statistical techniques viz., frequency tables, cross tables and Chi-square tests (SPSS software, version 20).

6. Limitations of the Study

- The study was carried out on a very small sampling size and therefore does not give clear idea of the actual stress levels among healthcare professionals.
- The reluctance of respondents to fill the questionnaire was felt the major difficulty. As 1500 questionnaires were distributed and 1222 filled questionnaires were received. Most of them were not in a time to complete the questionnaire among them 22 questionnaires didn’t furnish the required information, so they were rejected and rest 1200 questionnaires were considered for the study.

Table 1: Demographic characteristics of responding health care professionals

Variable	Number	Percentage
Age (years)		
20-30 years	625	52.1%
31-40 years	381	31.8%
> 41 years	194	16.2%
Gender		
Male	613	51.1%
Female	587	48.9%
Marital status		
Married	702	58.5%
Unmarried	498	41.5%

Table 1 represents the demographic characteristics of the respondents. The demographic characteristics of the health care professionals are categorized into three different variables. i.e., age, gender and marital status. Out of 1200 respondents, 625 (52.1%) of respondents are of age between 20-30 years and 381 (31.8%) of respondents are of age between 31-40 years and 194 (16.2%) of respondents are with the age of >41 years were taken as sample. Based on the gender variable, out of 1200 respondents, 613 (51.1%) of male health care professionals participated in the study and 587 (48.9%) of female professionals were taken as sample. Coming to marital status, 702 (58.5%) of married professionals are taken as sample and 498 (41.5%) of unmarried health care professionals are taken as sample respondents.

7. Results and Discussion

Table 2: Level of job stress in health care professionals according to different age groups

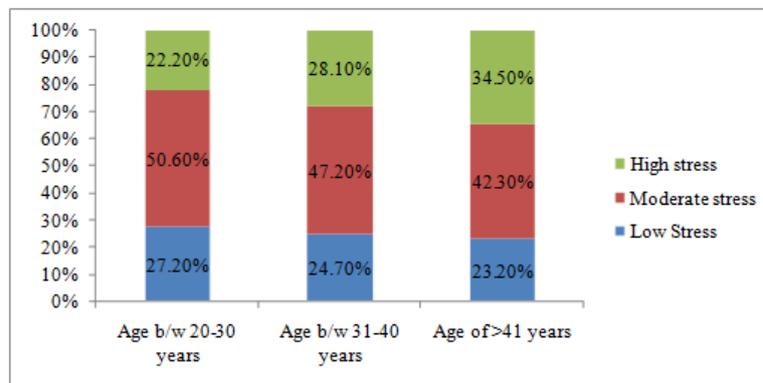
Age groups	Level of Stress			Total	Chi-square value
	Low	Moderate	High		
Age b/w 20 - 30 years	170	316	139	625	12.82*
Age b/w 31 - 40 years	94	180	107	381	
Age of >41 years	45	82	67	194	

(* P< 0.05)

The observed p-value (<0.05) for the corresponding chi-square value 12.82 is significant at 5% level (Table 2). It indicates level of stress among the health care professionals is significantly differ from one another in which 34.5 % of respondents with the age group of greater than 41 years (Fig 1) feel high stress when compared with the age groups of 31-40 years and 20-30 years respectively. The respondents of 31-40 years age group with 28.1% health care professional feel high level of stress and the age group of between 20-30 years with 22.2% respondents feel high stress (Fig 1). 50.6% of health care professionals with the age group of 20-30 years feel moderate stress and the age group of between 20-30 years with 22.2% respondents feel high stress (Fig 1). 50.6% of health care professionals with the age group of 20-30 years feel moderate stress and the age group of 31-40 years with 47.2 % of respondents feels moderate stress and the age of

greater than 41 years with 42.3% of respondents feel moderate stress. Also, 27.2% of professionals feel low stress with the age of 20-30 years and it is 24.7% with the age of 31-40 years and among the age of greater than 41 years 23.2% of respondents feel low stress respectively. The same results also observed Ushashree *et al.* (1995) on their study considered 80 male and 80 female high school teachers in the age group of 25-40 year(adult) and 41-60 years(middle) age to know the effect of gender on teacher's experience of job stress and job satisfaction. Analysis of data indicated significant effect of gender on job stress.

Figure 1: Job stress level percentages of health care professionals in related to age



The age between 20-30 years is free from their responsibilities. They will take care only about their career. The dependents are also less in that age. If the responsibilities are less automatically the stress will be less. Also, at that age, the professionals take everything in an easy going way. It is also observed that the age between 31-40 years the stress will be more when compared to the age between 20-30 years of age. This is because; in that age they have to take care on both family and career. They have to settle equally in both family and career. Both are very important for the human being. Hence, they feel more stress. The age of greater than 41 years feels very high level of stress when compared to others. The reason for this is, in that age the settlement is completed in their career as well as in their life also. But, as the age grows up the health conditions will be reduced and the family

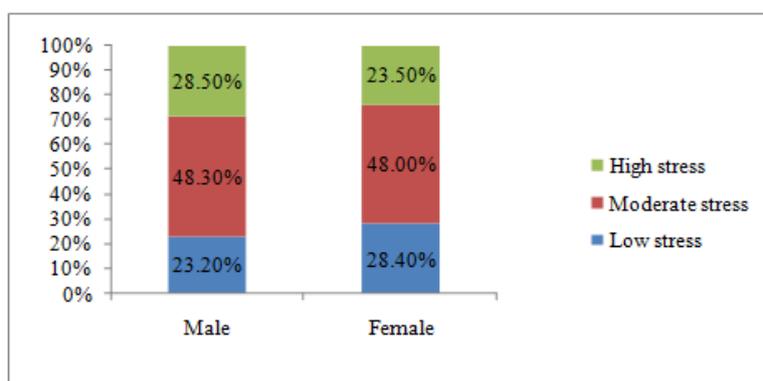
dependents also will be more. They may not do the work within the time period. Hence, they feel very disappointed and they are dependents of others and they try to finish their work with the help of others. Hence, the age of greater than 41 years feels high stress.

Table 3: Level of job stress in health care professionals according to gender

Gender	Level of Stress			Total	Chi-square value
	Low	Moderate	High		
Males	142	296	175	613	6.17*
Females	167	282	138	587	

(* P< 0.05)

Figure 2: Job stress level percentages of health care professionals related to gender



The chi-square test is conducted to test whether there is any association between gender (male and female) and level of job stress among healthcare professionals. The observed p-value (<0.05) is significant at 5% level (Table 2). This means level of stress among healthcare professionals differ significantly from one another in which 28.5 % of male professionals feel high level of stress whereas this percentage in female professionals is only 23.5%. When compared with male and female health care professionals, males feel higher level of stress when compared to females. Also, 48.3% of health care professionals face moderate stress whereas when compared to female professionals it is 48% respectively. 23.2% of male health care professionals feel low stress and among female professionals it is 28.4% respectively. Some of these stressors are similar to the findings from other studies of stress in doctors and nurses (Rout & Rout, 1994, 1997; Molassiotis et al., 1995). Another important source of stress was time pressure. Chronic time pressure can lead to over-arousal, with the consequence that the cardiovascular system can be adversely affected (Friedman & Rosenman, 1959). Mitra and Sen (1993) in their study found that male and female executives differed significantly on role ambiguity, role conflict, inter role distance, future prospects and human relation at work and femininity and masculinity dimensions. Male executives with masculine sex role orientation faced greater job stress and anxiety than females possessing an androgynous personality. Authors attributed this fact to a greater reluctance to self disclose among men and different socialization patterns laid down for both men and women

in Indian society. Beena and Poduval (1992) also conducted a study on sample of 80 executives in different organizations (40 male and 40 female) within the age range of 25-45 years, to know the gender difference in work stress. The observation of their study results revealed that female executives experienced higher rate of stress.

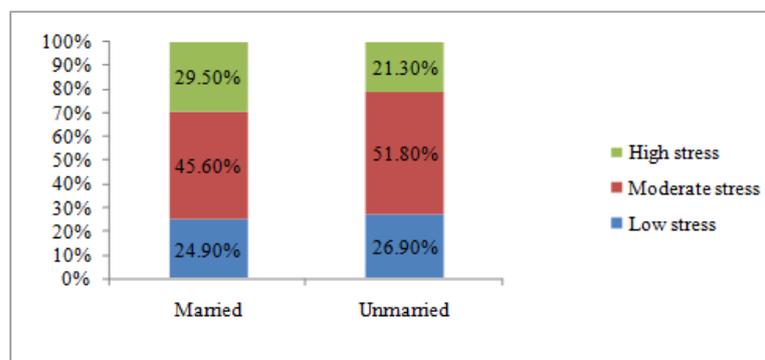
Stress is a habituation, depends on the statures of the persons. Also, in general the female will take care only on the family responsibility. But male have to take care of family as well as the career also. Due to the environment, person's attitude, family surroundings the person may change. Female has the capability to be more patience and it can't be done when compared to males. Females generally show their feelings outside. By that the stress will be less. The feelings can't be expressed outside easily by the males. Hence, they think about it more and they feel more stress. Hence, it is true that male feel more stress when compared to females.

Table 4: Level of job stress in health care professionals according to marital status

Marital Status	Level of Stress			Total	Chi-square value
	Low	Moderate	High		
Married	175	320	207	702	10.299**
Unmarried	134	258	106	498	

(**P< 0.01)

Figure 3: Job stress level percentages of health care professionals related to marital status



The observed p-value (<0.01) for the corresponding chi-square value 10.299 is highly significant at 1% level (Table 4). It indicates level of stress among the health care professionals differ significantly from one another in which 29.5% (Fig 3) of married health care professionals feels high level of stress whereas this percentage in unmarried health care professionals is 21.3% (Fig 3) respectively. Also, 45.6% of married professionals feel moderate stress when compared to unmarried health care professionals it is 51.8% respectively. 24.9% of married health care professionals feel low level of stress and among unmarried professionals it is 26.9% respectively. The married professionals have more burdens because they have to take care of both family and the career. They have to lead the family. Both career as well as the family must look after equally in a simultaneous way. These

responsibilities are less among the unmarried health care professionals.

8. Findings and Conclusion

The health care professionals of 34.5% with the age group of > 41 years feel high level of job stress when compared with other age groups. The male professionals of 28.5% feel high level of job stress when compared to female professionals. The married health care professionals of 29.5% feel high level of job stress when compared to unmarried professionals.

The health care professionals with the age of greater than 41 years feel high level of job stress when compared to other age groups. The male professionals feel high job

stress levels when compared to female professionals. Also, the married health care professionals feel high level of job stress when compared with unmarried professionals. The married male professionals with the age of greater than 41 years feel high level of job stress when compared with other professionals.

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