Original Research Article

DEPRESSION AMONG NURSING OFFICERS WORKING IN A TERTIARY CARE HOSPITAL, KALABURAGI

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ABSTRACT

Background: Nurses are often the first healthcare professionals that patients meet. The quality of patient care is strongly linked to the performance of the nursing staff. Nowadays, all efforts to fight health workers' illnesses are critical. This descriptive cross-sectional study will give us knowledge regarding depression status among nurses and allow the nursing staff to express their professional difficulties working in a Tertiary Care Hospital, in Kalaburagi. The objective of this study was to assess the prevalence of depression among nurses working in a Tertiary Care Hospital & to assess the correlation between various factors influencing the level of depression among nurses.

Materials and Methods: A cross-sectional study design was employed, involving 100 employees from various departments within the Tertiary Care Hospital. Data were collected using the Standardised PHQ-9 Questionnaire to assess the prevalence of depression. Statistical analysis was done using frequency, percentage, and chi-square for association.

Results: The participants consisted of 100 Nursing Officers. The study frequency of nurses with mild depression was 46(46%), and moderate to severe depression was 20(20%).

Conclusion: The analysis reveals that the duration of working days per month is a significant stressor that negatively impacts productivity. Improving clarity in job roles and managing workload effectively can enhance productivity. Fostering positive interpersonal relationships at work can significantly improve job satisfaction and productivity.

Keywords: Nursing, Depression, Depression score

INTRODUCTION

Depression is a common illness characterized by persistent sadness and loss of interest in activities that one normally enjoys. It is also accompanied by an inability to carry out daily activities for at least two weeks. In India, the National Mental Health Survey 2015-16 revealed that 15% of Indian adults need active intervention for one or more mental health issues, and 1 in 20 Indians suffer from depression.[1] Depression is ranked as the single largest contributor to global disability (7.5% of all years lived with disability in 2015). At its worst, depression can lead to suicide; over 80,0,000 people die due to suicide every year. It is the second leading cause of death in 15–29-year-olds.[1]

Nurses with depression are not likely to suffer themselves, but their illness may have an impact on their coworkers and potentially the quality of care they provide.[2] Nursing binds human society with a bond of care and affection. Nurses are often the first healthcare professionals that patients meet. The quality of patient care is strongly linked to the performance of the nursing staff. If the mental health status of these nurses is troubled, then they will not be able to give their full attention to this demanding task. A study done in South India revealed that the prevalence of depression among nurses was 35.8%. It also showed that Anxiety and depression levels are

increased in the younger and less experienced nurses.[3]

A cross-sectional study conducted among nurses in a Tertiary Care Hospital, in Manipur, shows that the overall prevalence of any mental morbidities among study participants was 55.1% and that of Depression was 32%. Respondents aged 19-30 years, those posted in bigger departments with lesser work experience (≤ 3 years), were found to have higher mental morbidities, which was statistically significant. Younger age, lesser work experience, and nurses working in bigger departments had a significant association.[4]

As per the Global Burden of Disease report, mental disorders account for 13% of total Disability Adjusted Life Years (DALY) lost for Years Lived with Disability (YLD) with depression being the leading cause.[5] Nursing as a profession involves responsibilities toward human health, dealing with dying patients, and dealing with emergencies.[6] With these backdrops, this study was carried out to assess the prevalence of Depression and its various demographic and occupational factors associated among Nursing officers in Tertiary Care Hospital.

Objectives

1. To assess the prevalence of Depression among Nursing officers in a Tertiary Care Hospital.
2. To identify different demographic and occupational factors linked to depression among nursing officers in a tertiary care hospital

MATERIALS AND METHODS

This cross-sectional study was conducted among 100 Nursing officers working in an ESIC Medical College & Hospital, Kalaburagi, India, for 2 months. For the data collection, each nursing officer was informed about the study's objectives, and their informed consent was obtained while ensuring confidentiality. Written informed consent was obtained from those who were willing to participate in the study. After obtaining informed consent from the participants, a printed version of the PHQ-9 Questionnaire was distributed, and information regarding their socio-demographic background, health condition, and occupational factors was gathered.

The PHQ-9 is the depression module, which scores each of the nine DSM-IV criteria as "0" (not at all) to "3" (nearly every day) The total score of PHQ-9 ranges from 0 to 27; scores "0–4" mean no depression, scores "5–9" is mild depression, scores above 10 is moderate to severe depression. The collected data was entered in Microsoft Excel and analysed for frequency, percentage and chi-square test. A p-value less than 0.05 was considered statistically significant.

Ethical considerations: Approved (ESICMC/GLB/IEC/01/2024-25).

RESULTS

Table 1: Distribution of study participants concerning socio-demographic details (N=100)

Variable	Category	Frequency	Prevalence (%)
Age	21 – 30 years	42	42 %
	31- 40 years	50	50 %
	41 – 50 years	8	8 %
Gender	Male	42	42 %
	Female	58	58 %
Education	GNM Nursing	11	11 %
	BSc Nursing	88	88 %
	MSc Nursing	1	1 %
Religion	Hindu	82	82 %
	Muslim	10	10 %
	Christian	8	8 %
Marital Status	Married	76	76 %
	Unmarried	24	24 %
Designation	Nursing Officer	98	98 %
	Senior Nursing Officer	2	2 %
Years of Service	0-10 years	81	81 %
	11-20 years	17	17 %
	21-30 years	2	2 %

In the current study, 89% of the respondents did not have any chronic health conditions, whereas 4% of the respondents suffered from Asthma, 2% suffered from Hypertension, 2% suffered from Migraine and 2% from Arthritis. A total of 93% of the participants reported having no habits. Occasionally, 7% had the habit of Smoking and Alcohol intake. (Table 2)

Table 2: Distribution of study participants with respect to health and lifestyle profile (N=100)

Variable	Category	Frequency	Prevalence (%)
Chronic Health Conditions	Nil	89	89 %
	Hypertension	3	3 %
	Asthma	4	4 %
	Migraine	2	2 %

	Arthritis	2	2 %
Habits (Smoking/ Alcohol)	Nil	93	93 %
	Occasionally	7	7 %

Out of 100 study participants, 27% were posted in the Intensive Care Units, 13% in the Casualty, 3% in the Labour room and 57% in the wards. The majority (68%) of respondents had a 6-hour workday, followed by 8 hours (25%) and 7 hours (7%). A Total of 74% of the participants had <25 working days in a month, followed by 26% having >25 working days in a month. In the current study, 84% of the respondents had >5-night shifts per month, followed by 16 % having < 5-night shifts per month. (Table 3)

Table 3: Distribution of study participants with respect to their work schedule and conditions (N=100)

Variable	Category	Frequency	Prevalence (%)
Department of Work	ICU/CCU/PICU	27	27 %
	Casualty	13	13 %
	Labour room	3	3 %
	Wards	57	57 %
Duration of working hours per day	6 Hours	68	68 %
	7 Hours	7	7 %
	8 Hours	25	25 %
Total Number of Working days in a month	<25 Days	74	74 %
	>25 Days	26	26 %
Total Number of Night Shifts per Month	<5 Days	16	16 %
	>5 Days	84	84 %

According to the distribution of respondents, 34% had non-minimal depression, followed by 46% had mild depression, followed by 20% had moderate to severe depression (Figure 1).
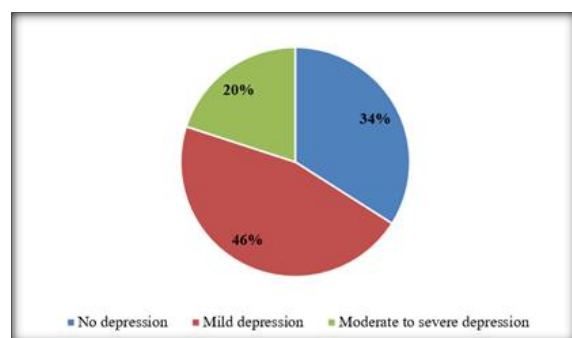

Figure 1: Distribution of participants with respect to assessment of depression using PHQ9 Questionnaire

Association of socio-demographic details, health and lifestyle profile, work schedule with depression was done using Chi-sqaure/ Fisher's Exact Test. It was observed that 26.2% of study participants belonging to 21 to 30 years, 28.6% of males, 20.7% of Hindus, 33.3% were unmarried, 21% with less than 10 years of experience, 100% of them who had migraine, 42.9% who did occasional smoking or had alcoholic drink, 38.5% of them who were working in casualty, 28.6% of them who were working 7 hours/day, and 25.7% who had more than or equal to 5 night shifts/month had severe depression and this observation was not statistically significant (Table 4). Study participants who had done GNM nursing (36.4%) and 23.1% of them who had 25 days or more than 25 working days per month had severe depression and this observation was statistically significant at a p-value of <0.05 (Table 4).

Table 4: Association of socio-demographic details, health and lifestyle profile, work schedule with depression among study participants (N=100)

Variables	Depression (%)			p-value
	No depression	Mild depression	Moderate to severe depression	
Age Category (in years) 21- 30 31-40 41-50	16 (38.1) 14 (28) 4 (50)	15 (35.7) 28 (56) 3 (37.5)	11 (26.2) 8 (16) 1 (12.5)	0.294#
Gender Male Female	13 (31) 21 (36.2)	17 (40.5) 29 (50)	12 (28.6) 8 (13.8)	0.188^
Education BSc Nursing MSc Nursing GNM Nursing	27 (30.7) 0 7 (63.6)	45 (51.1) 1 (100) 0	16 (18.2) 0 4 (36.4)	0.002*#
Religion Hindu Christian Muslim	26 (31.7) 5 (62.5) 3 (30)	39(47.6) 2 (25) 5 (50)	17 (20.7) 1 (12.5) 2 (20)	0.595#
Marital status Unmarried Married	9 (37.5) 25 (32.9)	7 (29.2) 39 (51.3)	8 (33.3) 12 (15.8)	0.088
Years of service				

0-10	29 (35.8)	35 (43.2)	17 (21)	0.178#
11-20	3 (17.6)	11 (64.7)	3 (17.6)	
21-30	2 (100)	0	0	
Health problems				
None	33 (37.1)	40 (44.9)	16 (18)	
Arthritis	0	2 (100)	0	
Asthma	0	3 (75)	1 (25)	0.115#
Hypertension	1 (33.3)	1 (33.3)	1 (33.4)	
Migraine	0	0	2 (100)	
Smoking/ alcohol habit				
No habits	33 (35.5)	43 (46.2)	17 (18.3)	0.219#
Occasionally	1 (14.3)	3 (42.9)	3 (42.9)	
Working Department				
ICU/CCU/PICU	11(40.7)	12 (44.4)	4 (14.8)	
Casualty	2 (15.4)	6 (46.2)	5 (38.5)	0.484#
Labour room	2 (66.7)	1 (33.3)	0	
Wards	19 (33.3)	27 (47.4)	11 (19.3)	
Working hours per day				
6	22 (32.4)	30 (44.1)	16 (23.5)	
7	4 (57.1)	1 (14.3)	2 (28.6)	0.138#
8	8 (32)	15 (60)	2 (8)	
Working days per month				
< 25 days	20 (27)	40 (54.1)	14 (18.9)	0.016^*
≥25 days	14 (53.8)	6 (23.1)	6 (23.1)	
Number of night shifts in a month				
<5	8 (50)	6 (37.5)	2 (12.5)	0.433^
≥5	25 (35.7)	27 (38.6)	18 (25.7)	

*p-value was statistically significant
^Chi-square test was applied
#Fisher's Exact test was applied

DISCUSSION

Nursing is a broad profession with many distinct locations and specialisations. According to one prominent analysis on the subject, Nurses are almost twice as likely as other professionals to experience depression.[7] This is an important issue for the individuals involved, the patients they serve, the organisations for which they work, and society as a whole.[7]

In the present study, the majority of the nursing officers belonged to the age group of 31 to 40 years (50%), followed by 21 to 30 years (42%). This may be because of the increased workforce of younger nursing officers in the Tertiary Care Hospital. In our study, there were 48% male participants and 52% were female participants, whereas in the study conducted by Hasan S Alamri et al,[8] males were 68.4% and females were 32.6%, and in a study conducted by Ashley Shajan et al,[9] all the participants were females in the study.

The Majority of the participants in the current study were Hindu (82%) by religion, which was similar to the study conducted by Th Kayia Priscilla Kayina et al. (68.4%).[4] In the present study, the majority of the participants were married (76%), which was almost similar to the study conducted by Hasan S Alamri et al. (69.4%).[14] The majority (89%) of the participants in the current study had no chronic health conditions, which was similar to the study conducted by Hasan S Alamri et al. (71.5%),[8] in which the number of participants with Hypertension was 3% and 5.4% respectively.

In the present study, the mean duration of work is 6.57, whereas in the study conducted by Ashley Shajan et al,[9] it was 2.98 + 1.97 (of 1- 10 years). Current study showed the mean depression score 6.95 which was similar to the study conducted by Ashley Shajan et al,[9] 5.98 + 3.33 In the present study, prevalence of mild (46%) & moderate to severe depression (20%) which was not similar to the study conducted by Ashley Shajan et al. (35.8%).[9] In the present study, most of the participants (46%) are suffering from mild depression and 20 % of the participants are suffering from moderate to severe depression which is not similar to the studies conducted by Ashley Shajan et al,[9] where prevalence of depression was found to be 35.8 % which was scaled by Hospital Anxiety and Depression Score (HADS). This may be because of the increased number of working hours and the increased number of working days in a month.

The current study showed there was no significant association between Depression and Years of Service. Similarly, in the study conducted by Th Kayia Priscilla Kayina et al,[4] prevalence of depression was found to be 32 % in which the Depression, Anxiety & Stress Scale – 21 (DASS -21) was used for assessment. Similarly, in the study conducted by Hasan S Alamri et al,[8] it was found that the distribution of depression among health care workers below the age of 40 years where 69.3 %.

The limitation of the study is the sample size. We recommend to conduct a multi-centric study with a larger sample for a better picture of depression among nursing officers. The analysis reveals that the duration of working days per month is a significant stressor that negatively impacts productivity. Improving clarity in job roles and managing workload effectively can enhance productivity.

Fostering positive interpersonal relationships at work can significantly improve job satisfaction and productivity.

CONCLUSION

Nearly 1/5th of the nursing officers were suffering from moderate to severe depression.

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