

Magnitude of Nurse Quackery in Private Healthcare Facilities in Punjab

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Abstract

In this exploratory study, conducted in 53 private nursing homes of randomly selected cities of Punjab State, a total of 218 participants were interviewed face-to-face. Data was analysed and presented using descriptive and inferential statistics. Surprisingly half of the subjects (50.9%) had not obtained any nursing qualification / training. Out of them, 60.3 percent were having lesser than higher secondary qualification, 9.9 percent were academic graduates and 29.7 percent were having paramedical training. Out of all the nurses working in these private healthcare facilities, 18.7 percent of them were not registered with State Nursing Council and only 10.1 percent were having nursing association membership because of the unawareness. Moreover, nurses and nurse quacks were enjoying nearly equal amount of pay wages, allowances and fringe benefits. It is concluded that significant numbers of nurse quacks are practicing nursing in private healthcare facilities. Therefore, it is recommended that either Government of India passes a bill on nurse practice Act or empowers the existing nursing statutory / regulatory bodies such as Indian Nursing Council to control this menace in a country where more than 75 percent people depend on private healthcare facilities.

In India both the public and private sector health services co-exist. Unfortunately the involvement of public or government sector in health care is very less and about 50 percent of the inpatient and 60-70 percent of outpatient services in India are provided by private sector. Further, Times of India in 2009 reported that about 70 percent Indians seeking the healthcare from the private sector. The healthcare provided by either public or private healthcare setting constitute two principal components i.e. medical treatment and nursing care. The medical care nearly in every scenario gets the best attention but nursing care which is the most vital and basic of all the activities is being neglected off by most of the health care organisations. Nursing care is a critical facet of health care and has a significant impact on the overall outcome of patient care in a healthcare facility.

It is said, "Patient comes to hospital because of the doctors but only get discharged because of the hard work of the competent nurses; therefore we must understand the importance of nurses in success of a healthcare organisation". Nursing care is extremely important for a good patient outcome. While physicians

plan the treatment and perform the diagnostic and treatment procedures, it is the nurse who spends more time with the patient for caring and looking after all his needs throughout the hospital stay. Nurses provide the majority of direct care to patients and the success of patient care and the reputation of the hospital largely depend upon the extent of efficiency of nursing care being provided by the nursing staff.

In India to practice as a qualified nurse one should have minimum qualification of either a 3 or 3½ year diploma in general nursing & midwifery or a 4 year BSc Nursing degree from a recognised university or State nursing board; further, the person should be registered with the state nursing council as Registered Nurse (RN) and Registered Midwife (RM). The recruitment rules/policy of the government hospitals ensures that only qualified nurses are employed to provide the nursing care; but many private hospitals especially small size healthcare facilities (nursing homes) compromise with the qualification of nursing staff deployed in their settings which can severely affect the quality of care and may be detrimental to the patients. In a pilot project carried out in the US hospital to manage nursing staff shortage by unlicensed nurse assistants, their skills and performance was assessed; however most of them were poor in skills to perform nursing care. Author commented that this model is

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unsuccessful and could be risky for safety of patients (Newhouse et al, 2007).

Due to the brain drain among nurses people have to compromise to seek the care from unqualified and unskilled nurse quacks, which could contribute to several unexpected adverse healthcare outcomes. Healthcare facilities deploy nurse quacks to perform nursing care to indoor and out-door patients. Further, nurses in healthcare facilities are paid very low wages, allowances and fringe benefits. Therefore, nurses do not stick to these healthcare facilities for longer time and this leads to poor nursing care.

Review of Literature

Blegen Mary A et al (2001) conducted a study on the relationships between the quality of patient care and the education and experience of the nurses providing care. A secondary analysis of data, collected in two previous studies of the relationship between nurse staffing (hours of care, staff mix) and the quality of patient care, was used to determine the relationship between nurses' education and experience and the quality of care provided. Results showed that controlling for patient acuity; hours of nursing care, and staff mix, units with more experienced nurses had lower medication errors and lower patient fall rates. These adverse occurrence rates on units with more baccalaureate-prepared nurses were not significantly better (Blegan et al, 2001).

Lankshear Annette et al (2005) study assessed the evidence for a relationship between nursing workforce and patient outcomes in the acute sector through a review of international research produced since 1990 involving acute hospitals and adjusting for case mix. Twenty-two large studies of variable quality were included. They strongly suggested that higher nurse staffing and richer skill mix (especially of RNs) were associated with improved patient outcomes (Lankshear et al, 2005).

Person Sharina et al (2004) conducted a study on nurse staffing and mortality of patients with acute myocardial infarction in USA. Data of 1,18,940 patients was reviewed from 1994-1995 staffing levels was represented as nurse to patient ratios categorised into quartiles for Registered Nurses (RN) and for Licensed Practical Nurse (LPN). It was found that with RN staffing mortality was lower than that of the LPN staffing nurse patient hours at $p < 0.001$. It was concluded that higher RN staffing levels were associated with lower mortality.

Unruh Lynn (2003) conducted a study on licensed nurse staffing and its adverse effects in hospitals of Pennsylvania (USA) to examine changes in licensed

nursing staff from 1991 to 1997 and to assess the relationship of licensed nurse staff with patient adverse events. It was found that nurses' acuity-adjusted patient load increased from 1991 to 1997. Number of Licensed nurses declined from 1994-1997. Greater incidence of nearly all adverse events occurred in hospitals with fewer licensed nurses. It was found that adequate licensed nurse staffing is important in minimising the incidence of adverse events in hospitals.

Table 1: Socio-Demographic profile of the subjects

Socio-demographic variables	Nurses (n= 107)	Non-Nurses (n= 111)	Total (N= 218)
	f (%)	f (%)	f (%)
Age (in years)			
18 – 22	34 (31.8)	44 (39.7)	78 (35.8)
23 – 27	50 (46.7)	28 (25.2)	78 (35.8)
28 – 32	14 (13.1)	13 (11.7)	27 (12.4)
33 – 37	04 (03.7)	10 (09.0)	14 (06.4)
>38	05 (04.7)	16 (14.4)	21 (09.6)
Gender			
Male	04 (03.7)	18 (16.2)	22 (10.1)
Female	103 (96.3)	93 (83.8)	196 (89.9)
Marital status			
Unmarried	74 (69.2)	68 (61.3)	142 (65.1)
Married	33 (30.8)	40 (36.0)	73 (33.5)
Divorced / separated	---	01 (00.9)	01 (00.5)
Widow / widower	---	02 (01.8)	02 (00.9)
Religion			
Hindu	18 (16.8)	52 (46.8)	70 (32.1)
Sikh	78 (72.9)	50 (45.1)	128 (58.7)
Muslim	---	04 (03.6)	04 (01.8)
Christian	11 (10.3)	05 (04.5)	16 (07.4)
Habitat			
Rural	67 (62.6)	51 (45.9)	118 (54.1)
Urban	40 (37.4)	60 (54.1)	100 (45.9)
Type of family			
Joint	41 (38.3)	30 (27.0)	71 (32.6)
Nuclear	60 (56.1)	70 (63.1)	130 (59.6)
Extended	06 (05.6)	11 (09.9)	17 (07.8)

*= Significant

Table 2: Educational background of the personnel performing nursing responsibilities in private nursing homes (N=218)

Educational qualification		f (%)	
Nursing	ANM	41 (38.3)	107 (49.1)
	GNM	64 (59.9)	
	BSc (N)	02 (01.9)	
Non-nursing	≤ 10 th Class	19 (17.1)	111 (50.9)
	10+2	48 (43.2)	
	Academic graduates	11 (09.9)	
	Diploma in OT technology	19 (17.1)	
	Diploma in Medical Lab. technology	09 (08.1)	
	Diploma in Pharmacy	03 (02.7)	
	Dai Training	03 (02.7)	

ANM: Auxiliary Nursing and Midwifery; GNM: General Nursing and Midwifery; BSc (N): Bachelors of Science Nursing; OT : Operation Theatre

Cho, Sung-Hyun et al (2003) conducted a study on the effects of nurses staffing on adverse effects, morbidity, mortality and medical costs in USA using multilevel analysis employed to examine the effects of nurse staffing and patient and hospital characteristics on patient outcome. It was found that an increase of 1 hour work by Registered Nurse (RN) per patient day was associated with an 8.9 percent decrease in the odds of pneumonia and 10 percent increase in RN proportion was associated with 9.5 percent decrease in the odds of pneumonia which was found to be statistically significant. It was concluded that having appropriate nurse staffing is a significant consideration in some cases.

Blegen, Mary A et al (1998) studied how nursing care delivery changes affect staff and organisational outcomes. The correlations among staffing variables and outcome variables were determined, and multivariate analyses, controlling for patient acuity, were completed. An unexpected finding was that the relationship between RN proportions of care was curvilinear; as the RN proportion increased, rates of adverse outcomes decreased up to 87.5 percent. Above the level, as RN proportion increased, the adverse outcome rates also increased. The study concluded that higher the RN skill mix, the lower the incidence of adverse occurrences on inpatient care units.

McCloskey JM (1998) described the relationship between 6 adverse patient outcomes (medication errors, patient falls, urinary and respiratory tract infections, skin breakdown, patient complications and mortality), total hours of nursing care and the proportion of these hours of care delivered by registered nurse with the use of hospital records. Data from every unit of a large university hospital for fiscal year 1993 were analysed. Correlations among staffing variables and outcome measures were determined and multivariate analysis was completed; controlling for patient acuity. It was found that as the RN proportion of care rose to 87.5 percent level it was related to lower incidence of negative outcomes. However, when RN proportion of care went beyond that level, the adverse outcome rates also increased.

Objectives

The present study attempted to identify the magnitude of nurse quackery in private healthcare facilities, and find out wages, allowances and

Table 3: State Nursing Council registration and professional association membership of the nursing personnel (n=107)

Registration / Membership		f (%)
State Nursing Council Registration	Registered	64 (59.8)
	Not registered	20 (18.7)
	Applied for registration	12 (11.2)
	Don't know	11 (10.3)
Professional Association Membership	Not obtained	96 (89.8)
	Obtained	11 (10.3)

fringe benefits provided to personnel performing nursing care in private healthcare facilities.

Materials and Methods

This exploratory descriptive study was conducted among 53 conveniently selected nursing homes from the six conveniently selected cities of Punjab state i.e. Amritsar (5), Faridkot (5), Jalandhar (12), Ludhiana (17), Patiala (10) and SBS Nagar (4). The study was approved by the Institutional Ethics Committee and a written informed permission was obtained from competent authority of each healthcare facility. A total of 218 subjects were interviewed for data collection, who were selected using convenience sampling technique. The data was collected using a self-structured interview schedule, which was validated by five experts from the field of nursing, hospital administration and research. The reliability of the data collection instrument was ascertained through test-retest method and using Karl Pearson's correlation co-efficient formula, which was found to be $r=0.9$.

The data collection process started with identification of name and location of nursing homes through

internet and related local people, followed by proportionally numbering and conveniently selecting the desired number of nursing homes. After obtaining the permission for data collection, an average of 4-5 nursing care providers were conveniently selected during morning shift to carryout face-to-face interview using a self-structured interview schedule. An informed written consent was obtained from each respondent and anonymity of the subjects and confidentiality of the information was assured. SPSS version 18.0 was used for statistical analysis and the data was analysed using descriptive and inferential statistics; p-value less than 0.05 was

Table 4: Wages paid to nurses working in private nursing homes (n=107)

Salary and Allowances	f (%)
Salary/ month (in Rs)	
≤ 2000	11 (10.3)
2001 – 5000	77 (72.0)
5001 – 10000	16 (14.9)
> 10000	03 (02.8)
Annual increment (in Rs)	
Not provided	74 (69.2)
Provided	33 (30.8)
≤ 200	07 (17.5)
201 - 400	10 (25.0)
> 400	16 (15.0)
Uniform allowance	
Not provided	56 (52.3)
Provided	51 (47.7)
ESI allowance	
Not provided	95 (88.8)
Provided	12 (11.2)

ESI: Employee State Insurance

considered significant.

Results

In the present study among 53 nursing homes, conveniently selected 218 subjects were interviewed.

Table 1 presents socio-demographic profile of subjects. It was found that 78.5 percent nurses and 64.9 percent non-nurses were in the age group of 18-27 years, while relatively more number non-nurses (14.4%) than nurses (4.7%) were above the age of 38 years. Majority of nurses (96.3%) and non-nurses (89.9%) were the female; while slightly more number of non-nurses was males as compared to the nurses (16.2% vs 3.7%). Nearly same number of

nurses and non-nurses were in the unmarried (69.3% vs. 61.3%) and married (30.8% vs 36%) category; few of non-nurses were also the divorced (0.9%) and widow (1.8%). Majority of nurses were from the Sikh religion (72.9%), while majority of non-nurses were either Hindu (46.8%) or Sikh (45.1%) religion. Significant number of nurses (62.6%) were from the rural background, while nearly same number of non-nurses were from the rural (45.9%) and urban (54.1%) background. Significantly, more than half of nurses (56.1%) and nearly two third of non-nurses (63.1%) were from the nuclear family, while 38.3 percent nurses and 27.0 percent non-nurses were from joint family and only few nurses (5.6%) and non-nurses (9.9%) were from the extended family.

Table 5: Fringe benefits provided to nurses working in private nursing homes (n=107)

Fringe Benefits	f (%)
In campus housing	
Provided	83 (77.6)
Not Provided	24 (22.4)
Provident Fund	
Not Deducted	62 (57.9)
Deducted	45 (42.1)
Staff canteen facility	
Not available	84 (78.5)
Available	23 (21.5)
Loan/ Advance provision	
Provided	72 (67.3)
Not provided	35 (32.7)
Bonus during festivals	
Provided	97 (90.7)
Not provided	10 (9.3)

Table 6: Work Schedule and load for nurses in private nursing homes (n= 107)

Work Schedule & Load	f (%)
Duration of (Morning / Evening shift)	
5- 6 hours	30 (28.0)
7- 8 hours	56 (52.3)
9- 10 hours	09 (08.4)
11- 12 hours	10 (09.4)
Up to 24 hours	02 (01.9)
Duration of (Night shift) * (n=82)	
12 hours	68 (82.9)
15- 16 hours	14 (17.1)
Nurse- Patient ratio*	
General Ward (n=50)	
1:5- 1:7	06 (12.0)
1:8- 1:10	25 (50.0)
1:11- 1:25	19 (38.0)
Critical care units (n=21)	
1:1	01 (04.8)
1:2- 1:4	08 (38.1)
1:5- 1:7	08 (38.1)
1:8- 1:10	04 (19.4)

* all the nurses studied were not in this category

About half (50.9%) of the personnel performing nursing responsibilities were non-nurses (nurse quacks), while only 49.08 percent of them proclaimed that they are nurses (Table 2). Furthermore, out of 107 nurses only 1.9 percent were nursing graduates and 59.9 percent had diploma in general nursing and midwifery, while 38.3 percent of them were holding auxiliary nurse and midwifery qualification. Further, out of 111 non-nurses, majority of them were either senior secondary educated (43.2%) or matriculate or less educated (17.1%). A few of them were having paramedical technical diplomas and 2.7 percent were only Trained Dais performing nursing care responsibilities.

It was found that only 59.8 percent of associations were registered with State Nursing Council, while 10.3 percent were not aware whether they are registered or not (Table 3). Another 11.2 percent of them were freshers who have applied for registration. Surprisingly 18.7 percent of them were not registered with State Nursing Council even after obtaining a nursing qualification. Furthermore, only 10.3 percent of 107 nurses were the members of any professional nursing association i.e. Trained Nurses Association of India.

Table 4 represents wages and allowances paid to nurses working in private nursing homes. It was revealed that majority of nurses (82.3%) were paid less than Rs. 5000/- month, while 10.3 percent nurses were paid less than Rs. 2000/- month as salary and only 2.8 percent nurses were given salary of more than Rs. 10,000/- month. Similarly, majority of nurses (69.2%) were not given any annual increments; only 33 nurses got the annual increments, out of which significant number (17) received very less amount of annual increment i.e. less than Rs. 400/- year. Surprisingly more than half of the nurses (52.3%) were given uniform allowance and majority of them (88.8%) did not received ESI allowance. None

of the nurses were provided with any dearness allowances, house rent allowance, washing allowance, city compensatory allowance, medical allowance or education allowance etc.

Table 5 illustrates that majority of nurses (77.6%) were provided within the campus shared room stay facility. However, majority of them (78.5%) were not having the staff canteen facility in their institution. Majority of the nurses (90.7%) enjoyed the bonus during festival session and similar findings were observed for opportunity for the advance loan facility for the nurses (67.3%) in the institution.

Table 6 shows that majority of nurses (80.3%) worked between 5-8 hours during morning and evening shift, while significant number of nurses (17.8%) worked for a long morning and evening shift i.e. 9-12 hours shift. Some of the nurses (1.9%) worked for 12-24 hours during these shifts. During night shift most of the nurses (82.9%) worked for 12 hours, while there were 17.1 percent nurses who worked even 15-16 hours night shift. About 50 nurses were working in general wards, where majority of them (62%) were caring 5-10 patients in each shift, while 38 percent nurses were caring for 11-25 patients in a shift. A total of 21 nurses were posted in critical care units, among whom only 4.8 percent nurses were working with 1:1 ratio. More than one-third of the nurses (38.1%) were caring for 1:2 to 1:4 patients in each shift in an ICU. Surprisingly 57.4 percent nurses were caring for 5-10 patients admitted in ICUs during an average shift.

Discussion

Present study revealed that half (50.9%) of the personnel performing nursing responsibilities in private nursing homes were non-nurses and only 49.1 percent had obtained nursing qualification. Among non-nurse's 60.4 percent were educated up to senior secondary level only and were dealing with the precious lives of innocent public. This scenario exists in spite of the fact that the minimum qualification prescribed by the INC to work as a nurse is either a 3 or 3½ year Diploma in Nursing or a 4 year degree from a recognised University or State nursing board and registration with the state nursing council as Registered Nurse (RN). A study in which researchers looked at survival rates after surgery in 300 European hospitals, found the highest risk of death after surgery in hospitals where nurses with lower levels of education cared for the most patients. A 10 percent increase in the proportion of nurses holding a bachelor degree was associated with 7 percent lower surgical death rates. As for registration among nurses was concerned, only 59.8 percent were registered with state

nursing council and a 10.3 percent were not aware whether they were registered with state council or not.

The present study reveals that majority (72%) drew a salary up to Rs. 5000/- month, whereas 8.7 percent (10.3% nurses) personnel were given salary d" Rs. 2000/ month which is very less than the salary prescribed by the sixth pay commission and minimum wages act 2009.

The findings of our study are also in contradiction with the Sixth pay commission pay scale of Rs. 9300-34,800. The Delhi labour ministry on 1 April 2013 had revised the minimum wages of candidates having graduate and higher qualifications. The new monthly minimum wages has been fixed at Rs. 10,218/- against Rs 9,594/- for candidates having graduation and higher qualifications. It is also in contradiction with the recommendations of Dr S Balaraman Committee (2012), which was appointed to conduct a study on the issues in the nursing sector in Kerala. They recommended Rs 12,900/- as basic salary for nurses in private hospitals. These findings are in contrast to Sixth pay commission recommendations wherein annual increments has been decided as 3 percent of basic pay + grade pay. Our findings are also in contrast to the Balaraman commission recommendation on annual increments of Rs. 250/- for staff nurses and Rs 300/- for senior staff nurses.

ESI allowance was given to a very few personnel (8.26%) only. Benefits provided under this scheme are medical, maternity, sickness benefits to personnel and their dependents in the ESI hospitals. Other allowances like washing allowance (Rs. 300 monthly according to Sixth pay commission), qualification allowance (should be provided accordingly as recommended by Sixth pay commission), nursing allowance (Rs. 4000/- monthly according to Sixth pay commission), special allowance (As per Sixth pay commission, should be suitably paid to person working in special units like ICU, CCU, NICU, OT, dialysis, burn.

Fringe benefit like in-campus housing was provided to 67.9 percent personnel working in nursing homes under study. Provident fund facility was availed by only one third (30.3%) personnel while rest was not provided this. This finding is also in contrast to Punjab government rules which recommends contributory Provident Fund of 10 percent of basic pay + grade pay.

In our study out of 50 nurses working in general wards, 38 percent nurses were caring for 11-25 patients in a shift. A total of 21 nurses were posted in critical care units, among whom only 4.8 percent

nurses were working with 1:1 ratio. More than one third of the nurses (38.1%) were caring for 1:2 to 1:4 patients in each shift in an ICU. Surprisingly 57.4 percent nurses were caring for 5-10 patients admitted in ICUs during an average shift. Every extra patient added to a nurse's workload increases the risk of death within a month of surgery by 7 percent according to data from 300 European hospitals.

One limitation of our study is that the investigator relied on the information provided by the respondents without verifying the facts. So there may be possibility that some of the nurse quacks falsely proclaimed themselves as nurses.

Conclusion

The present study concluded that a significant population of nurse quacks existed in the healthcare settings. Hence, significant number of nursing personnel working in the private setting are either unqualified or under qualified and are not licensed and registered to practice as nurse. The salary, leaves and fringe benefits provided to nursing personnel in these institution are not as per recommendations by state and central government.

Recommendations

Central government must bring private clinical establishment act bill in enforcement at earliest possible to curb such unscrupulous practices to safe guard the rights and health of people. All states must implement the Clinical Establishment Act guidelines in concurrence with as recommendations of Government of India to have uniformity in implementation. Indian Nursing Council (INC) Act 1947 must be revised to empower INC to also regulate nursing services provided at health care facilities in India. Centre and state governments must establish a regulatory body to register and monitor health care facilities, infrastructure, personnel and facilities provided at private health care settings. The nursing associations like Trained Nurses Association of India (TNAI) should take initiatives for public awareness campaign to promote awareness among people about importance of nursing care provided by qualified nurses during their hospitalisation in health care facilities for the safety of people.

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