Evaluation of Quality of Nursing Documentation in Surgical Wards at Baghdad Teaching Hospitals

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Abstract

Background: Nursing documentation has been one of the most important functions of nurses.

Objectives: To evaluate quality of nursing documents for nursing care at surgical ward and to find out the relationship between demographic characteristic with nursing documents.

Methodology: A descriptive design study was conducted in the period of 1st January 2017 to 15th August 2017. Utilizing a stratified random sampling method (60) nurses working in surgical ward at Baghdad teaching hospitals.

Results: The majority of the study participants were female who accounted for (58.3%) of the total participants while male constituted (41.7%) making a female male ratio of 1.5:1. Most of the study participants (46.7%) were between ages 18 and 27 years old. (71.7) of the nurses were married and the remainder was single. (45%) of the participants had institute graduate. Majority of them (31.7%) were employee (1-5) years in surgical wards, and finally most of nurses(66.7%) have training session in the nursing documentation.

Conclusions: The study showed that nurses have poor nursing documentation in surgical ward and there is no significant association between the nursing documentation with some demographic characters of selected nurses but significant association between the nursing documentation with training course.

Keywords: *Evaluation, Quality of Nursing Documentation, Nursing care, Surgical Wards.*

Introduction

Nursing documentation is considered as an important indicator to develop nursing care. According to patient safety law, nurses have to document nursing interventions.[1] Nursing documented has jointly practical and legal embodiment in client care thus kind documentation and true notify are fundamental to improve efficiency in client care in any case of the way used to document, the client's health-care register is a solemn, legal records is client's patronage specifics[2,3]. Nurse's ability to script in a pure brief, fair and legally precise way can safely decrease the danger of misunderstanding and passive patient result concerning to bad communication[4,5]. Nurses have accepted that registration isn't dismissing from nursing care and it is not permissive. It is an integral section of on file nurses' practices, and an important instrument that RNs use to secure high-fineness client care. Literature debate exceedingly the barriers encountered by nurses in recorded involving time limited, mismatches among staffing resources and work overload, shortage of pure guidelines for fill up documentation, repeated at documentation, and the routine systems and institutional policies usually related with protection precise documentation[6]. The major responsibility of nursing

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documentation are patients' information transport to other health team members, promote professional autonomy [7].

Methodology and Materials

A descriptive design study carried out to evaluate quality of nursing documentation in surgical wards at Baghdad teaching hospitals. The study was carried out during the period extended from 1st January 2017 to 15th August 2017. The study population included all nursing staff in four selected hospitals. Inclusion criteria for nurses were having at least 12 month clinical experience and having any educational level degree in nursing. The sample size estimated 70 nurses with pilot study. Then, these nurses selected to participate with stratified random sampling, according to the number of nursing staff employed in each hospital. Then, for evaluate of each nurse's documents, in four parts of nursing documents, was selected randomly and analyzed. The demographic data of self fill reporting. For evaluate of nursing documents for nursing care four observational checklists were used. These checklists were evaluate four parts of nursing documents including recording vital sign assessment (4 items), recording wound care(dressing) (11 items), recording medication treatment (4 items) and recording intake and output (I & O) of fluids (10 items). The validity of checklists was determined by content validity and after receiving commends from 10 nursing member checklists were revised. The content validity of the instrument was established through a panel of (15) experts. . Test- Coefficients for (29) items of nursing documentation for nursing care were($r= 0.83^{**}$) . Data were collected between 8.30 am to 12.30 pm**.** The data is analyzed by using SPSS version 20.0.

Results

This table revealed that(58.3%) of the study samples were females, and most of them were age group (18-27) years old, a high percentage of them were institute graduate (45%), most of them(71.7%) were married, (31.7%) were for (1-5) years were employment in nursing, Majority of them (31.7%) were employee (1-5) years in surgical wards, and finally most of nurses(66.7%) have training session in the nursing documentation

Table (1): The Mean of Score of Nurses Documentation for Nursing Care at Surgical Wards

No.	Items	Always		Some time		Never		MS	Ass
		F	%	F	%	F	%		
	Vital signs								
1	Body temperature	49	81.7	4	6.7	7	11.7	2.70	Good
2	Pulse rate	28	46.7	10	16.7	22	36.7	2.10	Fair
3	Respiration rate	34	56.7	9	15.0	17	28.3	2.28	Fair
4	Blood pressure	31	51.7	9	15.0	20	33.3	2.18	Fair
	Total							**2.315**	**Fair**
	Wound care (Dressing)								
5	Location of wound	14	23.3	8	13.3	38	63.3	1.60	Poor
6	Size of wound	4	6.7	8	13.3	48	80.0	1.27	Poor
7	Wound discharge	2	3.3	1	1.7	57	95.0	1.07	Poor
8	Amount of discharge	2	3.3	4	6.7	54	90.0	1.07	Poor
9	Color of discharge	2	3.3	3	5.0	55	91.7	1.07	Poor
10	Odor of discharge	2	3.3	7	11.7	51	85.0	1.07	Poor
11	Pain	1	1.7	3	5.0	56	93.3	1.05	Poor
12	Signs of infection	3	5.0	1	1.7	56	93.3	1.12	Poor
13	Signs of wound healing	2	3.3	1	1.7	57	95.0	1.08	Poor
	Dressing changes							**1.15**	**Poor**
14	Morning	20	33.3	15	25.0	25	41.7	1.92	Fair
15	Evening	21	35.0	16	26.7	23	38.3	1.97	Fair
	Total							**1.28**	**Poor**
	Drugs administration								
16	Drug name	57	95.0	2	3.3	1	1.7	2.93	Good

No.	Items	Always		Some time		Never		MS	Ass
		F	%	F	%	F	%		
17	Route of administration	52	86.7	6	10.0	2	3.3	2.83	Good
18	Dose	44	73.3	11	18.3	5	8.3	2.65	Good
19	Time of administration	54	90.0	2	3.3	4	6.7	2.87	Good
	Total							**2.82**	**Good**
	Fluid intake & output								
	Fluid intake								
20	Oral route	12	20.0	8	13.3	40	66.7	1.53	Poor
21	IV infusion	5	8.3	9	15.0	46	76.7	1.32	Poor
22	Nasogastric tube	1	1.7	5	8.3	54	90.0	1.12	Poor
23	Gastrostomy route	1	1.7	5	8.3	54	90.0	1.12	Poor
	Fluid output								
24	Urination	8	13.3	7	11.7	45	75.0	1.38	Poor
25	Defection	8	13.3	7	11.7	45	75.0	1.38	Poor
26	Vomiting	8	13.3	7	11.7	45	75.0	1.38	Poor
27	Chest tube	2	3.3	4	6.7	54	90.0	1.17	Poor
28	Drain	5	8.3	1	1.7	54	90.0	1.18	Poor
29	Nasogastric tube	3	5.0	1	1.7	56	93.3	1.12	Poor
	Total							**1.28**	**Poor**

(A.D.): Assessment Degree, M.s=mean of score [(1 – 1.67) = poor (p); (1.67 – 2.34)= Fair(F); [(2.34 – 3) = Good (G)]

This finding of this table indicated that the mean of score was poor document non items (5, 6, 7, 8, 9, 10, 11, 12, 13, 20, 21, 22, 23, 24, 25, 26, 27, 28 & 29), items (2, 3, 4, 14 and 15) was fair documentation, and good documentation on the remaining items.

Table (2): The Association between Nurses Documentation for Nursing Care Score and the Demographic Characteristics.

Demographic Variables		Sum of Squares	df*	Mean Square	F	Sig.
Age groups	Between Groups	.057	2	.029	.027	.974
	Within Groups	60.526	57	1.062		
	Total	**60.583**	**59**			
Gender	Between Groups	.022	2	.011	.043	.958
	Within Groups	14.561	57	.255		
	Total	**14.583**	**59**			
Level of education	Between Groups	2.268	2	1.134	2.395	.100
	Within Groups	26.982	57	.473		
	Total	**29.250**	**59**			
Years of employed in hospital	Between Groups	4.136	2	2.068	.617	.543
	Within Groups	191.114	57	3.353		
	Total	**195.250**	**59**			
Years of employed in surgical ward	Between Groups	3.512	2	1.756	.681	.510
	Within Groups	147.088	57	2.580		
	Total	**150.600**	**59**			
Training course	Between Groups	2.070	2	1.035	5.238	.008
	Within Groups	11.263	57	.198		
	Total	**13.333**	**59**			

This table indicates that there is no significant association between nurse's documentation for nursing care score and the demographic characteristics (age, gender, level of education, years of experience in surgical ward and years of employed in hospital).

Discussion

Throughout the course of the data analysis of the current study, the findings show the majority of the study were female who accounted for (60%) of the total participants while male constituted (40%). Most of the study participants (46%) were ages group (18-27) years old,the level of education represented that most of them (38%) were from institute graduate,most of them(74%) were married, (38%) for (1-5) years were employment in nursing, most of nurses(70%) have training special session in the nursing documentation. Majority of them (34%) were employee (1-5) years in surgical ward, and finally

These findings are in line with study done by other researcher who reported that study the average age of nurses was 32.40+ 5.58 years and they have a 6.40+ 3.58 years clinical experience .of all, 147(86.8%) nurses were female and 168 (98.8%) of them has a BS degree in nursing. 83 (48.8%) nurses working in medical wards and 87(51.2%) were working in surgical wards [8].

These findings agreed with findings obtained from other study, who stated that the majority of participation nurses were female142 (87.6%),most of them 104(61.2%) were married their mean of age group was 31.38years,majority of them (51.2%) were working in surgical wards and almost of them (98.8%) had bachelor of science degree in nursing[9].

Twenty nine questions to assess nurses documentation for nursing care in surgical ward,in order to response to first question of the study table five. This table shows thenursing documentation in four selected parts of nursing documents including recording vital sign, recording wound care,recording medication treatment, and recording intake and output of fluids,the total mean of score was poor nursing documentation .Further investigation of results of study revealed the most of items that weren't recorded by nurses in recording wound care dressing,location of wound(68%), size of wound (82%),wound discharge (96%),all items related to Amount of discharge,colour of discharge,odor of discharge(96%),signs of wound healing(94%) all items that mention up that weren't recorded by nurses,total mean of score related to wound care was poor.

In recording intake and output of fluids most items that weren't recorded were including, where not recording fluid take through mouth(64%), intravenous fluid(72%), nasogastric tube and gastrostomy route (88%) all items are absent (88%) all items are absent (88%) all items are absent in nursing documentation. Also recording were absent in fluid output including urination,defecation,vomiting (74%),chest tube, drain (88%) and nasogastric tube (92%) of all items related fluid intake and output not recorded by nursing,the total of mean of score related to fluid intake and output was poor.

In recording vital sign assessment art most items are recorded the mean of score of vital sign was fair. In recording medication treatment most items are recorded by nurses, the total of mean of score related drugs treatment was good.

This finding was in good agreement with that obtained from other researcher reported that the quality of nurses' documents was moderate. Further investigation showed that most items that weren't recorded by nurses in recording nursing report part were including "recording the time of reports" (100%), "recording the response of patients to interventions" (97.9%) and "recording the time of nursing cares" (96.5%). In recording medication treatment part most items that weren't recorded were including" respect suitable method for correct errors" (40.6%) and other items were completely respected by nurses. In recording intake and output of fluids most items that weren't recorded were including recording accurate time of checking I & O of fluids" (100%) and "recording the differences between the intake and output of fluids" (78.3%). In recording vital sign assessmentpart most items that weren't recorded were including "recording the location of controlling vital signs", "recording the unit of temperature", "the limb used for controlling the blood pressure" (100%) and "the unit of blood pressure" (97.1%)[8].

Another study agree with the finding of the study who stated the nursing records showed In the vital sign section, data showed that all of them had moderate level and their mean score were 10.69 ± 0.52. In I & O fluid section data showed that 18.6% of flow sheets had moderate quality but most of them 81.4% had suitable quality and their mean score were 13.24 ± 1.07. In chronology sections, all of flow sheets had suitable

quality. In drug intervention part, mean score was 11.78 ± 1.42 and most (85.9%) of them had good quality[9].

These findings agreed with study done by other researcher who reported that the quality of nursing care records was poor and inadequate to reflect individualized nursing care. Their results suggested that more emphasis is needed in nursing practice, and nursing education on the quality of record keeping in order increasing its evidential value[12].

These finding is the same line with study done Rangraz Jedi et al byIn one study, assessed the quality of 540 nursing documents and reported that only 11% of these documents didn't Contain necessary information [13].Hanifi, (2002) assessed the quality of 30 medical records and reported that only 16.1% of nursing documents had a good quality and 35.8% of them didn't contain necessary information[14]. Findings of most other studies have also showed that nursing documents have inadequate information about nursing care process and are consistent with the findings of our study [15,16].

In order to respond to second question of the study the association between the nursing documentation for nursing care with some demographic characters of selected nurses. There are no significant relationship between nursing documentation and demographic characteristics of nursing, but significant relationship between nursing documentation and training course.

This finding was in good agreement with that obtained from other study who reportedthat correlation between age and clinical experience of nurses with quality of their documents chi-square test was used. Results showed that there was no meaningful statistical correlation between qualities of nurses' documents with their age ($\chi^2 = 1.34$, df = 2, p = 0.51)[8].

Conclusions

The study concluded that; nurses that working in surgical ward in all selected teaching hospitals had poor documentation in most aspect of nursing daily documentation for nursing care. We recommend conducting teaching programs or sessions must emphasize on all aspects of nursing documentation, for improving quality of nursing documentation and also the study recommends to nursing documentation must be covered widely and in-depth in nursing curriculum of nursing schools.

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