#### **ORIGINAL ARTICLE**

# Challenges Facing Nurses toward Providing Care for Patients at Intensive Care Units during the Pandemic of Corona Virus Disease

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#### **ABSTRACT**

**Background:** Nurses constitute the majority of healthcare practitioners, have been fighting the COVID-19 outbreak on the front lines. Nurses could face several challenges during delivering care for patients at ICUs especially at the time of pandemic of COVID -19, including workload and shortage, psychological load, availability of resources, responsibilities, and role conflict.

Aims of the study: To what extent is there a significant relationship between challenge that facing nursing care at intensive care unit during the pandemic of corona virus?

**Methodology:** A descriptive study design was conducted on ICU nurses at Baquba teaching hospital for the period October 15<sup>th</sup>, 2021, to March 25<sup>th</sup>, 2022. A non-probability (Purposive) sample was selected of 35 nurses who work at Baquba teaching hospital. The data was collected using a previously prepared questionnaire and official agreement to use the study questionnaire was obtained from the original author. Descriptive statistics (frequencies, percentages, mean, and standard deviation) and inferential statistics (person correlation) were used in the data analysis.

**Results:** Results showed that nurses who work at ICU during the pandemic of COVID -19 were faced several challenges to deliver care for patients, including shortage of nurses in the presence of large number of patients, lack of appropriate offices for nurses, stressful work environment, sense responsibilities for some critical cases, and lack of support from superiors.

**Conclusion:** The study concluded that nurses who work at ICU during the pandemic of COVID -19 were faced several challenges to deliver care for patients, including shortage and workload, psychological load, taking responsibilities, and role conflict challenges.

Keywords: challenges, nurses, ICU, COVID-19.

#### INTRODUCTION

Nurses constitute the majority of healthcare practitioners, have been fighting the COVID-19 outbreak on the front lines. Nurses are at the greatest risk of infection because they interact closely with patients, and their immune systems are weakened by long shifts and stress. As a result, this consider as a challenge that nurses could face during the time of delivering care for patients in healthcare settings¹.Nurses faced a unique and aggravating predicament as a result of their inability to save patients and the risk of spreading the sickness to their families, which could have harmed patient care. Nurses are also more likely to suffer from psychological issues such as anxiety, sadness, sleeplessness, and stress. They may also face a variety of challenges due to being in a stressful situation that they have never experienced before ².

Nurses might be physically and mentally stressed, and they would feel lonely and helpless in the face of health dangers and strain from high-intensity work induced by such public health emergencies. Previous research has found that nurses who work closely with patients who have developing infectious diseases experience loneliness, anxiety, dread, exhaustion, disturbances, and other physical and mental health issues. Many factors have been found to affect the quality of care in ICU, including lack nursing staff, a large number of nursing records, a long wait time, and a shortage of specialized nurses. The violent behavior of patients in the hospital is a difficulty for nurses. Many patients are difficult to converse with and, at times, aggressive. As a result, this occupation can be quite demanding and stressful at times. Nurses face a severe problem with workplace violence. The lot of the sample, patients and other medical personnel are the main perpetrators of violence against nurses(3)(4)

Nurse shortages are a worldwide issue. Hospitals are currently confronting a difficulty in managing a nursing workforce shortage due to rising health-care costs. This is because hospitals are putting more money into innovative medical technology rather than proper staffing. The nurse-to-patient ratio remains uneven due to a nursing staffing shortfall. The number of patients is growing all the time, and there is a severe lack of nurses to care for them<sup>5</sup>. In addition to nursing shortage as a challenge that nurses face in healthcare settings, patients' violent behaviors in healthcare facilities is another challenge nurses could face during delivering care for patients in critical care units and other units<sup>6</sup>

#### **METHODOLOGY**

**Design of the Study**: A descriptive study design was carried out in order to achieve the objectives of the study. The study was initiated from October 15th, 2021 through March 25th, 2022.

**Setting of the Study:** The study was carried-out at the ICU Center in Baquba teaching hospital.

The Sample of the Study: A non-probability (purposive) sample of (35) nurses were selected from ICU in Baquba teaching Hospital Data collection: Data were collected through the use of a questionnaire by means direct interview with nurses from the January 4th, 2022, until the January 20th, 2022.

**The Study Instrument:** A previously prepared questionnaire was used after getting the permission from the original authors. The reliability of the questionnaire was .89 which was acceptable to be used in this research<sup>6</sup>.

**Rating and Scoring:** The items of the questionnaire were scored as (One) for yes answer and (zero) for no answer.

Statistical data analysis: Data were analyzed through the use of IBM-Statistical Package of Social Sciences (SPSS) which included descriptive statistics

### **RESULTS**

Table (1) indicated that the highest percent of the study sample (62.9%) were male nurses within age group (21 - 30) years old whom accounted for (68.6%). The greatest percent for nurses were married and they accounted for (65.7%). Table (1) also presented that (40%) of the study sample have bachelor's degree in nursing. In addition, (94.4%) of the sample were ICU nurses, and approximately half of them have (1- 5) years of experience in ICU

Table (2) showed that nurses have higher challenges in ICU in relation to large number of patients in ICU, increase number of night shift, dealing with severe cases, fear from getting infection from patients, lack of availability of beds, lack of appropriate office for nurses, working with tension and stress, sense of responsibilities, and lack of support from superiors.

Table (3) presented that there was a significant correlation between sense of responsibilities and the presence of supportive materials. In addition, there were significant correlation between the total score of challenge and workload, psychological load, sense responsibility, and role conflict scores, respectively.

Table 1: Distribution of the Study Sample (Nurses) by their Demographic Characteristics

Characteristics.		
Gender	F	%
Male	22	62.9
Female	13	37.1
Total	35	100
Age/ years	F	%
21 – 30	24	68.6
31 – 40	10	28.6
41 years and more	1	2.8
Total	35	100
Mean ± SD	$30 \pm 5.5$	
Marital status	F	%
Single	10	28.7
Married	23	65.7
Divorced	1	2.8
Widowed	1	2.8
Total	35	100
Education Level	l F	%

High school Nursing/ preparatory	7	20
	/	
Diploma in Nursing	13	37.2
Bachelor`s degree in Nursing	14	40
Master's degree in nursing/PhD in Nursing	1	2.8
Total	35	100
Job	F	%
ICU Nurse	33	94.4
Head Nurse of the ICU	1	2.8
Co-Head Nurse of the ICU	1	2.8
Total	35	100
Years of Experience	F	%
Less than 1 year	4	11.4
1 – 5 years	18	51.4
5 – 10 years	9	25.8
More than 10 years	4	11.4
Total	35	100

(F)Frequency; (%)Percentage

Table 2: Challenges Faces Nurses at ICU (N=35)

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Items	Yes	No	Mean	Sig.
Workload				
Increase in workload	9	26	.25	L
Inadequate time to complete the work assigned to a nurse	8	27	.22	L
Need to work long hours (as night shift)	16	19	.45	М
Large number of patients at ICUs	27	8	.77	Н
5. Increase numbers of night shifts	24	11	.68	Н
Psychological load				
Dealing with severe medical conditions and emergency diseases with little hope of recovery	26	9	.74	Н
2. The fear of the possibility of infection from patients	25	10	.71	Н
Dealing with patients with different values and beliefs	20	15	.57	М
4. Dealing with patients who do not adhere to the instructions	19	16	.54	М
5. Lack of appreciation for his/her efforts	20	15	.57	М
Supportive materials				
1. Lack of availability of beds, examination rooms, and some equipment and medicines	26	9	.74	Н
Lack of appropriate offices for nurses	28	7	.8	Н
3. The presence of some high-tech devices exceed their abilities and cognitive skills did not receive any training before the top handle		27	.22	L
Unavailability of chance to introduce your abilities and skills	19	16	.54	М
5. Working atmosphere filled with tension and stress	28	7	.8	Н
Sense of responsibility				
1. Sense of responsibility for some of the equipment and materials, medicines, and supplies	31	4	.88	Н
Sense of responsibility for some critical cases	32	3	.91	Н
Do not specify the duties and responsibilities of nursing	17	18	.48	М
4. Lack of managerial and leadership competence of your superiors	22	13	.62	М
5. Lack of support superiors at work	27	8	.77	Н
Role conflict	Yes	No	Mean	Sig.
Working time and long shift are contrary to family	12	23	.34	М
2. Family life is risked by the choice of nursing profession	11	24	.31	L
3. Instability in family life due to increased working hours and night shift	9	26	.26	L
Pig = significant spars H = high spars (0.67, 1) M = moderate spars (0.24, 0.66) L = law spars (0.0.22)	•	•	•	•

Sig. = significant score. H. = high score (0.67 - 1), M. = moderate score (0.34 - 0.66), L. = low score (0 - 0.33).

Table 3: Correlation between domains of challenges facing nurses at ICU (N=35) including workload challenges, psychological load, technical support, sense of responsibility, and role conflict.

		Workload challenge	Psychological Load	Supportive Material	Sense responsibility	Role conflict	Total Challenge Score
	r						
Workload Challenge	P	1					
	N						
Psychological Load	r	046					
	P	.791	1				
	N	35					
Supportive Material	r	068	.254				
	P	.699	.141	1			
	N	35	35				
Sense responsibility	r	.087	.034	.338*			
	P	.621	.845	.047	1		
	N	35	35	35			
Role conflict	R	.275	.055	174	008		
	P	.110	.755	.317	.963	1	
	N	35	35	35	35		
	R	.515	.39	.104	.332	.564	
Total Challenge Score	P	.002	.02	.553	.05	.000	1
_	N	35	35	35	35	35	

## DISCUSSION

Table (1) indicated that the highest percent of the study sample (62.9%) were male nurses within age group (21 - 30) years old whom accounted for (68.6%). The greatest percent for nurses were married and they accounted for (65.7%). Egyptian research done on 45 nurses to determine the challenge and crises that confronting them during delivering care for patients in critical care units at Assiut University Hospital. The authors of this study found that approximately 68 percent of the study sample were within age group 20 - 30 years old and most of them were married. Table (1) also presented that (40%) of the study sample have bachelor's degree in nursing. In addition, (94.4%) of the sample were ICU nurses, and approximately half of them have (1-5) years of experience in ICU. This Egyptian study also reported that 33.33 percent of the ICU nurses at Assiut University Hospital have Diploma degree in nursing, 64.4 percent work as ICU nurse, and 44.4 percent have 1 - 5 years of experience in ICU6.

Table (2) showed that nurses have higher challenges in ICU in relation to large number of patients in ICU, lack of appropriate office for nurses, working with tension and stress, sense of responsibilities, and lack of support from superiors. Study done in 2021 reported that several challenges face nurses during delivering care for patients at ICU at the time that OCIVD-19 is present, including poor organization support, work load, nursing shortage, physical stress, and psychological burdens. This reflects that nurses all around the world face challenges to deliver care for patients during pandemic of COVID-197.

Table (3) presented that there was a significant correlation between sense of responsibilities and the presence of supportive materials. In addition, there were significant correlation between the total score of challenge and workload, psychological load, sense responsibility, and role conflict scores, respectively. Study done in Egypt reported that there a significant differences were found between workload and support at (P = .02), and between support and sense responsibility at (P= .008). This revealed that nurses can take their responsibilities and achieve their duties at the presence of support even with the presence of workload<sup>6</sup>.

# CONCLUSION

The study concluded that nurses face challenges to deliver care and work effectively at ICU in Baguba during the pandemic of

COVID-19 due to nursing shortage, taking responsibilities, in appropriate supportive materials, psychological stress and load, and conflict in ICU

#### Recommendation

The study recommended to accomplish future studies on a large population to evaluate challenges facing nurses in Iraq during pandemic of COVID-19 to be able to generalize results. Encourage support for nurses to take their responsibilities even within a stressful work environment, in addition to efforts to decrease such stressful work conditions.

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