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## Satisfaction and Opinions of Covid-19 Patients toward Nursing Services at Emergency Unit

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### Abstract

**Background:** Emergency nurses play a critical role in providing proper nursing care services for covid-19 patients and spend the most amount of time with the emergency medical setting. **Aim of the study:** Evaluate the satisfaction and opinions of Covid-19 Patients toward nursing services at emergency unit. **Sample:** A purposive sample patient whom previously infected with corona virus and received nursing services at emergency unit of Ministry of Health Assuit Chest and Assuit University hospital **Tools:** This study included two tools: Patient assessment sheet and patients' satisfaction and opinion questionnaire. **Results:** Covid-19 infected patient's general satisfaction toward emergency nursing care services (51.7%) very satisfied with care and patient's opinions nursing services (94.4%) is very useful during emergent covid-19 crisis. **Conclusion:** The present research found that covid-19 patients were satisfied with nursing services and opinion have positive association with patients satisfaction level, Patients satisfied with the nursing services of a particular hospital may tend to visit the institution consistently. **Recommendations:** Health professionals should continue their education so they can focus on the prevention and control of covid-19. Provide of Healthcare with all facilities to get the best care in an emergency.

**Keyword:** Covid-19 Patients, Emergency Unit, Nursing Services, Opinions & Satisfaction.

### Introduction

COVID-19 virus primarily travels from person to person. This typically occurs when an infected person chats, coughs, or sneezes close to other people. Small particles from the infected person's lungs and airways are used to spread the infection. These particles are airborne and can readily reach surrounding individuals. In other circumstances, such as in enclosed areas where the same air is constantly blown about, the virus contained in the particles may be able to travel to individuals who are further away. (Centers for Disease Control and Prevention, 2020)

Patient satisfaction, defined as the client's overall positive evaluation of the health care services, largely influences health care provider choice in health care sector. Patients who are happy with the medical care they receive at a particular hospital may choose to frequent the facility frequently and keep their positive working relationships with medical staff. (Bima et al, 2022)

The patient's satisfaction level is measured based on several factors that are mostly reported by the patient. Based on satisfaction level, researchers can introduce new policies and plans and improve patients' satisfaction level and achieve better outcomes. Patients' satisfaction is affected by mental perception, patients' awareness of their rights, personnel's communicational abilities to establish a mental

relationship with patients, and several other factors such as cultural, social, economic, and personality background. In addition, demographical factors such as age, gender, and education level can affect the satisfaction level. (Ismayir, 2020)

Research into patient opinions feedback is a relatively recent phenomenon that gathered pace in the 1990s. Research into how healthcare providers use this data to improve nursing services is at an early stage. A themed review of current research on patient feedback was conducted on behalf of the National Institute for Health Research, providing evidence to influence debate, policy and practice on the use of patient feedback data (Maxwell & Lamont, 2019)

Studies have shown that nurses with higher professional commitment and communicational skills achieve a higher level of patient satisfaction. In addition, where nurses are given more independence, have a stronger role in decision-making, and cooperating with other health personnel, they achieve a higher level of patient satisfaction. Besides, quality and safety of care and patients' satisfaction with the hospital environment require management's support for nursing care, good nurse-physician relationship, nurses' participation in decision-making, and priority of quality care from the nurses' viewpoint. Patient satisfaction measurement is a complicated and multifaceted phenomenon, including, among many,

relationships with medical personnel, physical environment, and specification of health care organization (Lotfi et al, 2019)

In the emergency department, nurses often encounter patients who are critically ill. Many emergency nurses, in particular, have the natural instinct to rush to a critically ill patient and begin assessment and care. Before performing any resuscitation, it is crucial that nurses and other healthcare professionals take a few extra seconds to put on the proper PPE. (Jagoda et al, 2019)

### Significant of study

Patient satisfaction is an indicator of health care quality service and involved as an outcome measure. Quality of health care service and patient satisfaction has been affected by the current coronavirus disease 2019 (covid -19) pandemic. It induced uncertainty and shortage of medical supplies due to limited global movement. In a world the last annual incidence by covid -19 are 453,833,910 (WHO 2022). Patients number of covid from all patients admitted to Assuit Chest Hospital is 4056 (45,6% and 54, 3%) (Ministry of Health Hospital record 2020, 2021) and Patients number of covid from all patients admitted to Assuit University Hospital is 2680 (61,2% and 38,8%) (Assuit University Hospital record 2020, 2021). The Significant of this study is improving patient outcome by giving special nursing care for Coronavirus cases and prevent patients complication.

### Research questions:

1. What is the patient's satisfaction level with covid-19 about nursing services?
2. What is the patient's opinions level with covid-19 about nursing services?

**Research design:** Exploratory descriptive research was conducted in this study.

**Research setting:** Emergency unit of Ministry of Health at Assuit Chest, and Assuit University Hospital.

**Subjects:** The study involved available face to face and online sample of all patients (total number 178) who were previously infected with corona virus and received nursing services at emergency unit at Ministry of Health at Assuit Chest and Assuit University Hospital during the pandemic crisis for 6 months from (June to December 2022)

**Tools:** Two tools used by the researcher in this study after reviewing of the related literatures (Owaidh, 2020 & Sidhartha et al, 2021) used to assess patient condition, and divided into parts:

#### Tool I: Patient assessment sheet

##### Part one: Demographic data assessment.

It was prepared by the researchers after reviewing the related literatures to assess the following items:

patient's age, sex, level of education, occupation, marital, residence (urban or rural).

##### Part two: Patient's clinical data assessment.

Covid-19 infection severity according to medical diagnosis (mild – moderate – severe) -nursing services outcomes (admission – isolation - home care) – length of stay – hospital accommodation and recovery status from covid-19.

#### Tool II: Patients' satisfaction and opinion questionnaire

it consisted from two parts.

##### Part one: Patients' satisfaction questionnaire

This tool was constructed and developed after reviewing related literatures (Karaca et al, & Nurpratama, 2019) .It included patient's related questions focused on their satisfaction nursing care, provided care, and provided information preferences and time spent with staff. They consisted of fifty five (55) questions as: General satisfaction (8) items as (very satisfied with nursing care- nursing care is excellent), technical quality of nursing care (17) items as (nurse introduces herself –availability of ordered laboratories/x-ray/ ultrasound procedure), communication and interpersonal relationships (14) items as (nursing listen carefully- clear explanation of treatment plan), financial aspects (6) items as (care without financial setback, problem to cover share of cost), time spent with nursing staff (2) items as (nurse spend plenty of time), access/availability/convenience (8) items as (get hospital care without trouble –easy to get care in an emergency).

**Scoring system:** That included a 4-point likert scale consisted of strongly disagree, disagree, agree and strongly agree. The study tool had maximum scoring (220 degree). Not satisfactory (< 110 degree), from (110- 165 degree) satisfactory, very satisfactory (>165-220).

**Part two: Patients' opinion questionnaire** this tool was constructed and developed after reviewing related literatures (Thomas et al, 2020 and Wright et al, 2022) it included patient's related questions focused on their opinion. They consisted of twenty (20) question, the questionnaire comprising subscales as (nursing services is very useful –take advice for treatment – nurses can communicate information clearly with patient and their families – nurse can follow up COVID-19 patient) with a 2-point [Yes, No]

**Scoring system:** Including two-point scale with scores of zero and one (1= yes, 0 = no).

Total scoring (20 degree), the score of negative opinion is decided if (<13 degree), while positive opinion is obtained if the score (>=13 degree)

**Validity and reliability:** Five critical care nursing experts and professors evaluated the validity of both tools (one and two). Cronbach's alpha test was used to determine the tools' dependability. The results for

tools one and two were (0.88% and 0.87%, respectively). Must make sure the tools are clear, applicable, doable, and relevant.

**A pilot study:** It carried out on 178 covid-19 patient to test the tools for clarity, objectivity, and feasibility, then necessary modifications were done and their results validity the of tools were done by five expert professors in critical care and emergency nursing. The reliability of the tools was done using cronbach' alpha test it (0.88 %, 0.95% and 0.85%).

#### **Implementation phase**

- The researchers prepared the online and face to face submitted tools using google form. The questionnaire sheet was available for all patients who were previously infected with corona virus and received nursing services at emergency unit at Ministry of Health at Assuit Chest and Assuit University Hospital during the pandemic crisis included in the study at any time throughout the study period using face to face and Google form.
- An official approval received to carry out the study. Data collected actually took place between (May 2022) and (December 2022). At the start of the study and during the entire six-month duration of it, the researchers were accessible two days per week in various shifts and alternately in various study settings. The researchers each completed their own copy of the questionnaire. Every form took, on average, between 15 and 20 minutes to be completed. Following verbal consent from the patients, the researchers started gathering data.
- The questionnaire was created such that all questions must be answered and signed before submitting. Only one answer and one response are allowed for each statement.
- The researcher kept up with the patients who had previously been infected with the corona virus and sent reminder messages to Google form. After completing the two study-related tools, the participants received a submission.

#### **Ethical consideration**

1. Research proposal was approved from ethical committee in the Faculty of Nursing.
2. There is no risk for study subjects during application of the research.
3. The study followed common ethical principles in clinical research.
4. Written consent be obtained from patients or guidance that are willing to
5. Participate in the study after explaining the nature and purpose the study.
6. Confidentiality and anonymity be assured.
7. Study subjects had the right to refuse to participate and or withdraw from the study without any rational.

8. Study subject privacy was considered during collection of data.

#### **Statistical analysis**

Descriptive statistics were employed to describe the quantitative variables, and SPSS version 25 was used to analyses the data. The sample and various COVID-19 patient satisfaction and opinion were compared using various parameters using the t test at the 0.05 level of significance. The t test was used to compare various elements between the sample and several COVID-19 patient satisfaction and opinion. Continuous variables were expressed as mean standard deviation (SD), and they were expressed as continuous variables.

**Results:****Table (1): Distribution of demographic of study patients (n=178)**

Variables	No	%
<b>Age</b>		
18< 28 years	31	17.4
28< 38 years	45	25.3
38< 48 years	36	20.2
48< 58 years	27	15.2
58 years old or older	39	21.9
<b>Gender</b>		
Female	102	57.3
Male	76	42.7
<b>Education</b>		
Primary	3	1.7
Preparatory	14	7.9
Secondary	39	21.9
University	122	68.5
<b>Occupation</b>		
Employed	107	60.1
Unemployed	35	19.7
Retired	14	7.9
Student	22	12.4
<b>Marital status</b>		
Single	28	15.7
Married	133	74.7
Divorced or widowed	17	9.6
<b>Residence</b>		
Rural	77	43.3
Urban	101	56.7

**Table (2): Distribution of Biomedical data of study patients (n=178)**

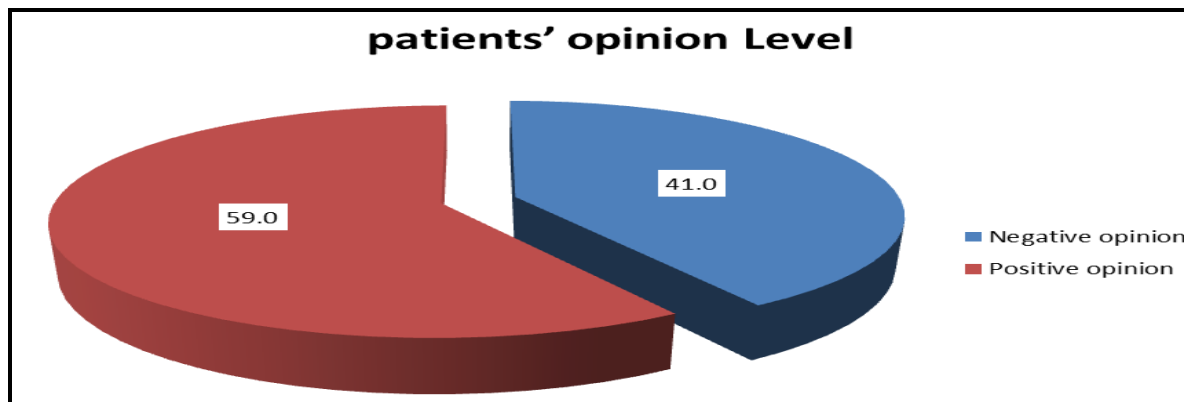
Variables	No	%
<b>Severity of disease</b>		
Mild	82	46.1
Moderate	66	37.1
Sever	30	16.9
<b>Setting</b>		
ICU	15	8.4
Hospital Isolation	52	29.2
Home isolation	111	62.4
<b>Length of stay</b>		
1–3 days	127	71.3
4–6 days	36	20.2
More than 6 days	15	8.4
<b>Hospital accommodation</b>		
Private room	81	45.5
Shared room	97	54.5
<b>Recovery</b>		
Cured	113	63.5
Not cured	65	36.5

**Table (3): Descriptive Maximum score and mean & Standard deviation of patients' satisfaction about services of covid-19 subdomains (n=178)**

Domains	Max Score	Mean±St.D	Range	Mean%
General Satisfaction	32	20.78±4.12	12-28	64.92
Technical Quality of nursing care	68	43.42±9.33	27-59	63.85
Communication and interpersonal	56	39.1±8.21	25-51	69.82
Financial Aspect	24	14.96±4.37	7-21	62.34
Time Spent with nursing staff	8	5.6±1.31	2-8	69.94
Access/Availability/Convenience	32	20.57±5.19	12-28	64.27
<b>Patients' satisfaction Score</b>	<b>220</b>	<b>144.42±29.91</b>	<b>96-193</b>	<b>65.65</b>

**Table (4): Distribution of patients' satisfaction Level about nursing services of covid-19 (no=178)**

patients' satisfaction Level	Max Score	No	%
Not Satisfactory	<50%	12	6.7
Satisfactory	50-75%	111	62.4
Very satisfactory	>75%	55	30.9
<b>Mean±SD(range)</b>	<b>220</b>	<b>144.42±29.91(56-193)</b>	

**Figure (1): Distribution of patients' opinion Level about nursing services of covid-19 (no=178)****Table (5): Relation between patients' satisfaction score with their demographic data (no=178)**

Variables	No	Patients' satisfaction score	
		Mean±SD	Range
<b>Age</b>			
18< 28 years	31	139.23±31.79	107-193
28< 38 years	45	134.33±27.06	98-182
38< 48 years	36	143.75±26.16	96-187
48< 58 years	27	134.11±22.39	112-178
58 years old or older	39	167.95±27.61	112-193
<b>Test Used</b>		<b>F=10.06</b>	<b>P=0.000**</b>
<b>Gender</b>			
Female	102	149.52±29.05	105-193
Male	76	137.58±29.87	96-193
<b>Test Used</b>		<b>T=7.18</b>	<b>P=0.008**</b>
<b>Education</b>			
Primary	3	112±0	112-112
Preparatory	14	138.71±26.95	112-188
Secondary	39	143.46±30.36	110-185
University	122	146.18±30.13	96-193
<b>Test Used</b>		<b>F=1.51</b>	<b>P=0.213</b>

Variables	No	Patients' satisfaction score	
		Mean±SD	Range
<b>Occupation</b>			
Employed	107	145.3±30.66	96-193
Unemployed	35	134.94±19.92	112-188
Retired	14	170.07±31.62	112-193
Student	22	138.91±30.16	112-188
<b>Test Used</b>		<b>F=5.23</b>	<b>P=0.002**</b>
<b>Marital status</b>			
Single	28	155.68±25.14	116-186
Married	133	140.38±30.24	96-193
Divorced or widowed	17	157.47±27.36	121-188
<b>Test Used</b>		<b>F=5.03</b>	<b>P=0.008**</b>
<b>Residence</b>			
Rural	77	131.17±25.59	96-193
Urban	101	154.52±29.12	98-188
<b>Test Used</b>		<b>T=31.18</b>	<b>P=0.001**</b>

Table (6): Correlation between patients' opinions score with their demographic data (no=178)

Variables	Patients' opinion Score	
	Mean±SD	Range
<b>Age</b>		
18< 28 years	12.77±4.53	3-18
28< 38 years	12.4±4.19	2-19
38< 48 years	13.19±2.16	9-16
48< 58 years	9.78±4.62	3-17
58 years old or older	14±4.22	3-19
<b>Test Used</b>	<b>F=4.77</b>	<b>P=0.001**</b>
<b>Gender</b>		
Female	12.71±4.16	3-19
Male	12.41±4.22	2-18
<b>Test Used</b>	<b>T=0.22</b>	<b>P=0.639</b>
<b>Education</b>		
Primary	4±0	4-4
Preparatory	12.86±3.44	7-16
Secondary	13.03±4.62	3-19
University	12.61±3.96	2-19
<b>Test Used</b>	<b>F=4.66</b>	<b>P=0.004**</b>
<b>Occupation</b>		
Employed	12.79±3.38	2-18
Unemployed	10.77±5.08	3-18
Retired	12.07±5.77	3-19
Student	14.73±4.07	7-19
<b>Test Used</b>	<b>F=4.54</b>	<b>P=0.004**</b>
<b>Marital status</b>		
Single	13.89±2.04	10-16
Married	12.5±4.42	2-19
Divorced or widowed	11±4.39	3-17
<b>Test Used</b>	<b>F=2.67</b>	<b>P=0.072</b>
<b>Residence</b>		
Rural	13.12±4.42	3-19
Urban	12.17±3.95	2-18
<b>Test Used</b>	<b>T=2.27</b>	<b>P=0.134</b>

**Table (1):** Shows distribution of demographic characteristics and clinical data of the patient sample. Regarding the age groups 17.4% -21.9% of the patients were between (18< 28) years and (more than 58 yrs). The majority of them 57.3% were female. Concerning level of education 68.5% of them had university education. Revealed that majority of them 60.1% were employed and the majority of them were married about 74.7%. Regarding residence 56.7% live in urban areas.

**Table (2):** Illustrates the distribution of covid-19 infected patient's biomedical data. As regard severity of disease, 46.1% had mild disease. While 37.1% had moderate severity. Concerning Nursing services outcome, it was observed that 62.4% were isolated at home while 20.2% were isolated at department. Regarding length of stay, 71.3% had (1-3) days. 54.5% from infected patients had shared room during accommodation. As regard recovery from covid-19 infection, about 63.5% were cured.

**Table (3):** It shows from the table that mean score of General Satisfaction from total score 32 is 64.92% while mean score of technical quality of nursing care is 68 had 63.85% of studied sample. As regarding patient's satisfaction about Communication and interpersonal relationship shows from the table that mean score from total score 56 is 69.82%. However, patients satisfaction about financial aspect shown that mean score is 24 had 62.34%. Concerning, patient's satisfaction about time spent with nursing staff shown from the table that mean score from total score 8 is 69.94%. While patient's satisfaction about access/availability/convenience shows from the table that mean score from total score is 32 had 64.27%.

**Table (4):** Illustrates patients' satisfaction Level about nursing services of covid-19, About 62.4% of studied sample were satisfactory while 30.9% were very satisfactory and 6.7% were unsatisfactory.

**Figure (1):** Illustrates patients' opinions level about nursing services of covid-19. About 59.0% of studied sample had positive opinions while 41.0% had negative opinions.

**Table (5):** Shows relation between patients' satisfaction score with their socio-demographic characteristic. It was observed the relation between the patient' satisfaction score and their age, gender, occupations, marital status and residence.

An independent t. test was done to determine if there was differences between gender and residence with patient satisfaction score. There was t. significant deference (0,08 and 0,001). On anova cosecant to explain if there was differences between age, education, occupation, and marital status there was significant.

Regarding relation between age and patient satisfaction differences score there were statistical

significant differences with (p. value 0,000). While relation between gender and patient satisfaction differences score there were statistical significant differences with (p. value 0,008). Also relation between occupation and patient satisfaction differences score there were statistical significant differences with (p. value 0,002). Regarding relation between marital status and patient satisfaction differences score there were statistical significant differences with (p. value 0,008). Regarding relation between residence and patient satisfaction differences score there were statistical significant differences with (p. value 0,001). It was found statistical significant differences between them at (P. values = <0.000, 0.008, 0.002, 0.008 and 0.001) respectively

**Table (6):** Demonstrates that correlations between patients' opinions score with their socio-demographic characteristic, Regarding correlations between age in year and patients opinions differences score there were statistical significant differences with (p. value 0,001). Regarding correlations between education and patients opinions differences score there were statistical significant differences with (p. value 0,004). Also correlations between occupation and patient's opinions differences score there were statistical significant differences with (p. value 0,004). Regarding correlations between marital status and patients opinions differences score there were statistical significant differences with (p. value 0,072). It was observed that the correlations between the patient' opinions score and their age, occupations, education and marital status. It was observed statistical significant differences between them at (P. values = 0.001, 0.004, 0.004 and 0.072) respectively.

## Discussion

Levels of patient satisfaction and judgments about the quality of nursing care patients got at healthcare institutions during the COVID-19 crisis can be used to gauge how well healthcare services are working for COVID-19 patients. The most frequently mentioned factors used to gauge patient satisfaction with emergency units are the patient's specific health condition and the type of treatment received, the hospital environment, the standard of the hospital's services, the staff's overall conduct, the cost of the hospital stay, and the availability of post-discharge (follow-up) facilities. (Mohammad et al., 2022).

Cost of emergency hospitalization and patients' satisfaction and opinions can have strong relationship, especially due to economic cost during pandemic. In case of low-cost treatment or free treatment, in the context of Covid-19, when there are financial difficulties at almost all levels, can in fact be a more important parameter of increased patient satisfaction. (Alosaimi et al., 2022).

The majority of their time is spent in the emergency medical situation, where emergency nurses play a crucial role in giving covid-19 patients with the right nursing care services. As a result, it's critical to guarantee the best possible nursing care services. Assessing the calibre of nursing care would be helpful in determining how successful and efficient healthcare systems are in offering patients high-quality services. (Bima et al., 2021)

#### **Socio-demographic characteristics of the patient:**

**Regarding the age groups**, it was observed that the majority of studied sample were (28-47) yrs old age more than 58 yrs. This result may be attributed to the middle age related to increase activity work and transportation between overcrowding and contact with infected persons however old age related to low immunity.

This result in disagreement with Naglaa et al., (2023) who reported that less than fifty percent of the respondent, their age were between (18-25 year). On the same line Alborai et al (2021) who found that the patient mean age was (36:7± 11.2 years) old. Also Al-Samarraie et al (2020) documented that the mean age of the respondents was 43.18 years, with fifty percent of respondents aged 28 years and older. Hong et al., (2020) observed that participants were aged from 18 to 25 years.

**Concerning gender**, the current study's findings showed that more than half of the participants were female. This outcome may be explained by the fact that more women than men are exposed to the covid-19 virus through their jobs, daily activities, and chronic illnesses linked to recurrent pregnancies and labour. This result contradict with (Karaca, & Durna (2019) who showed that 50% of the sample under study were female participants and 50% were male participants. gender distribution among them is equal. More than half of them had received full COVID-19 treatment. In a similar vein Al-Samarraie et al (2020) fifty of them were female and the same were male.

However Alborai et al (2021) found that more than half of the patient were female.

**As regard level of education**, more than 50% of them held university degrees, according to the current study. This finding is in accordance with Naglaa et al., (2023) who reported that the majority of patients had university education. On the same line Alborai et al (2021) found that the majority of the patient had a university educational level. **Concerning occupation**. The current studied found that more than 50% were workers. This in the same line with Alborai, et al (2021) who stated that all participants in the current studied that less than half of patients worked. This finding is consistent with the research of Alborai et al (2021) & Al-Samarraie et al

(2020) who found almost half of patients were employed

**Regarding marital status and residence**, in the current study, it was noted that most of the participants were married and that more than half of them resided in cities. This the same line with Naglaa et al (2023) who found that more than half of patients' live in urban areas. **As regard severity of disease**, the current study demonstrated that less than fifty percent had mild disease while thirty percent had moderate severity.

This results in agreement with (Naglaa et al., 2023) who stated that less than half of those with the virus had minimal signs and symptoms. This finding is consistent with Alborai et al (2021) who reported that less than half of them had mild sign and symptoms of infection with covid-19.

**Concerning Nursing services outcome**, more than half of infected individuals were isolated at home, whereas just a small percentage were hospitalized. Along the same line as (Naglaa et al., 2023) who observed that more than half of patient were classified as home isolation after using remote hotline triage system. **Regarding, length of stay and accommodation**, the majority of patient (1-3) days. Over fifty percent of the infected patients stayed in communal quarters. Regarding recovery from covid-19 infection, more than 50% of cases were successfully treated. In a similar vein Al-Samarraie et al (2020) stated that more than half of the sample had spent more than six days in the hospital during their most recent hospitalization and that the majority of the entire sample had been hospitalized between one and three times. The majority of respondents had private rooms, and more than half had already finished receiving COVID-19 treatment.

**As regarding patient's general satisfaction** according to the current survey, more than 50% of respondents agreed that the nursing care provided for the COVID-19 virus emergency services was excellent (The vast bulk). Less than half of respondents agreed that there were enough nurses to care for patients. Ashry et al., (2020) were in the same line with the present study and reported that covid-19 service is a way of delivering safe medical and nursing services to patient's emergency department seem to be a safe and effective way of care especially in the time of the COVID-19 pandemic.

The same result was in line with Elsaie et al., (2020) who found that the majority of people who use emergency services concur and strongly concur that the healthcare setting is capable of delivering speedier medical care.

On the same line Effendi et al., (2019) discovered that COVID-19 patients in the Riyadh Province had a



generally high level of satisfaction with nursing care services. This key finding is in contrast to another study that was carried out in Saudi Arabian city of Tabuk and revealed low to moderate patient satisfaction ratings. This results attributed to world health organization in Egypt gave attention and financial support for all hospital health care setting during covid -19.

**Concerning, Communication and quality care**, less than fifty percent from study patients were agree that too busyness-like, impersonal while low percent were disagree that. More than fifty percent were agree that do best to keep me from worrying and the majority from the study sample were agree that should pay attention to privacy. This results attributed to world health organization in Egypt gave attention and financial support for all hospital health care setting during covid -19.

This result is consistent with two studies in Oman and Turkey (**Karaca & Durna, 2019**). Both studies reported “concern and caring by nurses” with the highest mean score when evaluating quality of nursing care. (**Albashayreh et al., 2019**) who indicates the good communication and attitudes of nurses who are providing care for patients besides their confidence and information. **Ipsos et al., (2020)** who reported that people’s experiences of emergency care were generally positive. Overall, the majority of patients reported that they felt safe from the risk of catching COVID-19 in hospital.

On the same line **Fancourt et al., (2020)** who observed that all patients said that the majority ‘always’ had confidence and trust in the staff treating them and fewer people remembered seeing social distancing measures such as markers on the floor or signage at the entrance. While this visible presence of measures reassured most people, a minority of patients were concerned about catching COVID-19 during their emergency unite stay said they felt ‘safe, were consistently less likely to remember seeing any infection control measures in their emergency room.

However **Thomas et al., (2021)** who claimed that the majority of patients reported that they felt the hospital had enough employees to take care of them. The majority of patients did not believe that the safety measures personnel took by wearing protective equipment had a negative impact on their care, in addition to the past patient experiences with PPE that were recounted. The overall patient perception of the quality of the care they received in an emergency during the COVID-19 pandemic was the survey's most significant finding. Despite all the precautions and modifications made to handle patients with COVID-19, patients reported that generally, their care was great. This results attributed to world health organization in Egypt gave attention and financial

support for all hospital health care setting during covid -19.

On the same line **Bima et al., (2022)** stated that appearance of doctors, nurses, and other staff members at the Hasna Medika Indramayu Clinic is clean and orderly, while the inpatient procedure is the procedure for receiving patients who are served quickly and simply. This demonstrates that the majority of highest satisfaction is achievement in emergency outpatient services at the clinic. Another investigation by (**Herwati et al., (2021)** and **Nurpratama et al., (2019)**. who claimed that poor services are found in outpatient services, including service time and waiting room comfort, the extent of amenities in the patient waiting room, patient admission processes are handled swiftly and without delay, and the doctor arrives on time

However **Effendi & Kevin, (2019)** ) who stated that the patient satisfaction is the basis for assessing the good or bad quality of health services received by patients, so that patients will have a satisfied perception if the performance of the health services they receive is as expected. Quality services in accordance with what is expected by the community, it will create a sense of security for the community, so that it will make people want to carry out examinations, treatments. Another point of view **Ghaliya et al., (2021)** who conducted a cross-sectional quantitative study at five general public hospitals to evaluate patients' perceptions and expectations of the quality of health treatment in Greek. The results revealed that patients' expectations for the quality of the services supplied were not met on all five quality dimensions, showing a negative gap between patients' expectations and perceptions.

Also **Alomariat al., (2020)** stated that the following significant variables affect the patient's perception of quality: open communication with patients, individualised care, attentiveness to their needs, polite behaviour, a trustworthy atmosphere throughout the hospital, and great physical amenities.

**Regarding, financial aspects**, less than 50% of studied participants agreed that care should be provided without putting them at financial risk, while a small percentage disagreed, according to the current study. Less than 50% agreed that being shielded from financial difficulty was important, while a small percentage disagreed. Pay more than one can afford was agreed upon by 50% of the study population. This has the effect of increasing the number of infected patients in the healthcare system as a whole. This brings about agreement with (**Ghaliya, 2021**). Who made a point of stressing the value of good nursing care for patient satisfaction additionally; an important aspect that should be taken into account by Iranian health administrators is the fact that this

criterion is the second one that, according to the performance sensitivity analysis, has significantly affected both public and commercial hospitals. In fact, the findings showed that interpersonal treatment has been neglected and not of desirable quality in public hospitals. In contrast, private hospitals have spent more money.

While, **Sang & Cheng, (2020)**, stated that the underutilization of community-based healthcare workers and the resulting waste of medical resources. Because perceived risk and patient anxiety are so strongly related to decision-making and financial resources, the study examined their effects on intentions to use community health clinics.

However, **Alosaimi et al., (2022)** who stated that there may be a negative correlation between hospital costs and patient happiness, particularly in the event of a pandemic. In the context of Covid-19, where there are financial challenges at practically all levels, low-cost or free therapy can actually be a more significant factor in improving patient satisfaction.

Another point of view **Mohammad et al., (2022)** who reported that the COVID-19 pandemic conditions required a special focus on interpersonal treatment. The most significant difference between public and private hospitals can be attributed to this criterion and the physical environment criterion. Therefore, it can be stated that by placing a higher priority on the physical environment and interpersonal treatment during the COVID-19 pandemic, private hospitals in Iran have benefited financially and significantly outperformed governmental hospitals in terms of patient satisfaction.

However, **Stanhope et al., (2021)** who noted that, though, that in the COVID-19 pandemic, a much higher percentage of patients were admitted to public hospitals than private hospitals according to the statistics of the Ministry of Health of Iran, and this high volume of admissions and lack of adequate facilities might have caused such a functional weakness. Indeed, public hospitals in Iran due to financial causes. Also **Mohammad et al., (2022)** who observed that the majority of the patients suffer from a lack of resources, and the problem of healthcare budget has always been one of the main problems of the health system in Iran in recent years.

Additionally **Stanhope et al., (2022)** who observed that because private hospitals are so expensive, many patients from middle-class or low-income social groups had no choice but to choose and be referred to public hospitals during the COVID-19 pandemic. The incapacity of the public sector to meet people's health demands, the subpar quality of public hospital services, the lack of doctors per patient, and the paucity of nurses were all highlighted.

This results are in disagreement with **Akyuz et al., (2022)** who did not undervalue the services and efforts of medical professionals in public hospitals who noted that the majority of patients referred to public hospitals and the lack of suitable facilities have led to patient dissatisfaction. Also **Issai & Jarmajo (2021)** who noted that one of its significant weaknesses is the lack of a thorough evaluation of the relationship between healthcare facilities and service quality. For the sake of this piece's secondary research during COVID-19, a number of media outlets, journals, newspapers, and governmental organisations were consulted.

**Regarding patients' satisfaction score** and mean & score of Subdomains, the present study documented the majority of max score of patients' satisfaction with mean & St.D (144.42±29.91) from total 220. On the same line **Monaghesh et al., (2020)** who demonstrated that the mean & St.D (121.4215.21) with emergency services in a healthcare setting has a high patient satisfaction rating overall. Furthermore, because the application of covid-19 consultations in various medical subspecialties must be assessed individually, the results of this study cannot be generalized to all medical subspecialties.

**Concerning patient's opinions toward** emergency nursing care services, the current study showed that the majority of studied sample reported positive opinions as easy getting nursing services during corona virus crisis, nursing services is very useful during emergent covid-19 crisis and access a quick response, nursing care is excellent, respectively. Study sample also reported that there were enough nurses for patient care, that receiving hospital care was simple, and that specialists were easy to access. In a similar vein **Naglaa et al., (2023)** who demonstrated that the majority of Covid-19 infected patient's opinions toward emergency covid-19 services of patients had positive opinions. Also **Fancourt et al., (2020)** who reported that overall, patients had positive opinions about their experiences of care in hospital during this time.

**As regarding patients' satisfaction Level** about nursing services, According to the current study, of the study sample, more than 50% of studied sample were satisfied, 30% were extremely satisfied, and a small percentage were unsatisfied. This contradicts with **Alharbi et al., (2021)** who revealed that several studies during the covid-19 pandemic in North Shoa, Ethiopia, showed very poor levels of patient satisfaction. In Riyadh, Saudi Arabia, USA, during COVID-19, two additional studies examined patients' satisfaction with emergency clinics; both studies found excellent levels of patient satisfaction.

**Regarding correlations between patients' satisfaction score with their socio-demographic**

**characteristic**, it was shown that age, gender, occupation, marital status, and place of living were all correlated with the patients' satisfaction scores. They were shown to differ statistically significantly at (P. values = 0.001, 0.008, 0.002, 0.008 and 0.001), respectively.

This results is in agreement with **Al-Samarraie et al., (2020)** who found a relationship between the patient's happiness with the COVID-19 services and their sociodemographic information, as well as a statistically significant variation in satisfaction levels between the study sample's age, education, and occupation (P 0.001). In a similar vein (**Albashayreh et al., 2019**) who recorded that the respondents' overall mean score was 4.23. The average rating for patient satisfaction with care received was 4.25. The mean age groups of respondents differed significantly. Based on respondents' age, sex, and educational level, there was a statistically significant difference in the mean satisfaction score among them (Mann-Whitney U=766, p=.043).

**Concerning correlations between patients' satisfaction score with their biomedical data**, the relationship between patient satisfaction scores and factors such disease severity, hospitalization, and progress was proven. There is statistical association, with p values of (0.000\*\*) for all of the previously mentioned factors. This conclusion is in conflict with **Hong et al., (2020)** who found no connection between individuals' levels of happiness and biological information such as their disease severity, hospital admission, and progress. The biomedical participants' satisfaction levels did not differ significantly from each other.

**As regarding correlations between patients' opinions level with their socio-demographic characteristic**, it was observed that there is correlation between the patient' opinions score and their age and marital status. There are a statistical significant correlation between patients' opinions level with their socio-demographic characteristic with (P. values = 0.001, 0.002) respectively. On the other hand, **Alhumud et al., (2020)** who reported that there was no correlation between participants' attitudes and their age, gender, or level of education.

### Conclusion:

This study looked at how satisfied COVID-19 patients were with the nursing care and what they thought of it. The total nursing care, including the advice and care given, was reported to have a moderate degree of satisfaction. The efforts made by nurses who were informed, accountable, and prepared are to blame for the moderate satisfaction rating. The results of this study have significant ramifications for the future readiness and preparedness of healthcare

systems (particularly nurses) for pandemics and other health-related calamities.

### Recommendations

Based on the findings of the current study, it can be said that:

- Health professionals should continue their education so they can focus on the prevention and control of covid-19.
- Provide of Healthcare with all facilities to get the best care in an emergency.

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