PERSPECTIVES AND HEALTH ANXIETIES OF GYNECOLOGICAL AND OBSTETRIC PATIENTS DURING NOVEL COVID- 19 PANDEMIC AT A TERTIARY CARE CENTRE

Farhat Karim, Sadia Fatima, Uzma Saleem, Nusrat Noor, Rabia Kanwal, Farhan Ali*

Combined Military Hospital/National University of Medical Sciences (NUMS) Rawalpindi Pakistan, *CDA Hospital, Islamabad Pakistan

ABSTRACT

Objective: To assess the perspectives and health anxieties of gynecological and obstetric patients during COVID-19 pandemic.

Study Design: Cross-sectional study.

Place and Duration of Study: This study was conducted in emergency and outpatient clinics of Gynecology and Obstetrics department Combined Military Hospital Rawalpindi, Pakistan from April to May 2020.

Methodology: Two hundred and thirty patients participated in this study by answering a pre-designed questionnaire. All the patients were interviewed by the same doctor to minimize bias. Eleven questions were asked exploring their perspectives and anxieties regarding Novel COVID-19 pandemic, its effects on their healthcare and the challenges faced by the healthcare providers.

Results: The mean age of the respondents was 33 ± 5.2 years. One hundred and sixty four (71.3%) were obstetric and 66 (34.8%) were gynecological patients. Undergraduate, postgraduate, and healthcare professionals were 78 (33.9%), 134 (58.3%) and 18 (7.8%) respectively.

Two hundred and fourteen (93.03%) participants were aware of risk of COVID-19 pandemic and 140 (60.8%) knew about its adverse effects. One hundred and forty (62.5%) visited for regular antenatal. According to 196 (85.2%) had a good opinion about the attitude of the doctors and 216 (93.9%) were satisfied with their treatment. 186 (80.8%) had no apprehensions about the health workers protective gear but did consider hospital environment hazardous. Two hundred and six (89.5%) were not interested in revisiting the hospital again and 180 (78.2%) would not recommend it to their friends.

Conclusion: Gynecological and obstetric patients have different opinion about risk, safety measurements, environmental condition, stress, and attitude of doctors during COVID-19 pandemic according to age and educational status.

Keywords: COVID19, Gynecological and Obstetric Patients, Wuhan.

INTRODUCTION

The novel COVID-19 virus has taken the world by storm as it has become a health emergency, exhausting the medical resources world over in the fight against pandemic.

The first country to become infected by this virus was China, where in December 2019, this highly infectious disease emerged in Wuhan. This disease is caused by a member of family of Coronaviruses. The virus after infecting people in China then rapidly spread to other parts of the world thus making it a global pandemic[1].

The virus causes pneumonia followed by severe acute respiratory distress syndrome and it can be fatal in most cases. This virus has become a global concern and worry because of its high transmission rate along with high morbidity and mortality[2]. The knowledge and attitude regarding infectious diseases is associated with anxiety and panic which can further hinder the prevention of spread of disease[3]. Attitudes like denial, anxiety, panic, false measures to avoid infection can slow down or halt the battle against such uncommon situations[4].

In Japan, people have experienced many imperceptible calamities like atomic bombs, H1N1 influenza pandemic in 2009, etc. which led to fear, and risk associated with unseen enemy. All these events provoked social disruption[5].

Correspondence: Dr Farhat Karim, Consultant Gynecologist and Obstetrician, CMH Rawalpindi Pakistan

Received: 16 Jun 2020; revised received: 07 Aug 2020; accepted: 10 Aug 2020

Media coverage with continuous flashing of disturbing images add anxiety and fear during these situations. This leads not only to ill health but also decreased life expectancy[6]. In these situations, public fear usually results in discrimination, stigmatization and scapegoating of specific groups of people and authorities[7].

The strict lockdowns and measures that encourage people to stay home could result in more time spent on social media thus leading to spread of negative emotions, rumors and fake news[8,9].

The level of perception regarding this pandemic can be different in society in relation to educational and social status. The responses can be at two extremes. Educated, well to do class while understanding the gravity of the situation is doing the required social distancing and preventive hygienic measures. However, at the other extreme, the lower social class with low literacy rate while not taking the situation seriously is disrupting all the preventive steps and social distancing thus creating a dangerous level of unawareness and speedy spread of the disease.

METHODOLOGY

This cross-sectional study was conducted from 1st April to 30th May 2020 in emergency and outpatient clinics of Gynecology & Obstetrics department Combined Military Hospital Rawalpindi, Pakistan which is tertiary care centre. A total of 230 patients were included in the study by non-probability consecutive sampling. Prior approval from hospital ethics committee was taken IERB Certificate no 87/06/20. Hypothesized % frequency of outcome factor in the population (p): 85% ± 5, at Confidence Level (95%) using Equation Sample Size n = [DEFF* Np (1-p)]/[(d2/Z21-a/2*(N-1)+p*(1-p)] from Open Epi, Version 3, open source calculator – SSPropor. A minimal sample of 196 was calculated[5]. Patients were requested to fill a questionnaire in a room where social distancing and confidentiality was guaranteed. Verbal consent was taken from the patients after explaining the nature and purpose of the study. The patients were interviewed by the same doctor to minimize bias. A structured proforma was designed for this study consisting of age, educational status and eleven questions for evaluating patient's perspective and anxieties about COVID-19 pandemic, its effects on their healthcare and the challenges faced by the healthcare providers. All conscious, oriented gynecological and obstetric patientsbetween ages 20-50 years were included. Patients who wereless than 18 and >50 years, critical patients, cases of emergency cesarean section and laboring patients were excluded. The validity of the questionnaire was assessed by a senior consultant obstetrician. Initially the questionnaire was pilot tested on 20 participants to look for conceptual difficulties, obscurities, and social acceptability. Descriptive statistics including Frequency and percentage was calculated for categorical variables like educational level and type of patientsand mean ± for numeric variables like age. Statistical analysis was done by using IBM SPSS 22 software. As it is a descriptive study, no statistical test was applicable.

RESULTS

The age of respondents varied from 20 to 47 years with a mean of 33 ± 5.2 years. Age of obstetric patients ranged from 20 to 39 years and that of gynecological patients from 35 to 47 years and the meanage was 29 ± 3.5 and 41 ± 0.7 years, respectively. Majority of participants in our study were obstetric patients as shown by the pie graph. According to 196 (85.2%) participants the attitude of doctor was good and it seemed fair to 30 (13%) participants. One hundred and forty (62.5%) participants came to hospital for regular antenatal checkup, 82 (36.6%) came in emergency and 76 (33%) were gynecological patients.

Table-I: Education status distribution of Participants (n=230).

Variables		n	%
Education	Undergraduate	78	33.9
	Postgraduate	134	58.3
	Healthcare professionals	18	7.8

Two hundred and six (89.5%) patients were not interested in coming again to the hospital while 1.7% were unsure. One hundred and eighty (78.2%) were not in favorof recommending it to their friends.

The educational status of participants is shown in table-I and the patients perspectives are shown in table-II.

Table-II: Perspectives of Participants(n=230).

Variable		n	%
Risk awareness	Yes	214	95.5
	No	16	4.4
	Not Sure	-	-
Treatment satisfaction	Yes	216	93.9
	No	6	2.6
	Not Sure	8	4.3
Perceived adverse effects on pregnancy	Yes	140	60.8
	No	40	17.3
	Not Sure	50	21.7
Approvedprotective gear by doctors	Yes	226	98.2
	No	4	1.7
	Not Sure	-	-
Apprehension due to protective gear	Yes	34	14.7
	No	186	80.8
	Not Sure	10	4.3
Exaggerated protective measures of administration	Yes	160	69.5
	No	76	33.0
	Not Sure	12	5.2
Hazardous hospital environment	Yes	186	80.8
	No	46	20.0
	Not Sure	10	4.3

DISCUSSION

Our study revealed that all patients were educated with 33.9% undergraduates and 66.1% postgraduates and that is why 95.5% were aware about the COVID-19 pandemic.

In study by Corbett total 83.1% women did not often worry about their health previously but 50.7% were worried about their health often or all the time, 63.4% pregnant women had anxiety regarding their unborn baby[10] and this is similar to our study that patients are aware of risk. In study by Nwafor *et al*[11] 60.9% had adequate knowledge of preventive measures. In study by Yassa *et al*[12] 52% felt unsafe in pregnancy due to COVID-19 infection and 42% were worried about the health of their babies. This is in accordance with our study, 60.8% of our patients believed that the virus could affect their pregnancy while 21.7% were unsure.

Regarding attitude of doctor and treatment prescribed, the findings in our study were similar to those by Yassa *et al* where 92.4% pregnant women trusted the healthcare workers[12]. In the same study 87% showed willingness for compliance with the isolation rules and 74% for taking proper preventive measures which is in line with our study. About 85.2% had a good encounter with the doctors while 13% labelled their attitude as fair. Two hundred and twenty six patients (98.2%) approved of the personal protective equipment used by the health workers and 186 (80.8%) of our participants said that their protective gears did not give them any apprehension.

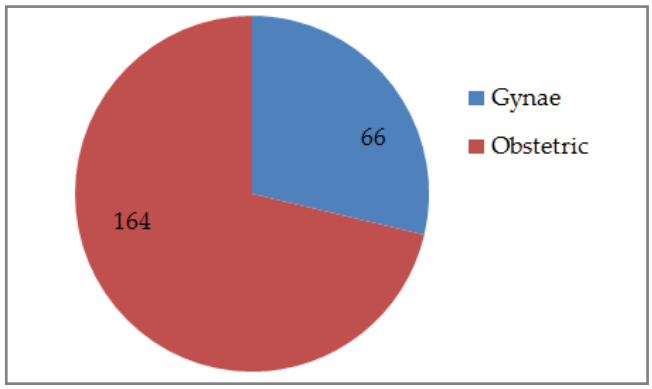

Figure: Frequency of Gynecological & Obstetric patients.

The WHO estimated an overall case fatality rate of 14-15%[13] and Bouaziz[14] study too suggest that COVID-19 may be associated with adverse pregnancy outcomes.

Yassa in his study reported preterm birth 10.47% due to coronavirus whereas Bouaziz[14] reported preterm delivery as the most frequently observed complication in 16.7% cases followed by fetal distress in 9.77%. Mascio *et al*[15] also quoted it as an adverse pregnancy outcome. Hence rightly whereas 93.9% patients were satisfied with their management, 60.8% were worried about the adverse outcome on their pregnancy

and 80.8% believed that the hospital environment is hazardous for their health.

Even though Majority of women in our study were not apprehensive about the personal protective equipment of health care professionals, most restrictions in the institutes during COVID-19 does have a psychological effect on women seeking medical advice[16]. Two hundred and twenty six (98.2%) participants agreed that doctors should be in protective gear and approved its use by the health workers. One hundred and eighty six of our participants said that their protective gears did not give them any apprehension.

Rasmussen[17] while mentioning principles for management of pregnant women with confirmed or suspected COVID-19 mentioned to implement CDC infection prevention and control procedures for health care providers including standard, contact, and airborne precautions. Eye protection and properly fitted N95 respirators should be used.

The public health measures implemented everywhere to reduce the spread of infections, such as social distancing, the use of masks and travel bans have a definite impact on our patients and their families. The consequences include a decrease in seeking health care advise, reduced antenatal visits, an increase in depression and other mental health issues[18]. One hundred and forty two (61.7%) of our participants however believed that our measures were exaggerated as compared to 33% who did not think it was so. This study of ours can bring an insight into what our patients are going through and their feelings and concerns about their babies and families just like the front-line health workers during the pandemic.

CONCLUSION

COVID-19 has resulted in a high level of anxiety in everyone whether it is a health worker or a patient seeking advice. Whereas there is a lot of focus on the frontline health worker, we must not forget the patient. During this crisis we must support our patients and provide them accurate and all relevant information. Patients perspective can provide insight into their anxieties and behaviors so that a better health strategy can be formulated.

CONFLICT OF INTEREST

This study has no conflict of interest to declare by any author.

REFERENCES

1. Shigemura J, Ursano RJ, Morganstein JS, Kurosawa M, Benedek DM. Public responses to the novel 2019 Coronavirus (2019-nCoV) in Japan: Mental health consequences and target population. Psychiatry Clin Neurosci 2020; 74(4): 281-82.
2. Huang C, Wang Y, Li X, Ren L, Zhao J, Hu Y, et al. Clinical features of patients infected with 2019 novel Coronavirus in Wuhan China. Lancet 2020; 395(10223): 497-506.
3. Hung LS. The SRAS epidemic in Hong Kong: What lessons have we learned? J R Soc Med 2003; 96(8): 374-78.
4. Zhong BL, Luo W, Li HM, Zhang QQ, Liu XG, Li WT, Li Y. Knowledge, attitudes, and practices towards COVID19 among Chinese residents during the rapid rise period of the COVID-19 outbreak: A quick online cross-sectional survey. Int J Biol Sci 2020; 16(10): 1745-52.
5. Shigemura J, Tanigawa T, Saito I, Nomura S. Psychological distress in workers at the fukushima nuclear power plants. J Am Med Assoc 2012; 308(7): 667-69.
6. Hasegawa A, Tanigawa K, Ohtsuru A, Yabe H, Maeda M, Shigemura J, et al. Health effects of radiation and other health problems in the aftermath of nuclear accidents with an emphasis on Fukushima. Lancet 2015; 386(9992): 479-88.
7. Rubin GJ, Wessely S. The Psychological effects of quarantining a city. Bio Med J 2020; 368: 313.
8. Fung IC, Tse Z, TH, Cheung C, Miu AS, Fu K. Ebola, and the social media. Lancet 2014; 384(9961): 2207-13.
9. Depoux A, Martin S, Karafillaks E, Preet R, Wilder-Smith A, Larson H. The Pandemic of social media panic travels faster than the COVID-19 outbreak. J Travel Med 2020; 27(3): taaa031.
10. Corbett GA, Milne SJ, Hehir MP, Lindow SW, O'connell MP. Health anxiety and behavioural changes of pregnant women during the COVID-19 pandemic. Eur J Obstet Gynecol Reprod Biol 2020; 249(1): 96-97.
11. Nwafor JI, Aniukwu JK, Anozie BO, Ikeotuonye AC, Okedo-Alex IN. Pregnant women's knowledge and practice of preventive measures against COVID-19 in a low-resource African setting. Int J Gynecol Obstet 2020; 150(1): 121-23.
12. Yassa M, Birol P, Yirmibes C, Usta C, Haydar A, Yassa A, et al. Near-term pregnant women's attitude toward, concern about and knowledge of the COVID-19 pandemic. J Matern-Fetal Neo M 2020; 1(1): 1-7.
13. World Health Organization, Department of Communicable Disease Surveillance and Response: Consensus Document on the Epidemiology of Severe Acute Respiratory Syndrome ((SARS 2003. Available at https://www.who.int/csr/sars/en/WHO consensus.pdf
14. Bouaziz J, Even M, Isnard-Bogillot F,Vesale E, Nikpayam M, Mihalache A , et al. COVID-19 in pregnancy: What do we really know? F1000 Research 2020; 9(1): 362.
15. Di Mascio D, Khalil A, Saccone G, Rizzo G, Buca D, Liberati M, et al. Outcome of Coronavirus Spectrum Infections (SARS, MERS, COVID 1 -19) During Pregnancy: A Systematic Review

and Meta-Analysis . Am J Obstet Gynecol MFM 2020; 2(2): 100107.
16. Buekens P, Alger J, Bréart G, Cafferata ML, Harville E, Tomasso G. A call for action for COVID-19 surveillance and research during pregnancy. Lancet Glob Health 2020; 8(7): e877-78.
17. Rasmussen SA, Smulian JC, Lednicky JA, WenTS, Jamieson DJ. Coronavirus Disease 2019 (COVID-19) and pregnancy: what obstetricians need to know. Am J Obstet Gynecol 2020; 222(5): 415-26.
18. Brooks SK, Webster RK, Smith LE, Woodland L, Wessely S, Greenberg N, et al. The Psychological impact of quarantine and how to reduce it: Rapid review of the evidence. Lancet 2020; 395(10227): 912-20.