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RESEARCH ARTICLE

ATTITUDE OF MEDICAL STUDENTS ABOUT THEIR ROLE IN THE COVID-19 PANDEMIC

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Abstract

Introduction: Pandemic leads to all sorts of psychological and financial problems. One substantial group significantly affected includes medical students. The need of the hour is to deliver safety and least exposure of students to the COVID 19 positive individuals.

Methods: A questionnaire was prepared in paper based form and distributed to hundred (100) students in the department of Anatomy Sheri kashmir Institute of Medical Sciences Bemina Srinagar.

Discussion: The questionnaire depicted the experience of medical students with tele-education, including questions related to ability to use electronic devices, nature and speed of internet employed, type of electronic devices the students own, experience of advanced technology in medical education.

Conclusion: The COVID-19 pandemic depicted negative psychological effects on medical students. In this study, we observed that most medical students had access to electronic devices and were able to use them.

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Introduction:-

Pandemic leads to all sorts of psychological and financial problems. One substantial group significantly affected includes medical students. The need of the hour is to deliver safety and least exposure of students to the COVID 19 positive individuals.¹The Coronavirus outbreak (officially known as Covid-19) which started in China has spread to 195 countries. The spread of virus was rapid, leading to a pandemic throughout the world. Eventually World Health Organization declared it as a worldwide pandemic on March 11, 2020². The most typical symptoms of the disease are fever, myalgia, fatigue, and dry cough.³ Other referred symptoms are chills, coryza, sore throat, nausea, vomiting, and diarrhea.³COVID-19 has led to disturbance in the education of medical students and to healthcare systems throughout the world.² The highly contagious nature of the virus has made it difficult to continue lectures as usual, thus influencing the medical education process which is based on lectures.² The COVID-19 pandemic puts people at risk of developing life-threatening conditions, presenting substantial challenges for medical education as instructors must deliver lectures safely whilst ensuring the continuity of the medical educational process.²One of the fear is that medical students may catch the virus during their course and may transport it to the other people.²Therefore students are advised to stay indoors and follow social distancing norms. The need of the hour is to develop a medical educational system that provides students with opportunities for continuous learning, while also avoiding delays due to the pandemic.²Some of the methods which were used include live online lectures and online recorded

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lectures.²This study is aimed to investigate the educational and psychological effects of the pandemic on the medical students of Sheri Kashmir Institute of Medical Sciences from the department of Anatomy Bemina.

Method:-

A questionnaire was prepared in paper based form and distributed to hundred(100) students in the department of Anatomy Sheri Kashmir Institute of Medical Sciences Bemina Srinagar. The questionnaire was reviewed and assessed by the involved faculty members. Participation was voluntary and complete anonymity was undertaken. Data was arranged using spreadsheets. Gaussian fit of data was evaluated using KolmogorovSmirnov test. Students were reminded to ensure the highest possible response rate. Participants were not aware of the aim of the study or results to lessen the risk of any bias. The questionnaire was self-administered without intervention by the authors or any specific person and it did not contain any identifying data of the participants to enable confidentiality. Questionnaires with incomplete information or missing data were excluded from the study.

Ethical Approval

The Ethical approval was obtained from the Head of the Department of Anatomy of Sheri Kashmir Institute of Medical Sciences Bemina Srinagar Kashmir. All participants provided written informed consent prior to participating in the study.

Discussion:-

Online mode of learning in medical education may be an alternative to conventional lectures to better the quality of education.⁴Absence of the lack of hands on training in the preclinical years may have significant consequences on the training of students which might result in difficulties in the upcoming clinical years. Preclinical medical students may undergo a lower impact on their education in comparison to those in clinical years because preclinical education is mainly lecture oriented. During the last year there have been drawbacks in the educational quality of the subject of Anatomy including cadveric education. Medical students are given limited free hand to deal with surgical instruments and therefore develop manual dexterity. They are having less opportunities to deal with the three dimensional anatomical structures.⁵The questionnaire (Table I) depicts the experience of medical students with nature and speed of internet employed, type of electronic devices the students own, experience of advanced technology in medical education. The survey collected information about status of students medical education during the pandemic such as types of educational activities performed, personal attitudes towards the pandemic and about their wellbeing. The survey included several questions related to online mode of educational teaching method that uses electronic devices. This teaching method has been significant during the pandemic leading to continuous medical education. The questionnaire was framed by interviewing medical students. The detailed responses are depicted in Table I. Majority of students (96%) had access to the internet. 73% of students had used their personal computer for educational requirements. 90% of students used internet facility to understand medical concepts. 53% of students had used online applications for acquiring medical education. 95% of medical students bought electronic device to attend online classes.⁶A study was conducted by Najibi S et al.¹⁰ According to this study tele education and tele medicine can be used to provide constant support and education to the medical students. This study is in accordance to our findings. 20% students used online internet services to study with their class mates. 79% of students acknowledged that they downloaded content for acquiring medical education. 86% of students felt that online education can not be possible alternative to standard mode of medical education. 58% of students revealed that downloaded medical content is not better and sufficient than online lectures. A study was conducted by Aghakhani K and Shalbafan⁷. They found that students faced unique challenges such as limited availability of online teaching resources for medical education. This study is in accordance to the findings of our study. 83% of students realized that online education can not be delivered easily in Kashmir. 64% students answered that medical online education timings should not be similar to offline learning classes. 94% students answered that online education cannot fulfill medical educational requirements. 87% students answered that online education facility is not student friendly. 82% of students felt that speed and quality of internet was not of optimum level. A study was conducted by Abasi S et al⁸ in which they reported poor internet access causing an unwillingness on students part to switch over to online teaching modalities. This study is in accordance to the findings of our study. 86% Of participants answered that it is not possible to cultivate a positive relationship between a student and faculty via E- learning. 94% of students think practicals can not be taught to medical students via online mode of education. 70% of students think it is better to serve in hospital rather than to acquire medical education through online mode. 75% of students thought that they are feeling depressed during COVID 19 times. A study was conducted by Liu J et al⁹ and Meo SA¹⁰. They found that pandemic has caused increased stress with social isolation resulting in increased depression, anxiety and suicidal

tendency as well as poor health in medical students during COVID -19. This study is in accordance to our findings. 78% of participants thought COVID 19 has affected their health⁹. 89% of students thought that COVID 19 affected their intellect and peace of mind. 94% of students thought that COVID 19 destroyed conducive environment for the purpose of learning. 53% of students felt that they were scared of getting infected with COVID 19 during offline educational mode. 5% of students confirmed via questionnaire that they had to face financial constraints to buy electronic devices for online educational purpose.

Table 1:- Response Of Medical Students Towards The Covid-19 Pandemic.

| FEED BACK VARIABLE | YES % | NO% |
|---|--------------|------------|
| 1. Do you have access to the internet ? | 96 | 4 |
| 2. Do you use your personal computer in online studying? | 27 | 73 |
| 3. Did you use online applications for acquiring medical education? | 47 | 53 |
| 4. Did you use the internet to understand medical concepts? | 90 | 10 |
| 5. Did you buy an electronic device in order to attend online classes? | 95 | 5 |
| 6. Did you attend online classes during lockdown? | 96 | 4 |
| 7. Did you use the internet to study with your Class mates through online meetings? | 20 | 80 |
| 8. Do you download content related to your medical education? | 79 | 21 |
| 9. Do you think online education is a possible alternative for standard medical education? | 14 | 86 |
| 10. Do you think Downloaded medical content is better than online lecture? | 42 | 58 |
| 11. Do you think online education can be easily delivered in Kashmir? | 17 | 83 |
| 12. Do you think online medical education timings should be similar to off line learning? | 36 | 64 |
| 13. Do you think online education can fulfill medical educational requirements? | 6 | 94 |
| 14. Do you think online education is more student friendly? | 13 | 87 |
| 15. Do you think the speed and quality of internet in Kashmir is of optimum level? | 18 | 82 |
| 16. Do you think it is possible to cultivate a positive relationship between a student and faculty via E- learning | 14 | 86 |
| 17. Do you think practicals can be taught to medical students via online mode of education? | 6 | 94 |
| 18. Do you think you are feeling depressed during COVID 19 times? | 75 | 25 |
| 19. Do you think COVID 19 has affected your health? | 78 | 22 |
| 20. Do you think COVID 19 affected your intellect and peace of mind? | 89 | 11 |
| 21. Do you think COVID 19 destroyed conducive environment for the purpose of learning? | 94 | 6 |
| 22. Are you scared of getting infected with COVID 19 during offline educational mode? | 53 | 47 |
| 23. Do you have financial constraints to buy electronic gadgets? | 5 | 95 |

Conclusion:-

The COVID-19 pandemic revealed negative psychological effects on medical students. In this study, we observed that most medical students had access to electronic devices and were able to use them. We also realised that medical students showed variable levels of knowledge, attitudes, and perceptions regarding online education. However, our study had undergone in a department of Anatomy Sheri Kashmir Institute of Medical Sciences with confined and limited settings. Hence the results can not be generalized and they must be re evaluated by future studies to achieve an understanding of the usefulness of the online learning mode of teaching. Studies of this nature could help in determining whether e-learning can replace conventional medical lectures and provide alternatives to the disruption of clinical course. We advocate interactive online learning lectures by using state of the art technological equipment. Such measures would help students to get accustomed to this method of medical education. The circumstances should be evaluated to check whether online examinations can help avoid postponement of medical examinations. Our results could be used in future studies to examine medical students point of view and the feasibility of electronic

education as an alternative to the conventional medical education procedure to facilitate the future education of medical students.

References:-

1. Matthew H.E.M Browning et al. Psychological impacts from COVID-19 among university students: Risk factors across seven states in the United States.PLoS ONE 16(1): e0245327.
2. Ahmed Alsoufi et al. Impact of the COVID-19 pandemic on medical education: Medical students' knowledge, attitudes, and practices regarding electronic learning.PLoS ONE 15(11): e0242905.
3. Rodríguez-Rey et al. Psychological Impact and Associated Factors During the Initial Stage of the Coronavirus (COVID-19) Pandemic Among the General Population in Spain.Frontiers in Psychology .2020; 11:1540.
4. Mahmoud Al-Balas et al.Distance learning in clinical medical education amid COVID 19 pandemic in Jordan: current situation, challenges and perspectives.BMC Medical Education;2020:20:341.
5. Papapanou M et al.Medical education challenges and innovations during covid 19 pandemic.Postgrad Med J;2021:1-7
6. Najibi S et al.Differences in coaching needs among under represented minority medical students.Fam Med.2019;51:516-22.
7. Aghakhani K, Shalbafan M. What COVID-19 outbreak in Iran teaches us about virtual medical education.Med Educ Online.2020;25:1770567.
8. Abbasi S, Ayoob T, Malik A, Memon SI.Perceptions of students regarding E-learning during Covid -19 at a private medical college.Pak J Med Sci.2020;36:57-61.
9. Liu J et al.Online mental health survey in a medicalcollege in china during the COVID-19 OUTBREAK.Front Psychiatry.2020;11:459.
10. Meo SA et al. Pandemic:Impact of quarantine on medical students mental wellbeing and learning behaviours.Pak J Med Sci.2020;36:43-8.