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## Adapting Online Teaching Methodology in Healthcare Education -Scope and Limitations

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**KEYWORDS:** Online teaching methodology, healthcare education, COVID.

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### **ABSTRACT:**

#### **INTRODUCTION:**

The COVID-19 pandemic spread across the globe from December 2019 in a very short period of time and strict protocols and guidelines were to be followed universally in order to restrain the pandemic situation. Following the government guidelines, all the private and government organisations including educational institutes were shut down due to the transport and social distancing measures.

Medical education system around the globe has been rapidly evolving since last few years. Hybrid mode of teaching with both physical and online components are being increasingly adopted by medical institutes. It is hence essential to dig into the instructor perspective on adaption of online teaching mode in healthcare education.

#### **OBJECTIVES:**

To understand the challenges faced by instructors in online mode of teaching and the opportunities and limitations in the long term integration of this mode into the medical education andragogy.

#### **METHODOLOGY:**

The study was undertaken with a qualitative approach in the form of interview of 50 full time instructors in medical institutes who taught with the online teaching mode for the past 2 years. The collected data was coded and key themes were generated based on the responses provided.

#### **CONCLUSION:**

The study attempts to highlight the issues faced by instructors in the online teaching mode which was a compulsion during the early phases of the COVID pandemic but has now transformed into a conscious choice. Yet, if harnessed well it can offer exciting opportunities to break geographical barriers in providing excellence in education.

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## 1. INTRODUCTION:

The COVID-19 pandemic spread across the globe from December 2019 in a very short period of time and strict protocols and guidelines were to be followed universally in order to restrain the pandemic situation. All nations suffered a great loss economically, socially and intellectually<sup>1</sup>. Based on the World Health Organization and Ministry of Health guidelines, restrictions were placed on the movement of the people in all walk of life. Like all other sectors, even education suffered heavily within this period. Following the government guidelines, all the private and government organisations including educational institutes were shut down due to the transport and social distancing measures<sup>2</sup>.

Medical education system around the globe has been rapidly evolving since last few years. Many new ideas and modes of teaching focusing on experiential learning have been introduced and implemented effectively. The traditional classroom teaching method continues to be the most preferred one in medical education<sup>3</sup>.

To maintain continuity of education, institutes had to resort to online mode of teaching and training. This was a sudden change from the traditional classroom teaching method which had remained the preferred mode of teaching in healthcare education for the past many decades<sup>4</sup>.

The COVID-19 pandemic situation has persuaded to seek for various other alternative modes of teaching to overcome the challenge of lockdown and continue with education. The National Medical Commission (NMC), the regulatory body of medical education in India, had

emphasized on adoption of contemporary education technologies such as e-learning, literature search through electronic means, skills laboratory, and simulation in the past few years yet, the actual adoption in institutes was terribly low<sup>5</sup>. The pandemic forced institutes and instructors to quickly adapt completely to the online mode resulting in a number of challenges. Use of technology and monitoring the standard of delivering quality education has been a difficult task as many faculties had very low technical knowledge and awareness regarding the various tools used for online education<sup>6</sup>.

The institute in this process was mainly responsible for providing the appropriate technology to facilitate online training sessions. The large share of burden of executing these online training sessions was thrust on the shoulders of untrained instructors. With the pandemic now, affecting the population, in waves and troughs online teaching has been an alternative reality. Hybrid mode of teaching with both physical and online components are being increasingly adopted by medical institutes. The learner – instructor dynamic has permanently changed. It is hence essential to dig into the instructor perspective on adaptation of online teaching mode in healthcare education<sup>7</sup>.

## 2. OBJECTIVES:

To understand the challenges faced by instructors in online mode of teaching and the opportunities and limitations in the long term integration of this mode into the medical education andragogy.

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### 3. METHODOLOGY:

The study was undertaken with a qualitative approach in the form of interview of 50 full time instructors in medical institutes who taught with the online teaching mode for the past 2 years. The participants were provided with a 20-item open ended questionnaire to identify their perception, experience and honest opinion on the utility of online teaching mode in healthcare education<sup>8</sup>. The questionnaire was sent to the participants via Google form and were given five days to respond to the questionnaire.

Participation in the survey was voluntary and responding to the questionnaire was considered as implied consent. To elicit frank opinion, assurance was provided to the participants regarding data confidentiality.

41 participants submitted the completed questionnaire and were included in the study.

The collected data was coded and key themes were generated based on the responses provided.

### 4. RESULT:

The responses provided by the instructors helped generate valuable insights into the practical challenges and opportunities concerning Online Teaching Methodology. The following perspectives can help formulate policy of integrating online teaching mode into medical education and addressing the concerns of the instructors.

### 5. DISCUSSION:

The key themes arising out of the data have been summarized below.

#### **Reach -**

Most of the participants highlighted the unique advantage of online teaching methodology, that it could reach a large number of learners at the same time. Unlike classroom teaching which possessed limitations in its capacity, an online teaching session could be conducted for multiple batches of students at the same time<sup>9</sup>. The respondents found this to be time saving and allowed flexibility of involving instructors from different geographical locations to teach students<sup>10</sup>. This provided the learners the opportunity to get coached by experts who in the normal course would not have travelled in the geographical location of the institute for classroom teaching.

#### **Interaction-**

In terms of instructor-learner interaction dichotomous views were shared by the participants. A section of the participants, felt that the level and quality of interaction was better in online mode<sup>11</sup>. They attributed this, to the frankness shown by learners in raising queries and clarifying doubts during online sessions as they were not required to be face-to-face with the instructor. Introvert students also participated via the texting option available in online teaching applications<sup>12</sup>. In the normal course of classroom teaching these students would generally remain quiet due to their introvert nature.

On the other hand, some participants felt that online teaching lacked connect and the instructors were unsure of the level of understanding of the learners. In absence of eye-to-eye contact some instructors found it difficult to gauge the response of the learners<sup>13</sup>.

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## **Concentration-**

Majority participants felt that a lot of learners were simply passive during the sessions as they were not required to keep their video setting switched on. Hence, the instructors found it difficult to gauge the interest level and concentration of the learners during the session<sup>14</sup>. The sessions were also disturbed due to background noise created by the unmuting of the learners. Overall the instructors found the online mode to be unpredictable in terms of actual learner engagement. This uncertainty over a continued period of time leads to loss of interest on the part of the instructor as well as the learner. The respondents shared the feedback given by the learners that many a times online teaching can be monotonous and difficult due to lack of non-verbal communication. This concern raised by the instructors is serious and can affect the overall quality of teaching and impact the learning outcomes.

## **Technical issues -**

As the online teaching tools were in their nascent stages during the COVID pandemic, multiple technical issues were faced while conducting the online sessions. This included issues pertaining to network connectivity, audio/ video disturbances, and application crash. This resulted in delay and difficulty in completion of the syllabus in the requisite time period<sup>15</sup>.

## **6. CONCLUSION:**

The study attempts to provide a broad perspective on the issues faced by instructors in the online teaching mode. Online teaching was a compulsion during the early phases of the COVID pandemic

but has now transformed into a conscious choice. Just like other modes of teaching, online mode has its limitations. Yet, if harnessed well it can offer exciting opportunities to break geographical barriers in providing excellence in education. Learners can access sessions occurring around the globe from their home. Better planning to ensure that the sessions are more interactive can further enhance the utility of the online teaching mode. Bed side and face to face learning are integral to medical education, yet online teaching can act as a valuable adjuvant in the learning process.

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**Ethical Clearance:** Obtained from Independent Ethics Committee (IEC), SIU

## **8. SUMMARY:**

This research paper highlights the evolution of teaching methodology in healthcare due to the COVID pandemic. Further it explains how the faculty and the students are affected by the new online teaching methodology.

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