

Adopting Virtual Role Play in Family Medicine Training During COVID-19 Pandemic

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Abstract

As online learning escalates during the COVID-19 pandemic, it is important for educators to explore teaching techniques that engaged students and enhanced learning at a profound level. Role-play is a widely used educational method for learning about communication in medical education and online role-playing permits successful and highly enjoyable learning experiences for medical students.

Role-play is used as simulation training to acquire knowledge, attitudes, and skills in communication in a range of disciplines. The online role-play session has been adopted in family medicine communication skill training of year 4 medical students during the COVID-19 pandemic. The online role-playing process involves three steps: preparation, role-playing, and analysis. Preparation is a crucial step and analysis with reflection and feedback is the most beneficial for students.

Through online role-play sessions, students acquired knowledge and attitude, by observing, understanding, assimilating information, and experiencing emotions, and obtained skills via performing and reflecting, and getting feedback. The educational theories such as Kolb experiential learning, adult learning theory, reflective practice, and feedback are relevant in role-play. Role-playing involves high-level Bloom Taxonomy, which requires students to analyse, synthesize, and reflect on the significant facts in the case.

Online role-playing provides the students to acquire knowledge, attitude, and skills in communication as well as engages students intimately in the learning process. The students have found online role-playing not only educational but also enjoyable.

Keywords: Virtual Role Play; Online; Family Medicine; Medical Students

Introduction

During COVID-19 pandemic, online education escalates, and it is important for the educators to explore online teaching techniques that engage students and enhance learning at a profound level. Role-play is widely used simulation training for learning communication skill in medical education [1]. It is also a training method to acquire competency in knowledge, attitudes, and skills in communication a range of disciplines and one of the

online learning activities that can contribute to a successful and highly enjoyable learning experience [1].

Role play session in family medicine training

Physical role play sessions were used to conduct in Year 4 MBBS Family Medicine teaching and when all the teaching sessions need to convert online teaching during COVID-19 pandemic time, the online role play session has been adopted as in needs. According

to the literature, role playing can be incorporated in any form of learning situations. In medical education, role playing used to conduct with case scenarios to learn more intimately about patient's condition as well as attending doctor, for example, teaching "breaking bad news". By directly immersing in a situation of consultation, the role players appreciate the experiences of the characters they are portraying. Role playing works well in the traditional classrooms of higher education, and it seems well suited to an online learning environment as well. Not only in physical setting but in a virtual setting, role playing provides students with opportunities to creatively interact with their peers and shared purpose in the learning process [2,3].

Educational theories

Role-play as an educational method draws on a range of theories. Kolb Experiential learning is especially important in the acquisition of skills [4]. Learner experiences 4 stages:

- Concrete Experience (Experiencing)
- Reflective observation (Reflecting)
- Abstract conceptualization (Thinking)
- Active experimentation (Doing).

Learning is enhanced when learners are encouraged to use all four areas. Structured role-play with feedback enables learners to complete the tasks in each of the four areas [4].

Adult learning theory by Malcom Knowles (2005) and Schon's (1983) work on reflective practice is also relevant in role-play. Reflecting-on-action has relevance for feedback and can help the student to know their strengths and weaknesses in role play session. Structured role-play enables learners to reflect both "in" and "on" action [5,6].

Steps in virtual role play

The three-step process of online role-playing: preparation, role-playing, and analysis, with emphasis on the crucial role of preparation and the benefits of analysis with reflection and feedback [2].

Preparation

Preparation is crucial step in role playing. Lecturers prepared the case scenarios aligned with the learning objectives. The cases

are uploaded online where the students can access before the role play discussion session. Briefing has been conducted to explain the flow of role play and the scope of the topic to discuss. The students are randomly assigned in pairs; perform as patient and the other as attending doctor/medical interviewer in the setting of family medicine outpatient clinic. The students are encouraged to rehearse their roles and the cases before the actual session to make sure better understanding the role and topic [2,7,8].

Presentation or Role-playing

Online role play sessions were conducted via Microsoft Team. The role players switched on the video camera while the rest of the students remain muted and switched off the video camera. The timer has been set to make sure the student's role play performance is within the scope and serve as a practice for clinical exam. All the students have been notified to be attentive as they must give feedback on their fellow's role play performances after each session [2,7,8].

Analysis or reflective feedback

After each role play session, all the participants analyse the session together. Firstly, the feedback from role players has been explored by asking; "what did you do well or what you could do better". Then feedback from the observers has been explored. Then the lecturer gives constructive feedback to the role players regarding consultation skill and communication skill, then the discussion about case has been conducted [2,7,8].

Educational values of role play as a simulation training

By performing in roleplaying session, the students have been challenged to think and reflect about the significant facts in the case. According to the cognitive domain of Bloom Taxonomy, role playing involves high level Bloom, which requires students to analyse and synthesize the case leads to better understanding of the case. The analysis step allows students to assess each other's work and able to reflect for the improvement. It helps in developing a better understanding of the role, understanding how to handle a particular situation, understanding of the issue and better decision making, developing communication, management development and leadership quality, improvement of interpersonal relationship and providing an insight to understanding behavioural patterns of others [10-13].

Educational value of role play

The acquisition of knowledge, attitudes, and skills through online role-play sessions, involving observing, understanding, assimilating information, experiencing emotions, performing, reflecting, and receiving feedback. And skill via performing, reflecting, and getting feedback. Reflection-in-action by actively prompting students to analyze what they have done in their role-play and how this experience relates to their own and others' experiences. High-level Bloom Taxonomy, which requires students to analyse, synthesize, and reflect on the significant facts in the case [14-16].

Students' Reactions to Role Playing, feedback from students

The students have indicated that to complete a role-playing, they must incorporate all what they have learned in class, while also bringing in personal experiences which made the session more effective. Many have found role playing not only educational but also enjoyable. The following were some of the feedbacks from the students.

- Enjoy the role play session
- Learnt communication skills
- Reflections and feedback are very useful
- Looks easy but it required practice
- Nervous because we are being observed
- Can see things from a patient's perspective
- Shy, embarrass, excited, anxiety
- Hands on experience and hard to get without doing it
- Prefer to observe
- Like real-life situation and learnt the mistakes
- Need basic knowledge and experience to keep interview flow well
- Enabled us to understand the patient's point of view.

Conclusion

Role-play is widely used simulation training in communication and interpersonal skills training. Online role playing engages students intimately and creatively in the learning process. Online role playing encourages students to identify their strength and weakness in communication skill. Online role-playing engages

students intimately in the learning process and found online role-playing not only educational but also enjoyable.

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Conflict of Interest

No known conflict of interest exists among authors.

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