



The student perception of clinical simulation: an overview of its importance in the undergraduate

La percepción estudiantil de la simulación clínica: una visión general de su importancia en el pregrado.

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Mr. Editor:

The manuscript by Ramos and Botero, entitled: "Perception of clinical simulation as didactics in the teaching of postpartum hemorrhage in the Degree in Medicine", in which the authors set out to determine the way in which the undergraduate medical students can receive training based on high-fidelity clinical simulation, designed to strengthen skills in the area of gynecology and obstetrics, taking into account the great impact of emotions on learning. In accordance with this, it is of great interest to highlight the student perception after the execution of educational activities based on simulation as one of the most recommended student preparation and training tools today.

Clinical simulation consists of carrying out fictitious scenarios, based on real practice, which aim to simulate a problem that the student must solve in order to be evaluated and to obtain criticism about their actions in the face of said problem situation. Simulation-based medical education is a novel initiative that has shown excellent results in terms of satisfaction and clinical and practical development of students. In order to take advantage of these strategies, educational centers and departments should train their teachers in the area and equip teaching spaces with the most appropriate instruments; These are important conditions to carry out a good teaching process in technical, communication and clinical analysis skills. As in any other context, there is a probability of unforeseen errors occurring, this must be taken with great care by those in charge of the activity, since it could seriously compromise the experience of the students and the expected results (1).

Andrews and Barta (2) in their study intended to describe simulation as an effective tool to face current educational challenges and point out that simulation-based education is a strategy that has become the international gold standard in student training. and professionals. Being able to also show that in the last decade, it has gained space in the training curricula of educational institutions and different organizations that govern the standards of education in various areas of health and emphasize its importance as a didactic strategy for basic training in medicine. It has been shown that the use of simulation is effective in improving knowledge and creating a context that can interrelate basic sciences with clinical practice, which can be reflected when caring for a patient.

Villegas et al(3), in their study, which had a sample of 300 participants and aimed to assess the perception that students have of the simulation-based education model with respect to their ability to face real clinical scenarios, showed that 65.3% described the experience as satisfactory and 9.7% as very satisfactory, being able to conclude that it is a strategy that allows feedback to the program in terms of curricular innovation and they identify that the lack of previous similar studies in the institution makes it impossible to make comparisons that result in strategies for resolving shortcomings.

Moreno and Gutiérrez (4), intended to expose the main challenges and difficulties of higher education in Colombia and highlight that within the range of difficulties present in the country, they prioritize inequality in the acquisition of knowledge, lack of competence and applicability in knowledge of Information and Communication Technologies in learning spaces.

This learning method has been widely used in technical fields of medicine, such as anesthesiology, obstetrics and surgical areas, and this may distance educators from other clinical areas from this pedagogical strategy. However, simulation-based education also allows the development of other multidimensional facets in the student, such as teamwork and doctor-patient communication. In conclusion, this initiative can also be used during undergraduate studies and its implementation through innovative strategies and the objective evaluation of the skills acquired will contribute to the understanding of the need to migrate medical education towards this type of teaching model.

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References

- Schuelter PI, Tourinho FSV, Radünz V, Santos VEP, Fermo VC, Barbosa SS. Management in clinical simulation: a proposal for best practices and process optimization. Rev Bras Enferm. 2021; 74 (Suppl 6): e20200515. <u>https://doi.org/10.1590/0034-7167-2020-0515</u>
- 2. Andrews LB, Barta L. Simulation as a Tool to Illustrate Clinical Pharmacology Concepts to Healthcare Program Learners. Curr Pharmacol Rep. 2020; 6(4):182-191. <u>https://doi.org/10.1007/s40495-020-00221-w</u>
- Villegas Stellyes CE, Martínez Sánchez LM, Jaramillo Jaramillo LI, Restrepo Restrepo NA, Serna Corredor DS. Student perception of the educational model based on simulation. Arch Med (Manizales). 2021;21(2). Available at: <u>http://dx.doi.org/10.30554/archmed.21.2.3971.2021</u>
- Moreno Cely GA, Gutiérrez Rodríguez RE. Prospective Study of Technology in Higher Education in Colombia to 2050. Univ Empresa 2020; 22(38):160. Available at: <u>http://dx.doi.org/10.12804/revistas.urosario.edu.co/empresa/a.7583</u>



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