Ensuring more opportunity for robotics

John F. Lazar¹

Received: 5 September 2017 / Accepted: 19 November 2017 / Published online: 25 November 2017
© Springer-Verlag London Ltd., part of Springer Nature 2017

I am writing in response to Hall et al.'s brief communication titled "Should every medical student receive exposure to robotic surgery?" [1]. The authors are strong proponents of medical student exposure to robotics believing that "integrating (robotic) education at a student level is the perfect opportunity to enlighten the next generation of clinicians and surgeons" [1]. I think this idea should be taken a step further: robotics should be an essential part of their overall medical education, not just their surgical education as we do not know which student's experience with robotics may be the launching pad for virtuosity either in robotics and/or medicine as a result.

What the article did not discuss is the limitations currently preventing our students from robotic exposure: a structured robotic experience designed for the rotating medical student. This is probably not an issue for senior author Dr. Reddy, who is well known in the thoracic surgery community as an early adopter of integrating robotic education for residents. In my operating room, all medical students and general surgery residents can *observe* my robotic cases. The residents, after appropriate training can *operate* on the dual console with me usually starting in their third year.

Unfortunately, having the medical students use the robot the same way we let them operate open or laparoscopically

has proven more challenging. For example, I was taken aside by the former robotic medical director for letting my medical student merely transfer a gauze between robotic instruments during a case while sitting at the dual console. He and the nursing supervisor were upset he did not have "appropriate" training even though he was safely and completely supervised by me.

The robot, regardless of platform or specialty, is here to stay, though it will undoubtedly have numerous iterations. Therefore, we as educators must ensure that all students have the opportunity to explore this evolving technology by actively carving out a place for medical students in our teaching labs and operating rooms. By ensuring their future through robotics we simultaneously ensure our own.

Compliance with ethical standards

Conflict of interest John F. Lazar declares that he has no conflict of interest.

Reference

1. Hall ME, Reddy RM (2016) Should every medical student receive exposure to robotic surgery? J Robot Surg (**Epub ahead of print**)

✉ John F. Lazar
jflazar@me.com

¹ Division of Thoracic Surgery, PinnacleHealth CardioVascular Institute, Harrisburg, PA, USA