

Perception of Students towards Newer Teaching Methods in Medical Education

MOTILAL CHANDU TAYADE


Keywords: Crossword puzzle, Effective teaching, E-learning, Mind mapping

Dear Editor

While I came across a published research article by Ramya C et al., on the perception of students towards newer teaching methods in medical education in your esteemed journal, it found relevant and fruitful message contained in the article [1]. I thank the authors and editors of JCDDR for covering such a wonderful topic.

Authors concluded that medical educators need to constantly change their teaching methodologies in order to effectively hold the attention of students [1]. Different learning environments and methodologies can surely help in better retention rather than traditional teaching patterns.

When molecular changes occur at neuronal levels due to learning stimulations, these various sites get amplified, processed and transformed. The human brain processes information in complex networks of nerve cells [2]. The cells communicate and excite one another through special connections, called synapses. There are a number of learning styles like visual, aural, verbal, physical, logical, social and solitary etc. Kolb stated that "Learning is the process whereby knowledge is created through the transformation of experience" [3].

New brain cell connections formed by learning process, represent and store new knowledge or information. Growth factors, specialised neurotransmitters are responsible for formation as well as strength of these connections. These growth factors can be enhanced by regular specialised training of the brain. Only active learning process can be responsible for changes in our neural connections [2].

Now-a-days, medical students face increasing pressure due to huge competition and changing expectations from community. This

may be due to wide exposure towards technology and information flood. Ramya C et al., introduced the effectiveness of three different tools viz., Crossword puzzle, Mind maps and E-learning [1].

Specialised graphical forms are used to record ideas as well as information in mind mapping techniques. These are used very effectively to understand and grasp complicated topics. The visually encoded information is more easily retained than auditory encoded information. In mind mapping, visually encoded information is linked with a topic on which students can focus easily. It is also observed that students can learn better with project-based learning than traditional classroom learning.

The use of a crossword puzzle in regular learning makes the environment relaxing and friendly facilitating active learning. This direct involvement in learning is responsible for a positive outcome [4]. The objective behind writing the letter was to highlight the basic neurophysiological scientific aspects associated with the results of Ramya C et al., [1].

REFERENCES

- [1] Ramya C, Sandhya VK, Ramya P, Renuka IV, Atchayuta M, Anusha M, et al. A study on perception of students regarding newer teaching methods in medical education. *Journal of Clinical and Diagnostic Research*. 2020;14(8):JC01-JC04.
- [2] Dam N. Inside the learning brain, TD Magazine, USA, April 2013, Download link: <https://www.td.org/magazines/td-magazine/inside-the-learning-brain> [accessed on 12th August 2020].
- [3] Kolb DA. Learning styles and disciplinary differences, in: A.W. Chickering (Ed.) *The Modern American College* (pp. 232-255). San Francisco, LA: Jossey-Bass. Semantic Scholar, 2015;1(2):88-93.
- [4] Bambaeroo F, Shokrpour N. The impact of the teachers' non-verbal communication on success in teaching. *J Adv Med Educ Prof*. 2017;5(2):51-59.

PARTICULARS OF CONTRIBUTORS:

1. Associate Professor, Department of Physiology, Pravara Institute of Medical Sciences, Loni, Maharashtra, India.

NAME, ADDRESS, E-MAIL ID OF THE CORRESPONDING AUTHOR:

Motilal Chandu Tayade,
Loni, Maharashtra, India.
E-mail: drmc Tayade@gmail.com

AUTHOR DECLARATION:

- Financial or Other Competing Interests: None
- Was informed consent obtained from the subjects involved in the study? NA
- For any images presented appropriate consent has been obtained from the subjects. NA

PLAGIARISM CHECKING METHODS: [Jan H et al.]

- Plagiarism X-checker: Sep 07, 2020
- Manual Googling: Sep 15, 2020
- iThenticate Software: Oct 26, 2020 (6%)

ETYMOLOGY: Author Origin

Date of Submission: **Aug 29, 2020**
Date of Peer Review: **Sep 09, 2020**
Date of Acceptance: **Sep 29, 2020**
Date of Publishing: **Nov 01, 2020**