TEACHING LEARNERS TO DO ASSESSMENT

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ABSTRACT

Background: It is a common occurrence that, many Assessors are being accused of being unfair to the students. Most often this is the perception of the students, which will continue until he or she becomes an Assessor. The best method to create awareness about the hardships of evaluation is to teach the students, how to do the assessment. Having this in mind, we started this community based project, where we trained the students to assess each other, using the simple lesson plan. *Materials and methods***:** In this quantitative study 60 first year medical students of a Rural Medical School were selected at random, after obtaining their written informed consent. After taking students' opinion about routine assessments, on a five point Likert scale as pre test, the students were trained on performing assessment using a checklist. The students carried out reciprocal peer assessment using a simple lesson plan and upon completion, they sat together and evaluated the process. Post test done using the same five-point scale and Paired Sample T Test was run on the results. *Result:* Results showed a mean $\pm$ SD of (17.30$\pm$ 2.20) before and (31.9 $\pm$ 3.94) after the training. The *p* value was 0.000, proving that the effectiveness of the training was statistically significant. *Conclusion:* By teaching the students how to conduct an assessment, we can help alleviate the age-old affectations of students, that the assessors are being unfair to them, so that they can learn confidently and more focused.

KEYWORDS: Assessor, OSCE, Medical Education, Nuances, Perception, Unfair.

INTRODUCTION:

Assessment is a vital and integral element of any kind of learning, especially the Medical Education **(1).** It is a common belief that, assessment means a test but it is much more a broader concept than that. Cambridge Advanced Learner's Dictionary defines assessment as, "The act of judging or deciding the value, quality or the amount of something, or the judgment or decision that is made". It is well agreed that assessment is a driving force and has a positive steering effect on learning **(2,3,4)**. As everyone expects, assessment needs to be a fair one, not only conceptually but also, as per the rights of the assessees. Assessment has always been an area of discontent among students **(5,6)**. Many Assessors are being accused of being unfair to them. This is quite often the perception of the students which will continue until he becomes an Assessor himself. Hence it will be worthwhile for the students to understand the subtle nuances

of the process of assessment. The best method to create awareness about the hardships of evaluation is to teach the students, how to do an assessment. As a part of this, we trained the students how to assess each other in a community based program.

The study is new of its kind as by far no such research has been done in which the students themselves have been given an opportunity of working as assessors. The study aims at teaching the learners to do the assessment. This study will be of great benefit to the medical fraternity as a whole as it might change the mindset of the students for their evaluators and might also help them prepare better for their exams.

MATERIALS AND METHODS

In this descriptive study, 60 first year medical students of a Rural Medical School were selected by random recruitment, after obtaining written informed consent from each of them. The institutional ethical committee clearance was obtained. There were no conflicts of interest. Students' opinion about routine assessment system was taken on a five points Likert scale as pre test. Subsequently by using a simple lesson plan, the students were empowered to teach the community on a one to one basis. They were also trained to carry out an assessment of the teaching using Pre-validated check lists. The principles of Objective Structured Clinical Examination [OSCE] were followed so as to avoid subjective bias. In each team of two students, while the trainer student taught the household, the observer student silently assessed him, using the checklist. In the next house their roles were reversed, making it reciprocal. After completing this reciprocal peer assessment, all the teams sat together and discussed how he/she managed to carry out the assessment in the prescribed

manner and the difficulties they came across. Then the individual feedback of the students about assessment was taken as post test, again in the same five-point Likert Scale. The results tabulated in excel and analyzed using Paired Sample T Test.

RESULT:

The Mean ±SD of the score was (17.30 ± 2.20) before training, as opposed to (31.93 ± 3.94) after the training. After applying a Paired Sample T Test on the scores, a statistically significant increase in the mean score of 14.63 ± 1.92 [95% Confidence Intervals between 14.137 and 15.130] was obtained for the post test. The standard error of the mean was 0.248 with a degree of freedom (df) of 59. With a **t**-value of 58.98, we obtained a **p** value 0.000. This indicates that there is a statistically significant increase in the mean scores, substantiating the positive effect of training.

*Table 1: Mean scores of Pre and Post test scores of sixty students*

Total Score [N=60]	Mean ± SD	Std. Error
Pre Test	17.30± 2.20	0.285
Post Test	31.93± 3.94	0.509

Table 2: Paired Sample T Test showing the statistical significance

Post test - pre test Mean score	Std. Deviation	95% CI of the difference		p value
		upper	lower	Sig. (2-tailed)

14.633	1.92	15.130	14.137	**0.000**

Bar Diagram showing the mean score with Std. error of the mean
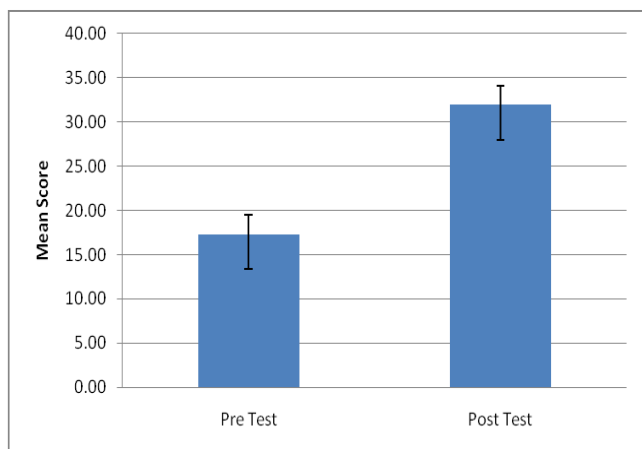
DISCUSSION

An ideal assessment method should satisfy certain criteria like validity, reliability, uniformity, reproducibility, feasibility, acceptability by the students as well as the faculty and cost effectiveness **(4)**. The various assessment methods routinely employed in Medical Education, has its own merits and flaws **(1,2)**. Though there are chances for inter assessor subjective bias, all efforts are made to make the present assessment system infallible. A lot of worldwide research is going in this area recently, possibly started after publication of the review article 'Inside the Black Box', based on the research by Black and Dylan William, at Kings College, London **(3)**. In our study, the students' opinion about the present assessment system listed in a five point Likert scale was taken as the pre test, following which the students were trained on the process of reciprocal peer assessment. The credibility of an assessment method can be improved by increasing the specificity as well as acceptability by the faculty and students **(6,7).** Having this in mind, the different domains of teaching skills were incorporated in our pre validated checklist for the assessment **(8).** The use of checklists and the reciprocal assessment minimized subjective bias **(10,11)** apart from making it cost effective **(7)**. By sitting together and discussing about the hardships they came across while conducting the peer assessment **(9, 10)** and how they could overcome those, this project could create an awareness among the students about the subtle nuances of assessment **(7)**. The students' feedback was taken in the five-point Likert scale after finishing the post assessment discussions. The Pre and Post test scores were analyzed by running Paired Sample T Test, which showed a p-value 0.000, proving that that the effect of training was statistically significant.

CONCLUSION

Through our study, we came to a conclusion that, by teaching the students how to do the assessment, we can help them know the intricacies and the subtle nuances of the process of assessment. This will help alleviate the students' age old affectations and apprehensions, that the assessors are being unfair to them. The brighter side of it is that, it can help the students study much more relaxed and focused, having understood the importance as well as the hardships of assessment.

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