Title: Improving the quality and efficiency of medical student assessment using objective structured clinical examination: A pilot study

Authors: ABO Omotoso; OG Opadijo; OOM Daramola

Context and setting

Assessment is a vital part of the training of undergraduate medical students. Various methods of clinical assessment, e.g. traditional long/short cases and objective structured clinical examination (OSCE) are used. The University of Ilorin in Nigeria currently uses a modified traditional medical curriculum and assesses students using the traditional of long/short case method.

Why the idea was necessary

This traditional clinical assessment method has shortcomings, including limited reliability and efficiency. Improved assessment efficiency has become essential in the context of increasing numbers of students and dwindling financial and human resources.

What was done

A campaign strategy for change was used to mobilize and get the support of the department of medicine faculty for changing the assessment method. One tactic was series of workshops conducted to educate, inform and train faculty about OSCE. Thereafter, a group of 57 final year clinical students were subjected to a summative assessment exercise using the traditional long/short case method at the end of their final clerkship posting in medicine. The same group was then subjected to OSCE a week later. The performance scores of this group of students at the final exit summative assessment 3 months later, using traditional long/short cases, were also collated for evaluation. The various performance scores and efficiency parameters were compared using appropriate statistical tools. A feedback survey was conducted to assess the perception of both students and faculty about the OSCE.

Evaluation of results and impacts

Analysis of the assessment scores showed that the mean OSCE score (56.85 ± 6.30) was statistically higher than the mean scores of the long cases (53.75 ± 7.18, 52.75 ± 9.31) and the short cases (51.82 ± 5.06) (p< 0.05). There was a positive correlation between OSCE scores and the long (r = 0.358) and average of long/short cases (r = 0.402). Using a cut score of 50%, the proportion of successful candidates in the OSCE, as compared with the traditional long short case examination, did not show any statistically significant difference indicating the reliability of OSCE for this high staked examination. Importantly, conducting the OSCE examination for all the 57 candidates required a total of 2 hours 30
minutes, whereas the long/short cases assessment exercise with the same faculty required 8 hours 45 minutes. Most students and faculty indicated preference for OSCE as the method of assessment for the final examination in the department of medicine. This pilot study demonstrated that OSCE is a valid mode of assessment as compared to currently used methods, and is considerably more efficient because it took less time and cost less in its execution.

Correspondence:
ABO Omotoso
Department of Medicine,
College of Medicine,
University of Ilorin,
Ilorin,Nigeria
E-mail: ab_omot1@yahoo.com