The Flipped Classroom in Medical Student Education: Does “Priming” Work?

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Participants could prepare stories ahead of time, although this was not mandatory for attendance, and all participants were encouraged to tell a story. Large and small group formats were both utilized, based on venue and hosting institution. Themes ranged from emotionally devastating patient encounters to hilarious pearls and pitfalls of a long career in EM. When small groups were utilized, session facilitators were also tasked with weaving in discussions of how to deal with feelings of emotional exhaustion, depersonalization, compassion fatigue, medical errors, second victim syndrome, and other stressors.

Impact/Effectiveness: The post-event surveys revealed that 97% of responders (n=33) felt the event was worthwhile and they would be “extremely likely” (n=21) or “very likely” (n=11) to attend future sessions. They felt the optimal frequency of these events would be every 3-6 months. Themes from open-ended resident feedback included 1) the positive nature of the open, honest, safe, and supportive environment for discussion, 2) the camaraderie and relationships developed between residents and faculty, and 3) that the discussion can help individuals process the complex emotions associated with difficult situations. Given the overwhelming success of this ST program and the minimal budget and logistics required, this wellness initiative could easily be replicated at other programs to promote reflective practice, empathy, and a sense of community.

51 The Flipped Classroom in Medical Student Education: Does “Priming” Work?

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Background: Annually, approximately 160 fourth year medical students rotate in the general emergency medicine rotation at Los Angeles County + University of Southern California medical center. Weekly case-based interactive teaching sessions are facilitated by the faculty on pediatric fever and shortness of breath (SOB).

Educational Objectives: This educational innovation sought to evaluate if in-class learning could be enhanced by “priming” the students with educational online videos prior to the in-class session.

Curricular Design: Twenty minutes of video on the topics of pediatric fever or SOB (bronchiolitis and laryngotracheobronchitis) were recorded by pediatric emergency medicine faculty. Students rotating in 2015-2016 were randomly assigned to either the fever or shortness of breath (SOB) group. All participating students took a pre-test prior to viewing the online lectures. Those in the fever group then received lecture links to two fever videos and those in the SOB group received links to two videos on SOB topics to view. They then attended an in-class didactic session on both fever and SOB, followed by an immediate post-test. A delayed post-test was administered at the end of the rotation. To equalize the amount of material distributed, students were given a transcript of the video lectures not assigned at the in-class session. For analysis, test scores were placed into concordant groups (test results on fever questions in the group assigned the fever video and test results on SOB questions in the group assigned the SOB video) and discordant groups (crossover between video assigned and topic tested). Each subject contributed one set of concordant results and one set of discordant results. Descriptive statistics were performed with the Mann-Whitney U test.

Impact/Effectiveness: During nine months of data collection, 126 students were on rotation. Sixty-eight percent of students volunteered to participate in the study (n=86). In the analysis of concordant scores, the pre-test averaged 56.7% correct, the immediate post-test averaged 77.95% correct, and the delayed post-test was 67.18%. In the discordant groups, the pretest averaged 51.89%, the immediate posttest was 66.5% and the delayed by 69.78%. In the concordant groups, the immediate post-test scores improved by 21.3 percent, compared with only 14.8% in the discordant groups. (p = 0.565).

Conclusions: Priming the students for the educational experience enhances immediate learning but may not result in retained knowledge on the respective topic.

52 The Quadruple Threat Emergency Medicine Clerkship Curriculum

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Background: The unique quadruple threat EM clerkship curriculum developed at Cooper Medical School of Rowan University uses a combination of asynchronous and synchronous learning to meet the important educational need of covering core EM concepts in multiple different learning formats. Many EM clerkships promote the use of FOAMed and SIM as adjuncts to their curriculums. However, we are unaware of any EM curriculums that have used home-grown interactive online lectures as a primary method of didactics in combination with weekly team-based SIM cases, oral board cases, and procedure labs to reinforce the same material.

Educational Objectives: By utilizing four different education modalities through both asynchronous and synchronous learning, we hope to reach each different type of learner and provide a fun yet educational way to solidify the core topics in EM.

Curricular Design: Powerpoint® lectures from previous years were revamped into an interactive 30-40 min