Physician Executive Leadership: Expanding Medical School Leadership and Management Education

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Purpose: As the United States healthcare system continues to evolve, leaders in medical education have identified additional skills that physicians must demonstrate to become effective practitioners. These include interdisciplinary teamwork, financial knowledge, quality improvement, an understanding of information technology, and systems-based approaches. Despite these expectations, medical schools are only just beginning to adapt formal curricula to address these areas. Supplemental, student-driven approaches may help bridge the gaps between medical education and those additional skills.

Methods: Sidney Kimmel Medical College (SKMC) students founded Physician Executive Leadership (PEL) in 2013 as a student-run, student-driven extracurricular program that delivers healthcare knowledge and cultivates leadership skills in four primary ways: a fluid guest lecture curriculum, a student-run journal, a structured capstone program called PEL Plus (PEL+), and a summer internship where students undertake projects of their own design in healthcare innovation. The PEL curriculum is centered around six pillars: Applied Leadership, Care Quality/Experience, Health Finance, Health Policy, Entrepreneurship/Innovation, and Law/Ethics. This particular study focuses on the guest lecture component of the curriculum. Students are instructed to fill out a survey that utilizes 7-point Likert scales to assess the perceived utility of each lecture as well as the self-reported improvement in understanding of the relevant pillar. Data were organized by graduating class and summary statistics were calculated.

Results: Between the 2017-2018 and 2018-2019 academic years, seven “large group” lecture events and thirteen “small group” discussion events were held. An average of 176 students attended at least one event each year, comprising nearly 20% of the medical student population. First-year students comprised 36% of all attendees, second-year students comprised 47% of all attendees, third-year students comprised 13% of all attendees, and fourth-year students comprised of 4% of attendees. Students rated Health Policy and Law/Ethics events as the most valuable and interesting (average 7-point Likert scale responses of 6.42 and 6.41, respectively). Students self-reported learning the most from the Health Finance (6.38) and Entrepreneurship/Innovation (6.29) events. Applied Leadership events were perceived to be less
valuable (5.93) and educational (5.75). An average of 58 students attended each large group lecture, while an average of 25 students attended each small group session. Large group lectures received higher utility (6.32 vs 6.17) and content (6.28 vs. 5.93) ratings than small group events.

**Conclusions:** As a student-run, student-driven curriculum, PEL delivers programming that can adapt to evolving student interests. The vast majority of participants found that the events were useful and that their understanding of all pillars’ content increased as a result of attendance. Analysis of student event ratings may drive curricular improvement in the Applied Leadership events and more generally, the small group sessions. Programs like PEL can expand students’ skills beyond purely medical knowledge, though more inquiry is required to assess programs’ utility in residency and after graduating medical school.