

## **A Clinical Rotation in Enhanced Recovery Pathways and Evidence Based Perioperative Medicine for Medical Students**

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**Background:** Enhanced Recovery After Surgery (ERAS) pathways are evidence based, multidisciplinary perioperative bundles of interventions that have been shown to reduce length of stay, complications and costs and improve the patient experience following surgery. They are widely adopted in Europe and Canada and are increasingly being implemented in the United States. Currently, there are no published programs for educating medical students about ERAS programs. In the basic surgery clerkship at our institution, there were limited opportunities for learning about ERAS programs because of an emphasis on spending time in the operating room. Additionally, few students had the opportunity to rotate on service lines that featured an ERAS program. A survey of medical students done in the United Kingdom, where ERAS is widely implemented, found that only 14% of students had heard of ERAS (1). We sought to create a clinical rotation that gave students the opportunity to engage with the many facets of our ERAS program at the three sites within the Johns Hopkins Medicine system.

**Methods:** We developed a four-week curriculum that had three core objectives. First, the student was to engage with the wide variety of allied health providers that participate in the ERAS program. The goal was to gain a 360 degree appreciation for the patient's surgical journey; from the initial office visit, to follow up home care nursing. Second, the student was to become familiar with the evidence base behind the ERAS program. The student was expected to prepare weekly presentation on one aspect of the ERAS pathway. Last, the student was expected to engage in the clinical research associated with the ERAS pathway. The pilot rotation was set for February 2016.

**Results:** Over the course of the month long curriculum, the student was able to interact with a wide range of allied health providers, including; surgeons, anesthesiologists, physician assistants, CRNAs, nursing staff on the surgical floors, as well as home visits with the home care nursing team. This allowed for a more complete view of the surgical journey and emphasized the wide range of providers that need to collaborate for excellent perioperative care to be successful. The student was able to rotate at three different sites, Johns Hopkins Hospital, Bayview Medical Center, and Sibley Memorial Hospital, and appreciate how the ERAS programs were implemented in unique ways at each site. Having a student rotate through each of the sites improved collaboration between the ERAS programs at different

sites. The weekly PowerPoint presentations were archived and kept for future students to reference as they go through the rotation.

**Conclusion:** This initial trial of an ERAS elective for Medical Students provided a global view of the surgical journey and imbued a greater appreciation for how allied medical professionals come together to provide excellent evidence based perioperative care. We look forward to offering this elective to future students as well as preparing a didactic session to be integrated into the core surgery clerkship.

### **Citations**

1. McLennan E, Renwick A, Moug SJ. The current undergraduate medical school curriculum needs to improve awareness of enhanced recovery after surgery. *Color. Dis. Off. J. Assoc. Coloproctology Gt. Br. Irel.*; 2014;16:927–929.