Implementation of a Longitudinal Dermatology Curriculum in Internal Medicine Residency Education

Gil Weintraub, MD, Mollie Oudenhoven, MD, Molly Weinberg, MD, and Bradon Fainstad, MD.

Background:

A majority of dermatologic conditions are managed by non-dermatologists. However, prior surveys have shown there is relatively little formal education dedicated to dermatology across non-dermatology residency programs, including the internal medicine (IM) residency at CU School of Medicine. Given the relative limited access to board certified dermatologists in the United States, it is critical for primary care providers, including graduates from CUSOM IM residency, to feel confident in recognizing and managing common cutaneous diseases.

Objective:

The primary objective of this study is to determine whether a yearlong integrated dermatology minicurriculum will improve IM residents the diagnostic and management of common and important dermatologic conditions.

Methods:

Qualitative interviews with relevant stakeholders, including IM chief residents and IM residency faculty, were performed to determine relevant dermatologic conditions for IM education. Results of interviews guided the development of educational modules. These modules were designed with a comprehensive lesson plan that could be led by non-dermatologists. Modules included short PowerPoint presentations and written instructions on how to lead discussion, focus on important clinical findings, and identify key take-home points in evaluation and management. Modules were planned to be given weekly before noon lectures over the course of the year, and would allow residents at all levels to cover all 20 topics. Two 20 question tests were developed in accordance with NBME question format to assess knowledge before and after the dermatology curriculum. The dermatology pre-course assessment was released to residents at the beginning of the academic year (July 2021) as part of a larger pretest on topics including point of care ultrasound, chest-x rays, and EKGs. Gift card incentives were offered to encourage participation in pre- and post-course assessments.

Results:

Of 174 house staff invited to participate in the pretest assessment, 28.1% completed the dermatology assessment (N=49). The average pretest score was 42.5% (with score ranging from 25 to 80%, median and mode of 45%). Zero of the 20 pre-noon conference dermatology mini-lectures were delivered to date due to difficulty with scheduling, attendance, and stressors related to the COVID-19 Pandemic. Post-tests have not been administered yet.

Discussion:

With less than one quarter of residents participating and no lectures successfully delivered by chief residents, the results of our intervention remain limited. While the content was designed to lower the barrier to teaching dermatology, and the assessment had gift card incentives, we learned a valuable lesson that protected time may be necessary for additional educational content in residency education. We will plan to test residents again at the end of the academic year (June 2022), to see what progress residents naturally make without the incorporation of this dermatology educational content. In future years, we have secured protected time for these lectures to ensure more reliable implementation.