

share their career stories with prompting questions. Clinic reflection allows residents to obtain feedback about a clinic encounter or to discuss joys and challenges specific to outpatient medicine.

We invited Johns Hopkins Bayview Medical Center primary care residents and GIM and geriatrics faculty to attend GIMboree events. At the end of each meeting, residents and faculty were surveyed with Likert scale and open-ended reflection questions. The short answer responses were assessed for common themes across meetings.

Outcomes to Date

GIMboree was piloted between July 2018 and September 2019 with 14 events. During the pilot, resident attendance averaged 7 per evening (range 4–9), and 19 of the 21 eligible primary care residents attended at least 1 GIMboree. An average of 3 faculty attended per evening (range 2–5). The divisions of GIM and geriatrics at our institution provided funding for the cost of dinner for these evenings. The average cost per evening was \$85.

Surveys of participants reflect that GIMboree is popular among residents and faculty. To residents, the most satisfying aspects of the intervention include the off-campus atmosphere, time to eat dinner and socialize with other residents, and hearing from the faculty member(s). The main reported barriers to participation include conflicting clinical duties and personal obligations.

Preliminary analysis of the qualitative results reveal 3 main themes: (1) excitement about a career in primary care medicine (“Love that you can have a long-term relationship with patients and fulfill a role that no one else is able to for the patient”); (2) growing sense of community (“I love hearing about others’ experiences—their joys and challenges—that normalize our experiences in training and challenge us to always continue to improve”); and (3) goals for self-improvement (“I will be more brave about discussing risks with patients and building a network of colleagues”).

In 2019, GIMboree received an Accreditation Council for Graduate Medical Education *Back to Bedside* grant to allow for further study and expansion of the program to include internal medicine and internal medicine-pediatrics residents from 2 other residency programs. GIMboree is an innovation in medical education that could be adapted by other fields such as family medicine, pediatrics, and obstetrics-gynecology to grow excitement for primary care and the sense of community among trainees. We look forward to the evolution of GIMboree and hope to create a guide for starting GIMboree-like projects in other residency programs.

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Using a Location-Sensing Time-Keeping App to Help Track Resident Work Hours

Setting and Problem

Resident work hour restrictions are often a source of consternation for program directors, administrators, and residents alike. While policies regarding work hour limitations garner most of the attention, the actual reporting of work hours still relies on self-tracking and self-reporting by residents. This means that work hour reporting essentially operates on an “honor system,” despite the potential conflicts of interest for residents, leading some to question the accuracy of reported work hours.

Another factor affecting the accuracy of work hours is that it is genuinely difficult and laborious to track them. At most institutions, the resident is solely responsible to track their work hours. However, residents are often not given any tools to do so precisely. It is also very rare for work hours to be tracked in real time, which leads to many residents estimating their work hours post hoc, sometimes weeks later.

To combat this issue, a more proactive approach to assist residents in tracking work hours is sorely needed. Previous studies have explored the efficacy of work

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hours tracking by e-mail or text message. However, these methods still require the resident to actively perform a task to track their work hours (in this case, by clocking in and out via e-mail or text message). The need to actively perform an action may decrease compliance and accuracy. We believe that an automated mechanism to assist residents in work hours tracking would be helpful for all stakeholders in graduate medical education. Given the ubiquity of smartphones today, we propose an automated system that utilizes smartphone technology to achieve this goal.

Intervention

To help residents track work hours, we used the HoursTracker app (Cribasoft LLC, Round Rock, TX). This app uses geo-fencing technology to allow users to track their work hours by sensing the phone's location. A geo-fence is a virtual fence that is set up around a "work location." This particular app uses Wi-Fi networks to set up the geo-fence. The app can detect changes in the Wi-Fi networks as a user moves in and out of the geo-fence, because each network has a unique identifier. The app does not connect to the specific Wi-Fi networks, although it does require Wi-Fi to be activated on the user's smartphone. Every physical location (eg, hospital, clinics, laboratory, etc) in which a resident works can be set as a "work location" with a reasonable radius around each work location set as the geo-fence. The app automatically clocks in residents when they enter their work location radius. Hours are automatically tallied by the app for easy tracking and reporting of work hours.

Outcomes to Date

After approval by our Institutional Review Board, we recruited 10 general surgery residents to participate in our 12-week pilot study. All participants completed the study survey. Prior to using the app, 80% of residents said that it was "too time-consuming to regularly report work hours," and 40% said it was "difficult to accurately track work hours." After using the app, 80% of respondents said the app was "extremely or moderately easy to use," and 60% said it was "very or moderately accurate." One resident noted that the app "does not include transportation time between sites." In addition, this resident forgot their smartphone one day, so no hours were logged. However, residents are able to manually adjust tallied work hours if needed on the app. Despite these potential issues, this pilot study shows that a location-sensing time-keeping smartphone app can be used to assist residents in tracking work hours. The unobtrusive and automated nature of the app is an advantage over other work hour tracking systems previously



FIGURE

Example of a Geo-Fence Set Around the Centroid of the Work Location

tested and can potentially decrease the burden and increase the accuracy of reported work hours.

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Empathy Rounds: Residents Combating Impostor Syndrome

Setting and Problem

Resident physicians are at high risk for impostor syndrome: inaccurate, devaluing self-assessments that limit feelings of adequacy. Estimated syndrome prevalence among residents approaches 75% and is greater in women and minorities. Consequences may include burnout, social isolation, and fear of asking for help or admitting failures. Numerous factors contribute, including frequent transitions, variable expectations, and new environments. Not to supplant efforts addressing root causes of impostor syndrome, but to serve adjunctively, we created a forum to openly acknowledge the issue through a peer lens.

Intervention

Empathy Rounds is an event featuring respected resident panelists being vulnerable and sharing themed personal stories with an audience of peers. The goals of Empathy Rounds include peer normalization of imperfection and recognition of shared struggles to target impostor syndrome and nurture the resident community. Hearing peers being vulnerable can drive recognition that audience members are not alone and that they share work-related emotions, doubts, and fears.

At our pilot event, 3 recruited panelists and a facilitator—all residents from across postgraduate years and specialties—engaged with an exclusively resident audience under the theme “Transitions in Training,” where they candidly shared personal impacts of challenging situations. Importantly,

Empathy Rounds are not intended as a morbidity and mortality conference to assign blame or drive process improvement. Instead, they are designed for panelists to reflect on their *experience of an experience* and open up about uncertainties, struggles, and coping strategies—recognizing their way might not be right or wrong but has been their journey. Panelist stories were varied and included powerlessness on a care team, uncertainty making the “right” code status recommendation in patients who later died, antidepressant use, unexpected family loss and pregnancy, and a residency leave of absence.

The 1-hour event replaced 1 of 2 previously scheduled all-resident meetings, whose historically addressed grievances included whether the peanut butter in the lounge should be crunchy or creamy. Because of the content substitution at a preexisting meeting, the audience took no additional time or preparation for the event. The event had pre-allocated continental breakfast items and coffee, but their inclusion was not strictly necessary for the gathering. Logistically, it required only a space reservation, chairs, a microphone, cups of water, and facial tissues.

Outcomes to Date

The term “resident wellness” is encumbered with rhetorical baggage following a well-intentioned history of interventions that effectively amount to victim-blaming. Often, wellness activities convey “residents would be better *if* they would *do*...” a combination of yoga, reflective writing, or some other new to-do list item, often without addressing underlying issues. Aside from listening, we did not ask residents to *do* anything or ambitiously offer panaceas but simply sought acknowledgement and validation. “Wellness” through Empathy Rounds passively de-emphasizes resilience, work-life balance, or hours worked. Rather than turning to faculty or administration, it relies on peers to deliver a genuine message.

Of the 45 attendees (representing 35% of graduate medical education trainees on any rotation at any site), 12 (27% of attendees) completed a voluntary survey, with 100% supporting continuation of Empathy Rounds. While our graduate medical education department is small, the event framework can be easily scoped depending on program needs and sizes. Future work could include quantification with the Clance Impostor Phenomenon Scale, proactive coupling with simulations addressing common scenarios, or integration with longitudinal peer support programs.

Empathy Rounds represents an adaptable framework intended to combat impostor syndrome and its potential

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