UC Irvine

Western Journal of Emergency Medicine: Integrating Emergency Care with Population Health

Title

Mitigating the Gender Gap: How "DOCTOR" badges affect physician identity

Permalink

https://escholarship.org/uc/item/52w0n97r

Journal

Western Journal of Emergency Medicine: Integrating Emergency Care with Population Health, 23(1.1)

ISSN

1936-900X

Authors

Chang, Jenny Silverberg, Joshua Jones, Michael et al.

Publication Date

2022

Copyright Information

Copyright 2022 by the author(s). This work is made available under the terms of a Creative Commons Attribution License, available at https://creativecommons.org/licenses/by/4.0/

active learning methods would be more used and effective.

Methods: In spring 2020, two online surveys were distributed assessing time since last in-person clinical experience, and Likert-scale (1-5) questions regarding use and effectiveness of virtual education modalities. Results were analyzed using descriptive statistics.

Results: 27 EM residencies were recruited, with 311 pre-intern participants. 289 (92.9%) completed pre-surveys, and 240 (77.2%) completed post-surveys. They reported the number of weeks since performing a physical examination (median = 8, IQR 7, 12), attending an in-person didactic (median = 10, IQR 8, 15), and of rotation displacement (median = 4, IQR 2, 6). Common education tools included online modules (n=210), podcasts (n=193), and social-media based education (n=195). Effective tools included podcasts (Mean = 4.116, SD = 0.856), online question bank use (Mean = 4.052, SD = 0.872), and FOAMed resources (Mean = 3.994, SD = 0.904).

Conclusions: Pre-interns are entering residency disconnected from in-person clinical education, reflecting a need for effective remote teaching. Interactive options (podcasts, question banks, and FOAMed) were cited as more effective than traditional offline options (textbook and journal article reading). Identifying popular, effective virtual modalities can guide education initiatives during the present and future pandemics.

Table.

Educational Intervention			Confidence Interval
Effectiveness	Frequency (%)	Mean (SD)	(95%)
Podcasts	193	4.166 (0.856)	(4.045, 4.287)
Question Banks	77	4.052 (0.872)	(3.857, 4.247)
FOAMed	154	3.994 (0.904)	(3.851, 4.137)
Other Online Study Package	119	3.899 (0.951)	(3.728, 4.07)
Online Videos (YouTube, Other)	161	3.882 (0.736)	(3.768, 3.996)
Problem-Based Learning	114	3.667 (0.928)	(3.497, 3.837)
Other Social Media-Based			
Education	195	3.631 (0.988)	(3.492, 3.77)
Live Virtual Lectures	187	3.604 (0.906)	(3.474, 3.734)
Team-Based Learning	87	3.506 (0.987)	(3.299, 3.713)
Online Modules	210	3.462 (0.993)	(3.328, 3.596)
Recorded Lectures	115	3.357 (0.91)	(3.191, 3.523)
Textbook Reading	121	3.306 (1.007)	(3.127, 3.485)
Journal Article Reading	168	3.286 (0.856)	(3.157, 3.415)

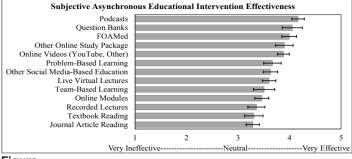


Figure.

42 Measuring Depression, Stress, Anxiety and Resilience Levels During the Covid-19 Pandemic Using Validated Psychometric Testing

Sarah Bella, DO; frederick fiesseler, DO; Kristen Walsh, MD; Ashley Flannery, DO; Brian Walsh, MD

Learning Objectives: To describe the prevalence of depression, anxiety, stress and resilience in EM residents during the Covid-19 pandemic

Background: EM residents were already known to be high-risk for depression and burnout; in all likelihood the Covid-19 pandemic has added to this risk. In addition to the understandable work stressors, social isolation caused by the lockdowns likely has affected their support structure negatively.

Objectives: Using validated psychometric testing, we sought to determine the levels of depression, anxiety, stress, and resilience in EM residents in a region severely impacted by the pandemic.

Methods: Setting: An EM residency program in the state with the highest per-capita deaths from Covid-19. All EM residents were surveyed eight months into the pandemic using the Depression, Anxiety, Stress Scales (DASS) and Brief Resilience Scale (BRS). Both studies have been validated in the psychology literature across multiple settings. Surveys were anonymous to promote honesty in answers. Levels of depression, anxiety, stress, and resilience were determined. Demographic information was also collected.

Results: 23 of 27 residents (85%) completed the survey. Using the DASS, 48% (95%CI 27-69) were found to have at least mild depression, with 17% (95%CI 2-33) found to have "severe" or "extremely severe" depression. 35% (95%CI 15-55) were found to have at least mild levels of anxiety, with 4% (95%CI -4 to 13) having "severe" or "extremely severe" anxiety. 52% (95%CI 31-73) were found to have at least mild stress, with 13% (95%CI -1 to 27) found to have "severe" or "extremely severe" stress. Using the BRS, 9% (95%CI -3 to 20) were found to have low levels of resilience.

Conclusion: While we knew EM residents (physicians) are high-risk for depression and burnout, the levels of depression and stress measured by validated psychometric testing during the Covid-19 pandemic were concerning. Although the residency has increased its wellness activities significantly, it appears much more needs to be done to help residents get through this extremely difficult situation.

43 Mitigating the Gender Gap: How "DOCTOR" badges affect physician identity

Jenny Chang, MD; Joshua Silverberg, MD; Michael Jones, MD; John Arbo, MD; Jill Corbo, MD

Learning Objectives: To elucidate the frequency of

physician misidentification in the ED and evaluate whether a low-cost intervention can help reduce rates and improve overall physician wellness using an observational study.

Background: Multiple studies have shown that only a small fraction of patients are able to identify their physician. Physician misidentification impacts patient care, patient satisfaction, and physician wellbeing.

Objectives: Our study aims to evaluate whether the incorporation of "DOCTOR" badges can improve identification and the overall wellness of EM physicians. We hypothesize that the rate of EM physician misidentification would be more frequent among female physicians and that badges can be a low-cost tool to rectify this problem.

Methods: A voluntary anonymized survey was distributed to 83 EM residents and 28 EM Attendings working in a large urban academic center. All physicians were given a badge to wear and then were re-surveyed. Descriptive data are presented as means with standard deviation, percentages, and 95% confidence intervals. Mean rate of misidentification were compared pre and post "DOCTOR" badges using a Student's t-test.

Results: Physician response rates and demographics are given in Table 1. 97% of female EM physicians are misidentified compared to 43% of male EM physicians 95% CI: [37,66], p<0.0001. After wearing the badges, there was a decrease in misidentification of female EM physicians to 81.6%, p=0.03 and 73.7% of female physicians reported feeling more valued vs 44.9% male physician 95% CI [7.9,46], p=0.007. Similarly, 64.3% EM physicians felt less frustration with misclassification, 81.6% female physicians vs. 51% male physicians, 95% CI [10.5,47], p=0.0033.

Table.

	Pre n=98 N (%)	Post n=87 N (%)
Gender:		
Male	60 (61)	49 (56)
Female	38 (39)	38 (44)
Race:		
Caucasian	42 (43)	34 (39)
Black	9 (9.2)	9 (10.4)
Hispanic	7 (7.2)	9 (10.4)
East Asian/Pacific Islander	14 (14.3)	12 (13.8)
Southeast Asian	20 (20.3)	18 (20.7)
Other	6 (6)	5 (5.7)
Level of training:		
Resident	75 (76.5)	71 (82)
Attending	23 (23.5)	16 (18)

Conclusions: Female EM physicians are disproportionately misidentified by patients and their families and are more likely to feel undervalued. We found that the use of "DOCTOR" badges decreased misidentification and improved wellness. Therefore, having EM physicians wear a "DOCTOR" badge may be an effective long-term solution. Reported efficacy may have been even higher as our study was partially limited by the COVID-19 pandemic when badges became obscured by PPE.

44 Narrative Medicine Workshops for Emergency Medicine Residents

Zayir Malik,MD; Michael Blackie, PhD; Alan Schwartz, PhD; James Ahn, MD, MHPE

Learning Objectives: Our goal was to evaluate the effect on and resident perceptions of incorporating narrative medicine workshops into residency education.

Background: EM residents face emotional challenges every day: conflicts with patients and providers, witnessing trauma, uncertain decision making, and a chaotic work environment. Despite these, residency education lacks training for emotional processing and empathetic skill building. Narrative medicine, a form of humanities education, may foster empathy and reduce emotional exhaustion; its value has been studied in undergraduate and graduate medical settings, but not within an EM residency program.

Objectives: Our goal was to evaluate the effect on and resident perceptions of incorporating narrative medicine workshops into residency education.

Curricular Design: We held two hour-long workshops three months apart in an urban, academic, EM residency. They were led by EM faculty and consisted of four parts: an aloud, group reading of an EM-related text, a guided discussion of themes, prompt-driven reflective writing, and a conversation about the writings and their themes. We chose to use group discussion and reflection as they are strategies suitable for higher order cognitive learning and allow learners to explore different perspectives. The use of multiple educational methods served to provide reinforcement of learning. Further, this design is commonly used to teach narrative medicine. We used post-intervention surveys to evaluate our curriculum.

Impact: This was the first study that sought to evaluate a narrative medicine curriculum within an EM residency. 19 residents completed an evaluative survey; a majority (n=18, 95%) of residents agreed that narrative medicine should be a standard part of didactics. Residents also agreed that the workshops helped them process difficult events (n=17, 90%), encouraged creative thinking (n=17, 90%), and brought them closer to their colleagues (n=15, 80%). Results suggest that residents are eager to learn ways to process the emotional challenges inherent to EM and that applying a narrative medicine approach may be beneficial.