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Self-Assessment of Preparedness: Incoming Emergency Medicine Interns in the Era of COVID-19

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in our department. The survey consisted of 8 Likert scale questions assessing specific components of the interview and overall impressions of the virtual interview format.

Results: A total of 113 surveys were distributed with 34 (30%) interviewees completing the survey. Overall, respondents were 32.4% Female and the mean number of virtual interviews attended was 15.3 (SD = 4.8). Responses to questions regarding overall impression and specific components of the virtual interview are reported in Table 1. Regarding how the nationwide transition to a virtual interview process affected their match, 32% responded negatively, 41% responded neutral, 26% responded positively. Most interviewees (71.9%) agreed that virtual interviews should be offered as part of the traditional residency interview cycle.

Conclusion: Medical students felt that our virtual interview process benefited their experience overall. While the nationwide transition is not thought to have benefitted their match, students feel that virtual interviews should be offered as an option moving forwards. The study was limited by small sample size and single-center setting.

Table 1. Responses to survey questions regarding the virtual interview process.

Survey Questions	Likert Scale (%)					Mean Score (SD)
	1. Strongly Disagree	2. Somewhat Disagree	3. Neutral	4. Somewhat Agree	5. Strongly Agree	
Pre-interview Resident Meet & Greet: Provided a good "feel" for the program culture	0 (0.0)	3 (10.0)	2 (6.7)	17 (56.7)	8 (26.7)	4.00 (0.87)
Virtual Department Tour: Provides a visual representation of the ED	1 (3.2)	1 (3.2)	2 (6.5)	10 (32.3)	17 (54.8)	4.32 (0.98)
Program Brochure: Provided adequate information	0 (0.0)	0 (0.0)	2 (6.3)	14 (43.8)	16 (50.0)	4.44 (0.62)
Interview Day Format: Allowed me to get to know the program and present myself	0 (0.0)	1 (3.1)	4 (12.5)	9 (28.1)	18 (56.3)	4.38 (0.83)
Social Media: Helped familiarize with residency culture	0 (0.0)	2 (9.5)	5 (23.8)	8 (38.1)	6 (28.6)	3.86 (0.96)
Overall Impression: Provided opportunity to familiarize myself with program and present myself as candidate	0 (0.0)	1 (3.1)	2 (6.3)	13 (40.6)	16 (50.0)	4.38 (0.75)

23 Self-Assessment of Preparedness: Incoming Emergency Medicine Interns in the Era of COVID-19

Lorie Piccoli, Kathleen Williams, Brent Becker, Amber Billet, Barbara Stahlman

Learning Objectives: The purpose of this study was to assess the preparedness of the incoming emergency medicine intern (EM-1) resident class in light of changes to clinical rotations incurred by COVID-19. This feedback was given to programs to alter orientation programs and address

knowledge gaps.

Background: The COVID-19 pandemic resulted in modification, limitation or cancellation of rotations that affected the clinical experience of graduating fourth-year medical students (MS4).

Objective: The purpose of this study was to assess the preparedness of the incoming emergency medicine intern (EM-1) resident class in light of changes to clinical rotations incurred by COVID-19.

Methods: We conducted a prospective, survey-based assessment of MS4 matriculating into 7 geographically distinct US EM residency programs in July 2021. The anonymous survey collected data on respondent demographics, rotations, procedures performed, and subjective comfort level with clinical scenarios. Each respondent was assigned a procedural index score (PS) and a clinical comfort index score (CCS), defined as the total sums of reported procedure counts and the quantitative Likert values for each clinical scenario, respectively. Spearman's rank order coefficient was used to assess correlation between the index scores (PS, CCS) and educational variables.

Results: A total of 63 respondents returned completed surveys. The median numbers of EM rotations, virtual rotations and ED encounters were 2 (IQR 2-2), 3 (IQR 1-4,) and 100 (IQR 55-100), respectively. MS4 rotations were "somewhat" or "moderately" limited due to COVID-19 for 82.5% of respondents and "somewhat" or "moderately" suspended in 73.0%. Calculation of index scores yielded a median PS=35 (IQR 30-39) and CCS=30 (IQR 27-32). PS was significantly positively correlated with the number of EM rotations (r=0.395) p=0.001, and ED patient encounters (r=0.369, p=0.006).

Conclusion: Based on self-reported data, changes to MS4 rotations did not significantly impact the procedural exposure or clinical comfort level of incoming EM-1 residents. Procedural experience, but not overall clinical comfort level, was positively correlated with the number of EM rotations and patient encounters completed.

Table 1. Reported number of procedures performed.

Procedure/Skill	Number of Procedure Performed (%)				
	0	1-2	3-5	6-10	>10
Abscess incision/drainage	6 (9.5)	29 (46.0)	18 (28.6)	6 (9.5)	4 (6.3)
Cardioversion	26 (0.0)	25 (39.7)	6 (9.5)	2 (3.2)	4 (6.3)
Central venous catheter	35 (55.6)	13 (20.6)	11 (17.5)	4 (6.3)	0 (0.0)
Chest x-ray interpretation	0 (0.0)	1 (1.6)	3 (4.8)	19 (30.2)	40 (63.5)
EKG interpretation	0 (0.0)	3 (4.8)	5 (7.9)	13 (20.6)	42 (66.7)
Endotracheal intubation	16 (25.4)	14 (22.2)	9 (14.3)	12 (19.0)	12 (19.0)
Laceration repair	1 (1.6)	7 (11.1)	16 (25.4)	16 (25.4)	23 (36.5)
Lumbar puncture	28 (44.4)	28 (44.4)	5 (7.9)	2 (3.2)	0 (0.0)
Pediatric evaluations	1 (1.6)	3 (4.8)	9 (14.3)	9 (14.3)	41 (65.1)
Pelvic examination	0 (0.0)	8 (12.7)	29 (46.0)	15 (23.8)	11 (17.5)
Peripheral IV	18 (28.6)	20 (31.7)	8 (12.7)	10 (15.9)	7 (11.1)
Psychiatric evaluations	2 (3.2)	3 (4.8)	13 (20.6)	11 (17.5)	34 (54.0)
Simulation (EM)	4 (6.3)	12 (19.0)	17 (27.0)	16 (25.4)	14 (22.2)
Slit lamp examination	31 (49.2)	19 (30.2)	6 (9.5)	3 (4.8)	4 (6.3)
Splint placement	18 (28.6)	21 (33.3)	15 (23.8)	5 (7.9)	4 (6.3)
Ultrasound (point of care)	3 (4.8)	4 (6.3)	14 (22.2)	11 (17.5)	31 (49.2)

Table 2. Reported comfort level with clinical scenarios.

Scenario	Comfort Level (%): 1= "less comfortable", 4="more comfortable"			
	1	2	3	4
Abdominal pain	0 (0.0)	9 (14.3)	43 (68.3)	11 (17.5)
Cardiac arrest	17 (27.0)	23 (36.5)	20 (31.7)	3 (4.8)
Chest pain	1 (1.6)	8 (12.7)	41 (65.1)	13 (20.6)
Dysrhythmias	9 (14.3)	28 (44.4)	21 (33.3)	5 (7.9)
Neurologic complaints/Stroke	3 (4.8)	36 (57.1)	22 (34.9)	2 (3.2)
Orthopedic complaints	14 (22.2)	28 (44.4)	12 (19.0)	9 (14.3)
Pediatric fever	13 (20.6)	36 (57.1)	12 (19.0)	2 (3.2)
Pregnancy-related complaints	21 (33.3)	30 (47.6)	11 (17.5)	1 (1.6)
Presentation: Consultant	7 (11.1)	20 (31.7)	27 (42.9)	9 (14.3)
Presentation: H&P	1 (1.6)	3 (4.8)	33 (52.4)	26 (41.3)
Sepsis	7 (11.1)	29 (46.0)	25 (39.7)	2 (3.2)
Shortness of breath/Respiratory distress	4 (6.3)	20 (31.7)	35 (55.6)	4 (6.3)

24 Student-Forum Heuristics for Emergency Medicine Residency Program Application-Preliminary Thematic Analysis

Jacob Garcia, Molly Estes, Ronnie Ren, Xiao Chi Zhang

Learning Objectives: To perform a qualitative analysis of students’ EM program experiences through a publicly available AOC.

Background: Academic Emergency Medicine (EM) communities have viewed anonymous online communities (AOCs) such as Reddit or specialty-specific “applicant spreadsheets” as poor advising sources. Despite this, robust EM AOCs exist, with large user bases and heavy readership. Insights about applicants’ authentic experiences can be critical for applicants and program leadership decision-making. To date, there are no EM studies to qualitatively assess EM AOC narratives during the application cycle.

Objectives: To perform a qualitative analysis of students’ EM program experiences through a publicly available AOC.

Methods: This is a qualitative, single-blinded, retrospective review of a publicly-available, time-stamped, user-locked AOC dataset: “EM Applicant Spreadsheet, 2020-21.” All data were extracted from the Excel sub-sheets entitled ‘Virtual Interview Impressions’ and ‘Rotation Impressions’ and then de-identified. Four investigators independently analyzed the data using an inductive approach and findings were combined to generate common themes discussed by students.

Results: Preliminary thematic analysis was conducted on a random 20% sample (N=37) of 183 independent narratives. Major themes were: Living- and Working-Conditions, Interpersonal Relationships, Learning Experiences, Post Graduate Readiness, and Online/Virtual Supplements (Table 1). Sub-themes included: patient population (13%), resident personality (7%), program leadership personality (7%), relationship with faculty/leadership (6%), geography (4%),

practice setting (4%), program reputation (4%), and PGY-3 experiences (4%).

Conclusions: This study could help set a precedent for future program assessments by applicants. It elucidates important themes in their interactions or learning experiences with programs and creates opportunities for learner-centric program improvement.

Table.

Living Conditions	Total (N=179)
Geography	8
Cost of living	4
Amenities	3
Subtotal:	15
Working Conditions	
Patient population (underserved, volume, trauma, pathology, etc)	23
Practice setting (comm, acad, county, Lvl 1, HCA, etc.)	8
Program reputation/prestige/age	8
Perks (funding for travel/activities, food, lounge, parking, etc)	7
Work hours	6
DEI (includes LGBTQ)	5
Relationship with other specialties	5
Salary	4
Wellness	3
EMR	2
Moonlighting	2
Ancillary healthcare staff: (APPs / nurses / technicians)	2
Metrics	1
Scutwork	1
Subtotal:	77
Interpersonal Relationships	
Residents	13
PD personality	12
Other leadership/faculty personality	11
Opportunity for upward feedback	3
Responsiveness to upward feedback	3
Generic	0
Objective experience	0
Subtotal:	42
Learning experience	
On-shift teaching	6
POCUS	5
Procedures	5
Didactics/conference:	3
Pediatric training:	2
EMS/pre-hospital training:	2
Personal patient load	1
Autonomy	1
Subtotal:	25
Post-graduate readiness	
PGY-3 experience	9
Fellowships	5
Jobs	2
PGY-4 experience	2
Subtotal:	18
Online/Virtual Supplement	
Virtual tour	1
Website	1
Subtotal:	2