

# South Atlantic Family Medicine Residency Curriculum Disruption due to COVID-19: A 2020 CERA Program Directors Survey

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## Background

The COVID-19 pandemic has profoundly affected daily life and healthcare around the globe. Undoubtedly, it has affected training of our medical learners. Medical students have had rotations cancelled in favor of virtual learning.<sup>1</sup> Elective surgeries had been cancelled by many governors.<sup>2</sup> Nursing homes closed doors to outsiders due to the vulnerability of the elderly to the SARS-CoV2 virus.<sup>3</sup> But there is a paucity of literature in regards to how family medicine residencies have been affected by the COVID-19 pandemic.

## Objective

This research project ascertained program directors' perception of disruption in family medicine education by the COVID-19 pandemic; specifically, the ACGME curriculum requirements for family medicine: adult medicine, emergency medicine, geriatrics, gynecology, ICU, musculoskeletal, newborn, obstetrics, pediatrics, practice management, surgery and the family medicine practice site.

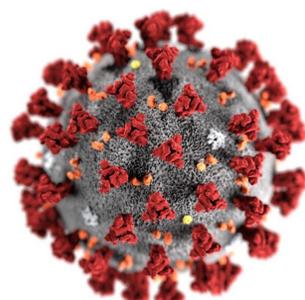
## Methods

Our questions are part of a larger omnibus survey conducted by the Council of Academic Family Medicine Educational Research Alliance (CERA). This organization surveys program directors (PD) of ACGME family medicine programs on a biennial basis. Data was collected from September 23 to October 16, 2020 using SurveyMonkey. This project was approved by the American Academy of Family Physicians Institutional Review Board.

We selected data from program directors in the South Atlantic region which includes family medicine programs in Florida, Puerto Rico, Georgia, North Carolina, South Carolina, Virginia, West Virginia, District of Columbia, Delaware and Maryland (N=43). We included responses that had answered all questions of interest.

Statistical analysis includes a descriptive assessment for the disruptions in curriculum as reported by program directors. We used Kruskal-Wallis (KW) test to analyze if the ranks given to disruptions in a rotation were different among the demographic variables (type of program, number of residents in the program and community size).

We provide descriptive analysis for program directors concern with accreditation and used Kruskal-Wallis test to analyze if there are differences between demographic variables for PD concern with accreditation. We used STATA 14 for all analyses.



## Survey Questions

Please rate disruption to required ACGME curricular experiences for your program during the height of the COVID-19 pandemic.

1=no disruption,  
2=mild disruption  
3=moderate disruption  
4=severe disruption  
5=suspended

On a scale 1-10, what is your concern that the disruption in your residents' education during the COVID-19 pandemic will impact your ACGME accreditation?

1=no concern  
3=little concern  
5=some concern  
7=moderate concern  
10=extraordinary concern

Type of program  
University-Based  
Community-Based, University-Affiliated  
Community-Based, Non-Affiliated  
Military  
Other

Community size  
Less than 30,000  
30,000 to 74,999  
75,000 to 149,000  
150,000 to 499,999  
500,000 to 1 million  
More than 1 million

Number of residents in program  
<19  
19 - 31  
> 31

## Results

**Table 1. Program directors' mean and 95% confidence interval (CI) for disruption in family medicine required curriculum due to COVID-19 in the South Atlantic region. (N=43)**

|                                  | Mean       | 95% CI     |
|----------------------------------|------------|------------|
| Adult medicine                   | 2.1        | 1.8 to 2.4 |
| <b><i>Emergency medicine</i></b> | <b>2.0</b> | 1.6 to 2.3 |
| Family medicine practice site    | 3.2        | 2.9 to 3.5 |
| <b>Geriatrics</b>                | <b>3.8</b> | 3.5 to 4.1 |
| Gynecology                       | 2.8        | 2.4 to 3.1 |
| <b>ICU</b>                       | <b>2.0</b> | 1.6 to 2.4 |
| Musculoskeletal                  | 2.9        | 2.6 to 3.2 |
| Newborn                          | 2.1        | 1.6 to 2.5 |
| <b>Obstetrics</b>                | <b>2.0</b> | 1.7 to 2.4 |
| Pediatrics                       | 2.3        | 1.9 to 2.7 |
| Practice management              | 2.2        | 1.8 to 2.6 |
| Surgery                          | 2.9        | 2.5 to 3.2 |

There was a significant difference between disruptions in the curricular areas (p=0.001).

**Bold = highest mean**  
**Bold italics = lowest mean**

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## Results (continued)

- There was no significant difference for PD responses for disruption in curriculum by type of program.
- There was only a single curricular item, pediatrics, that was significantly different based on community size (p<0.05).
- For number of residents in the program, there were two curriculum items that were significantly different: family medicine practice site (p=0.001) and musculoskeletal (p<0.05).
- The mean for PD responses for concern regarding accreditation being affected by COVID-19 was 4.1 (95% CI 3.2 to 5.0) on a 10 point scale.
- There were no statistically significant differences in the PD responses for accreditation concern by program type, community size or number of residents.

## Discussion

- The most disrupted curricula reported were geriatrics, surgery, gynecology, musculoskeletal and family medicine site. This follows what disrupted the healthcare system during COVID-19, namely senior care facilities, surgeries and outpatient visits.
- Limitations:
  - The second surge and ongoing pandemic may have changed curriculum after our survey.
  - We did not use a positive or negative descriptor on our scale.
  - Only 50% of surveys were returned.
  - Each program has their own specifics for a curricular rotation.

## Conclusion

As family medicine educators in our region, we should be confident based on the results of this program director survey that COVID-19 did not suspend the curricular experiences of family medicine residencies. A survey to family medicine residents would discover how they feel education was affected by COVID-19. A repeat program director survey would see if the continuing pandemic is still affecting curriculum.

## References

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