#### Rowan University

#### **Rowan Digital Works**

Cooper Medical School of Rowan University Capstone Projects

Cooper Medical School of Rowan University

2021

#### Medical Students' Perceptions Regarding USMLE Step 1 Study Resources

Cecilia Lee

**Emily Hansinger** 

Follow this and additional works at: https://rdw.rowan.edu/cmsru\_capstones

#### **Recommended Citation**

Lee, Cecilia and Hansinger, Emily, "Medical Students' Perceptions Regarding USMLE Step 1 Study Resources" (2021). *Cooper Medical School of Rowan University Capstone Projects*. 54. https://rdw.rowan.edu/cmsru\_capstones/54

This Poster is brought to you for free and open access by the Cooper Medical School of Rowan University at Rowan Digital Works. It has been accepted for inclusion in Cooper Medical School of Rowan University Capstone Projects by an authorized administrator of Rowan Digital Works.



# Medical Students' Perceptions Regarding USMLE Step 1 Study Resources Emily Hansinger, BS, Cecillia Lee, BS, Cheryl Vasan, PT, DPT, PhD, Nagaswami Vasan, DVM, MVSc, PhD;

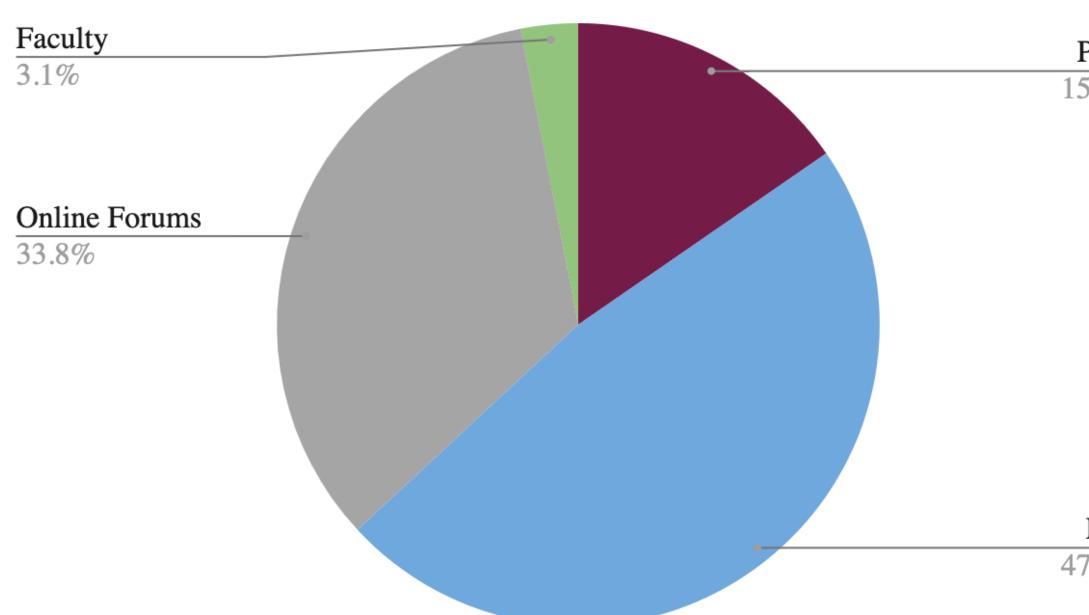
# **Introduction**

The United States Medical Licensing Examination (USMLE) Step 1 is the first of three medical licensing examinations that medical students must take in the process of becoming a physician. Because of its increased importance to residencies, there has subsequent increased stress placed on medical students to perform well on USMLE Step 1. Students have become more proactive and efficient in their studying, starting to gear their studies towards this exam earlier in their education and also focusing on what is tested by using commercial resources that are not provided by their institution. These resources condense the monstrous amount of information needed for board exams into manageable quantities that are easier to digest. The available resources range from question banks and video series to review books and flashcards. This has resulted in increased use of commercial resources to prepare for the Step 1 examination. The purpose of this study was to identify factors that influence medical students' decisions to use commercially available Step 1 resources.

# **Methods**

This study was conducted at Cooper Medical School of Rowan University (CMSRU) during the 2020-2021 school year. CMSRU is a four-year medical school located in Camden, NJ. At this institution, students take the United States Medical Licensing Examination (USMLE) Step 1 after their second year of study. Overall, there are 115 students enrolled in the second-year class and 111 in the thirdyear class and all were invited to participate. This allowed the study to gather perspectives of students before they took USMLE Step 1 and after they took the exam.

The authors of this study received IRB approval from Rowan University. All (n=226) second- and third-year medical students were contacted via email to participate in an anonymous online survey conducted through Qualtrics. The survey was created on Qualtrics, and consisted of multiple choice questions, multiple answer questions, and Likert scale questions related to USMLE Step 1 resources used in test preparation.



## Top Influence on Resource Selection

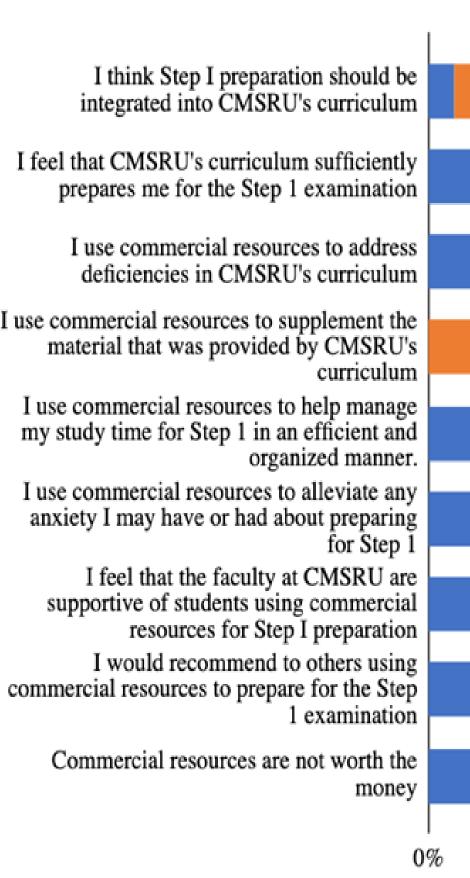
Price 15.4%

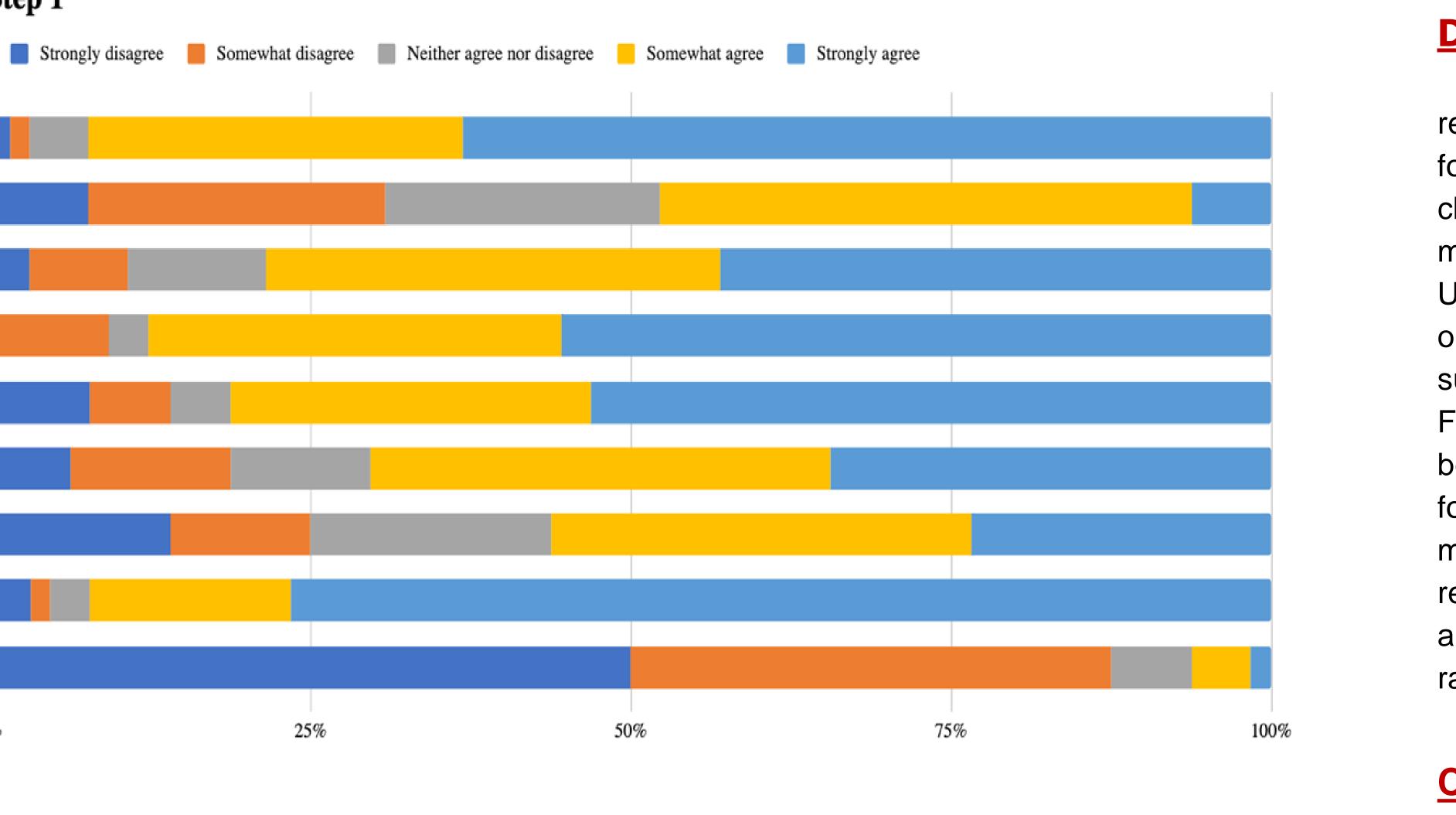
Peer 47.7%

# **Results**

The survey was sent to 226 students and 63 responded (29 second-year students). Results are only including data from surveys that were fully completed. The combined response rate was 27.8%. The responses were very similar between the classes therefore, the authors have reported the combined results. Fifty-one percent of students use 3-4 commercial resources. Sixty-eight percent did not set a total dollar limit on what they would spend o resources, with 43% spending between \$300.00-\$600.00 dollars. First Aid (95.2%), UWorld (85.7%), Pathoma videos (85.7%) and Anki flashcards (85.7%) were the most frequently used resources. Price (50.8%) and peers (36.5%) influenced students' decisions to purchase commercial resources. In addition, students indicated they used commercially available resources to: manage study time (53.9 strongly agree), alleviate anxiety (36.5% strongly agree), and supplement the school's curriculum (57.1% strongly agree).

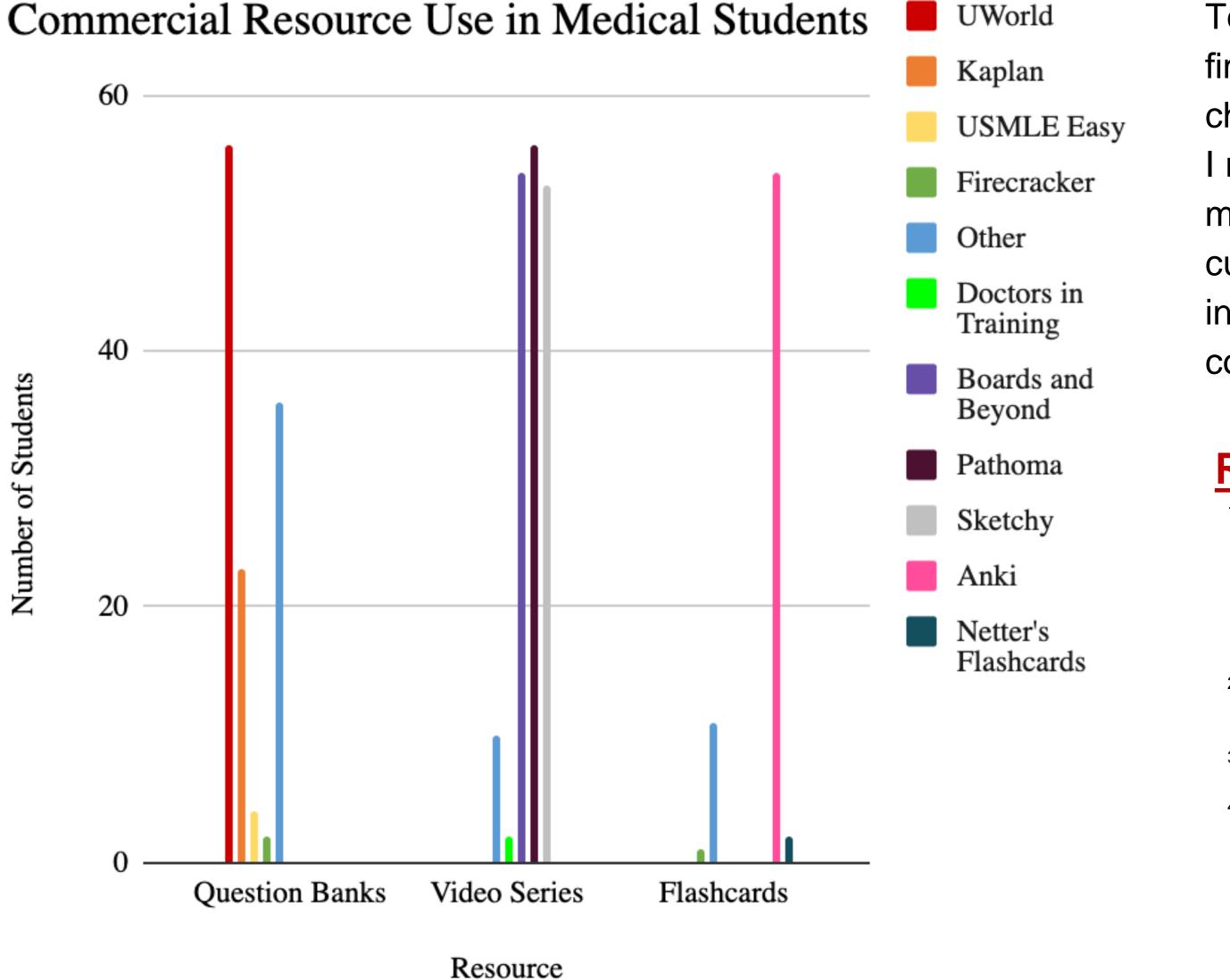
## CMSRU Curriculum and Step 1

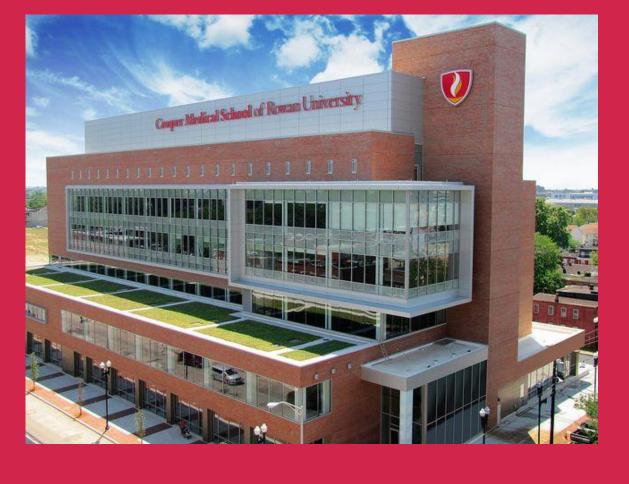




# Limitations

Our study has some limitations. The research was conducted in one medical school in New Jersey, where the majority of the students are from the state, which limits the diversity. The response rate was low at 27.8%, which may be due to the timing of the survey distribution. This study was conducted during the COVID-19 pandemic which has caused USMLE Step 1 test site closures and some third-year students having to delay their exam. The survey was originally intended for M1s and M2s before they took Step 1, but since survey distribution was delayed, the former M2s took the survey after they had taken their exam and had advanced to M3 year. This may have caused some recall bias, since the M3 class was recalling the commercial resources they had used in the past.





## **Discussion**

In the present study, we evaluated which commercial resources are used most often by medical students preparing for USMLE Step 1 and we assessed what motivates students to choose a particular resource. Our study indicates that 94% of medical students at Cooper Medical School of Rowan University use commercial resources in their preparation. We observed that most students (66%) start studying for Step 1 the summer after M1 year or the fall semester of their M2 year. Forty-three percent of students responded that they spend between \$601 and \$1000 on commercial resources to prepare for Step 1. This study is the first of its kind to identify student motivations in selecting commercial board preparation resources. Among the choices of price, peers, online forums, and faculty/learning support specialists/librarians, the highest ranked factor was peer influence.

## Conclusion

To the best of the authors' knowledge, this study is the first to identify factors that influence medical students' choices regarding the use of commercially available Step I resources. Among the choices, price, peers, management of study time and anxiety, as well as curriculum supplementation were all found to be influential factors in the decision to purchase and use commercially available Step I resources.

## **References:**

- 1. Burk-Rafel J, Santen SA, Purkiss J. Study Behaviors and USMLE Step 1 Performance: Implications of a Student Self-Directed Parallel Curriculum. Acad Med. 2017;92(11S Association of American Medical Colleges Learn Serve Lead: Proceedings of the 56th Annual Research in Medical Education Sessions):S67-S74 doi:10.1097/ACM.000000000001916Burk-Rafel J, Santen SA, Purkiss J. Study Behaviors and USMLE Step 1 Performance: Implications of a Student Self-Directed Parallel Curriculum. Acad Med. 2017;92(11S Association of American Medical Colleges Learn Serve Lead: Proceedings of the 56th Annual Research in Medical Education Sessions):S67-S74. doi:10.1097/ACM.000000000001916
- Kumar AD, Shah MK, Maley JH, Evron J, Gyftopoulos A, Miller C. Preparing to take the USMLE Step 1: a survey on medical students' self-reported study habits. Postgrad Med J. 2015;91(1075):257-261. doi:10.1136/postgradmedj-2014-133081
- Bhatnagar V, Diaz S R, Bucur P A (March 01, 2019) The Cost of Board Examination and Preparation: An Overlook
- 4. Parry, S., Pachunka, J. & Beck Dallaghan, G.L. Factors Predictive of Performance on USMLE Step 1: Do Commercial Study Aids Improve Scores?. Med.Sci.Educ. 29, 667–672 (2019). https://doi.org/10.1007/s40670-019-00722-4