

# Utilization of Smartphones for the Enhancement of Trauma Division of Education

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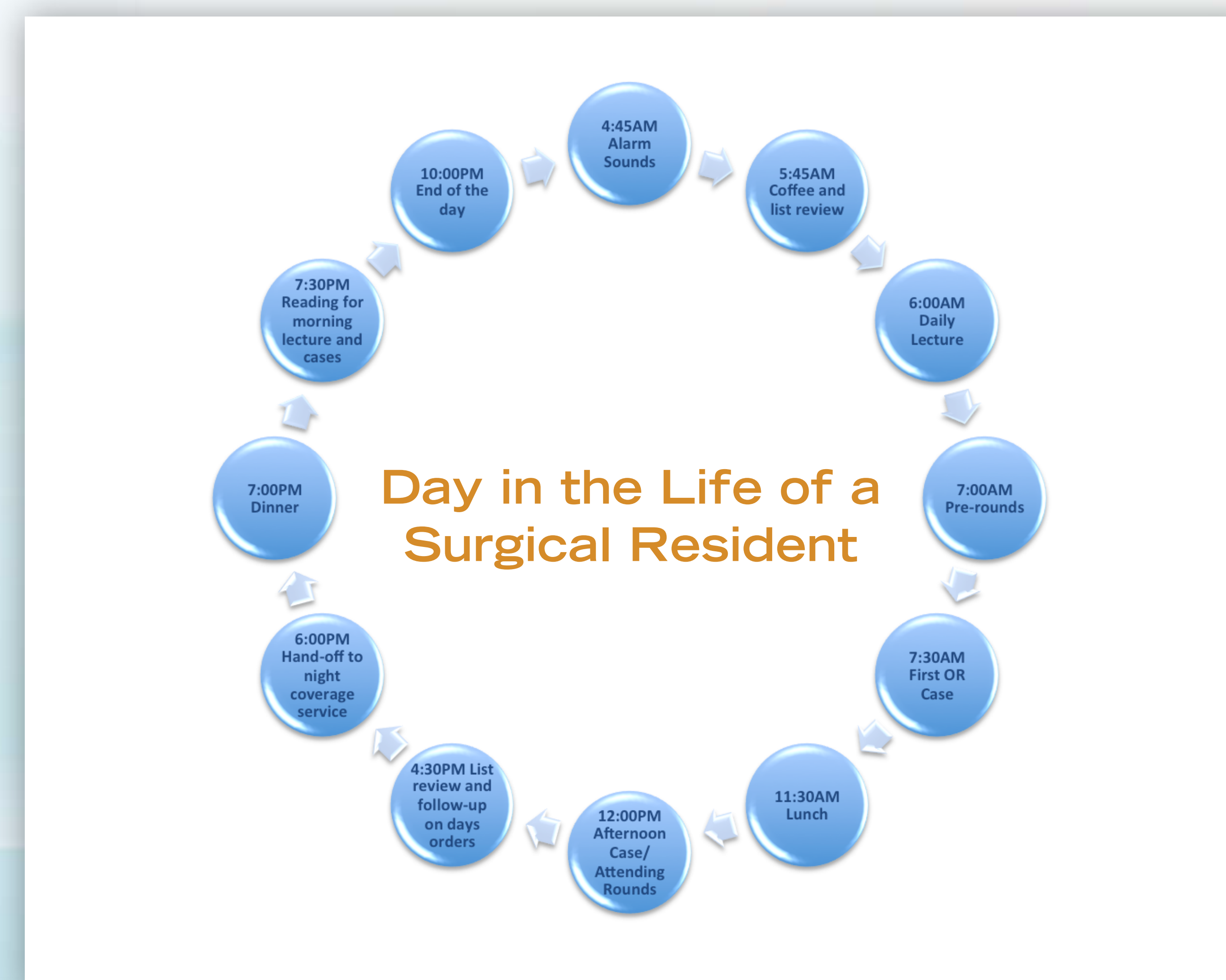
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# Utilization of Smartphones for the Enhancement of Trauma Education

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## INTRODUCTION:

Smartphones have become commonplace among professionals aged 25-29. This advancement in technology is paralleled by advances in medical technology. Changing technologies encompasses changes in education as well. The Halstedian method of surgical education may not be the ideal method during this era in medicine. Surgical education now involves simulation and competency testing within more strict hours limits. Below is a typical day in the life of a surgical resident.



A twelve hour day, 5 days a week is 60 hours of training. Add a day of call over the weekend and the hours approach the 80 hour per week limit set by the ACGME. There are multiple points during the week when residents have “downtown” in the hospital that is not consumed by patient care and scheduled education. Surgical Textbooks are bulky and carrying them from place to place is difficult to say the least. These critical moments are the targeted time for smartphone applications (apps). Smartphone apps are designed to be easy to use, quick to load, and high yield. The purpose of our study was to determine if smartphone apps have educational value based on evaluations by the end user.

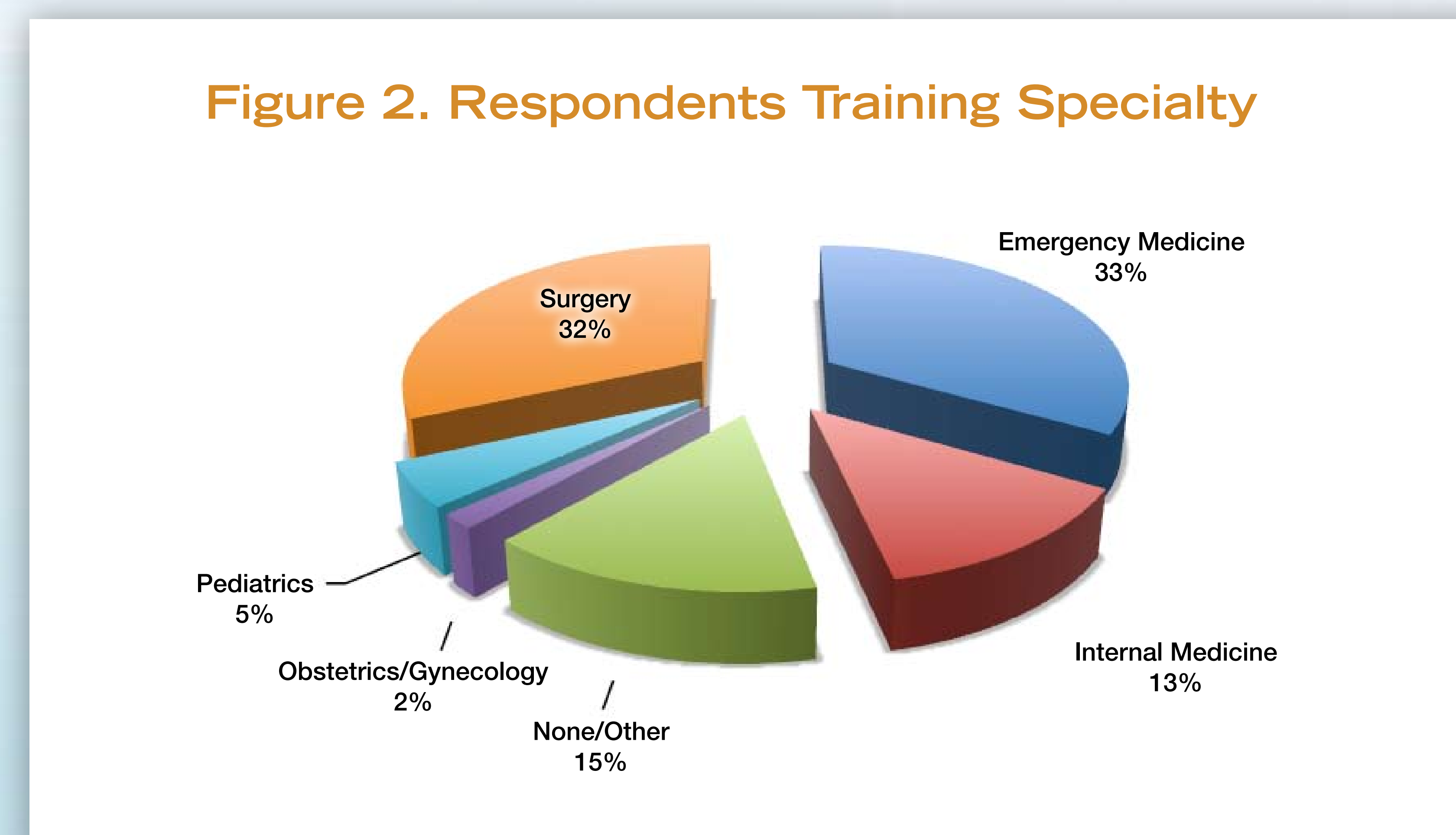
## METHODS:

A review of a voluntary survey that was included in the free iPhone/iPad application “Trauma Scenarios.” The application was developed by the Division of Trauma at Lehigh Valley Health Network by attending physicians and residents. The survey consisted of 4 demographic questions and 5 questions regarding the “Trauma Scenarios” application.

## RESULTS:

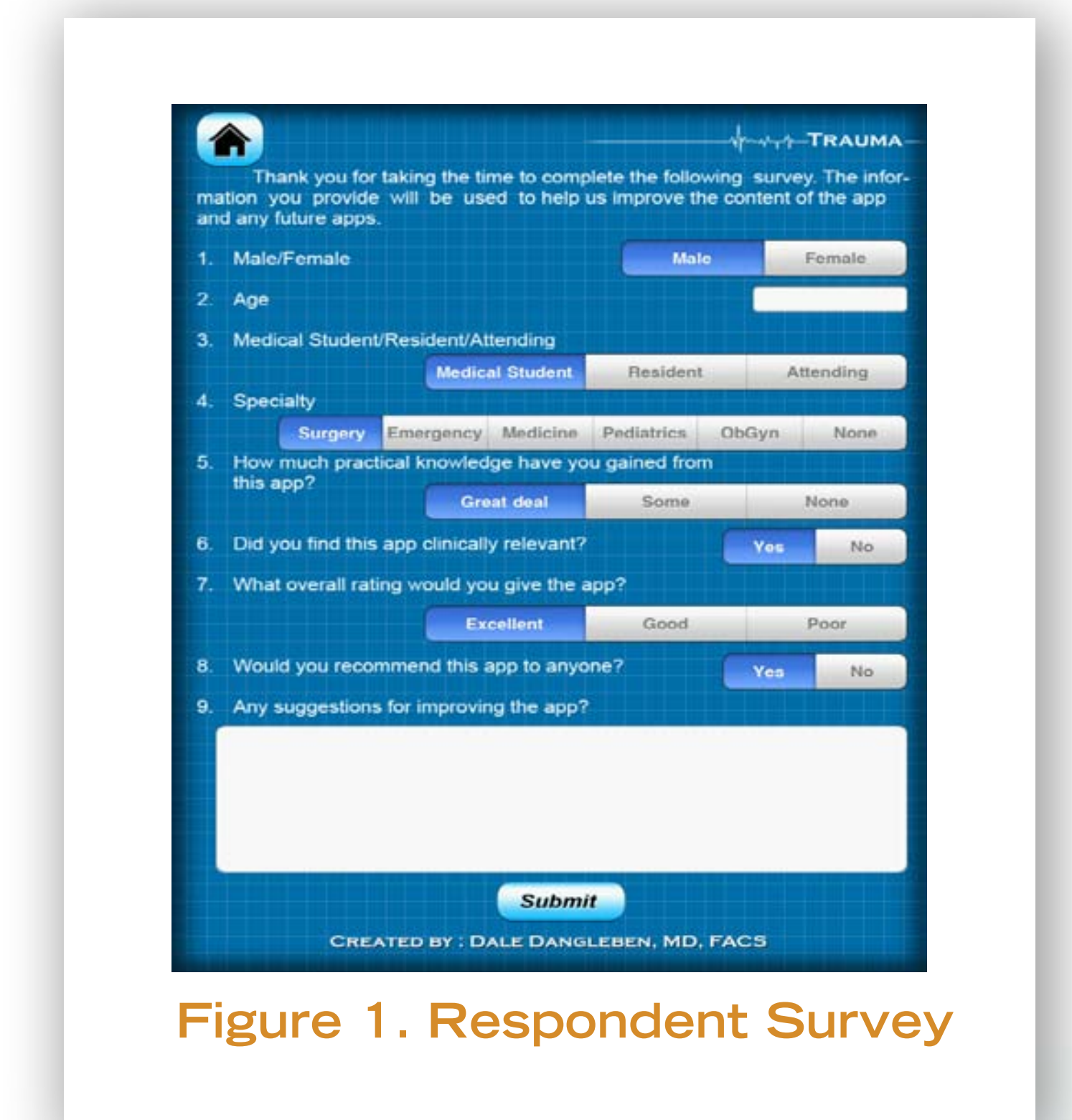
A total of 60 surveys were collected from 10,000 downloaded applications across 15 countries. Figure 1. is an example of the survey available to everyone who downloaded the app.

Sixty eight percent of respondents were male. The group was composed of attending physicians (40%), residents (24%), and medical students (33%). Figure 2. depicts the different specialties of the respondents who downloaded the free “Trauma Scenarios” app. Of those who responded, 68% gave an excellent rating and 32% gave a good rating. All but one respondent agreed that the app had clinical relevance and would recommend it to others in their field.



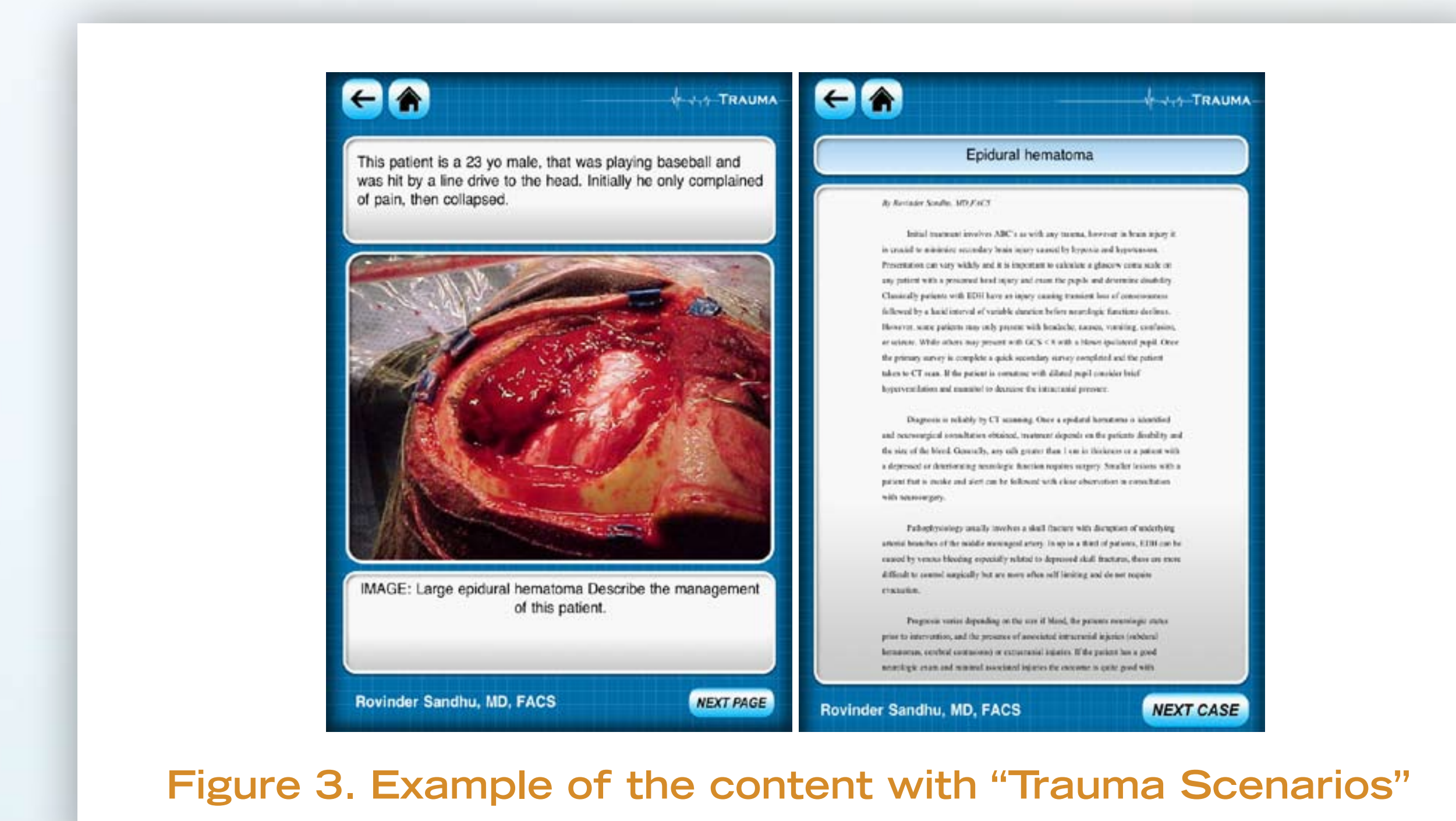
## CONCLUSIONS:

Smartphone applications have an evolving role in graduate medical education. Access to educational information must be high yield and easy to access. The “Trauma Scenarios” app meets these criteria and has received positive reviews from respondents across nationalities and specialties.



## WEAKNESS:

Despite over 10,000 downloads only 60 surveys were completed.



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