Incorporation of CASPer® Online Situational Judgment Test to Enhance the Holistic Admissions Process

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Stacey L. Fanning, PhD
Foundations of Osteopathic Principles

• One of the guiding principles of osteopathic medicine is to develop relationships of trust and to deliver patient care with empathy and humanism.

• Osteopathic medical schools strive to find applicants who will deliver compassionate care with the highest level of ethics and professionalism.

• Osteopathic Core Competencies
  • Osteopathic Philosophy and OMM.
  • Medical Knowledge.
  • Patient Care.
  • **Interpersonal and Communication Skills.**
  • **Professionalism.**
  • Practice-based Learning and Improvement.
  • System-based Practice.
How do we assess candidates:
What you’ve done

- MCAT
- GPA
- Leadership Qualities
- Service
- Research
- Clinical Exposure
How do we assess candidates:
Who you are

- Professionalism
- Ethics
- Empathy
- Compassion
- Communication
“When it comes to defining provider quality, most Americans tend to focus on certain aspects of quality relating to doctor-patient interactions and doctors’ personality traits, rather than the effectiveness of the care provided or the patient’s own health outcomes.”
Students with deficiencies in these positive personal attributes...

• Are a challenge to the osteopathic philosophy of the school

• Provide programs with the added responsibility of dealing with these students, who can become problematic and unprofessional

• May have poor performance in OSCEs and COMLEX PE

• May have negative consequences for academic programs; the hospitals and other sites where the students have their clinical rotations as well as the students in question.

• May have negative consequences in their care of patients
Medical School Admission Process Challenge
How to Assess Positive Personal Characteristics

• Personal statements
• Reference letters
• Interviews
• Holistic review

These traditionally used measures can be unreliable in assessing positive personal characteristics and professionalism.
Other Measures to Assess Personal Characteristics

• Multi-dimensional Emotional Empathy Scale (MDEES)
• Jefferson Scale of Empathy
• Emotional Intelligence Assessments
• Multiple Mini Interview (MMI)
• Situational Judgement Tests
GOAL

To incorporate an additional tool into the admissions process to help approach the challenges of accurately assessing the personal characteristics of our medical school applicants.
Online, situational judgement test that aims to measure personal characteristics such as:

- Ethics
- Empathy
- Humanism
- Communication
- Resilience
- Teamwork
- Professionalism
Objective

To evaluate the use of CASPer® online situational judgement test in the TouroCOM student admissions process.
CASPer® was introduced at TouroCOM-NY for the 2018-19 admissions cycle.

**Incorporating CASPer® into the Admissions Process**

- **Candidates for the DO program were required to take the CASPer® test as part of the secondary application process.**

- **Candidates were interviewed by the faculty using the current interview rubric.**

  - **Interviewers did not have access to the candidates CASPer® scores.**

  - **The Admissions Subcommittee incorporated the CASPer® score into the current holistic review process of the candidate.**

  - **Final recommendations on acceptance were made to the Dean.**
Evaluation of Outcomes

• Effect of the CASPer® requirement on application numbers and demographics.

• Correlation of CASPer® results with preadmission academic metrics.

• Comparison of CASPer® results to faculty interview rubric assessment.

• Survey data from applicants regarding their experiences and perceptions of the CASPer® tests.
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Findings/Result

Effect of the CASPer® requirement on application numbers and demographics.

• Total Applications have increased by 2.2%
• Total Secondary invitations increased by 2.9%
• Secondary Applications received increased by 2.7%
• Overall, CASPer requirement had no negative impact on total applications and no impact on applicant demographics when compared with the previous year.

<table>
<thead>
<tr>
<th></th>
<th>2017-18</th>
<th>2018-19</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hispanic</td>
<td>7.06% [157]</td>
<td>7.49% [175]</td>
</tr>
<tr>
<td>Black/African American</td>
<td>3.55% [79]</td>
<td>4.15% [97]</td>
</tr>
<tr>
<td>Asian</td>
<td>37.4% [831]</td>
<td>36.92% [863]</td>
</tr>
<tr>
<td>Native American</td>
<td>0.05% [1]</td>
<td>0.04% [1]</td>
</tr>
<tr>
<td>Pacific Islander</td>
<td>0.18% [4]</td>
<td>0.13% [3]</td>
</tr>
<tr>
<td>White</td>
<td>42.84% [952]</td>
<td>42.92% [1003]</td>
</tr>
<tr>
<td>Multi-racial</td>
<td>2.88% [64]</td>
<td>3.29% [77]</td>
</tr>
<tr>
<td>Declined to state</td>
<td>6.03% [134]</td>
<td>5.05% [118]</td>
</tr>
</tbody>
</table>
Evaluation of Outcomes

• Effect of the CASPer® requirement on application numbers and demographics.

• Correlation of CASPer® results with preadmission academic metrics.

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Findings/Result

Correlation of CASPer® results with pre-admission academic metrics

- \( n = 1545 \)

<table>
<thead>
<tr>
<th></th>
<th>Correlation Coefficient</th>
<th>P value</th>
</tr>
</thead>
<tbody>
<tr>
<td>MCAT CPBS</td>
<td>-0.01</td>
<td>0.60</td>
</tr>
<tr>
<td><strong>MCAT CARS</strong></td>
<td><strong>0.17</strong></td>
<td><strong>&lt;0.001</strong></td>
</tr>
<tr>
<td>MCAT BBFL</td>
<td>0.01</td>
<td>0.75</td>
</tr>
<tr>
<td>MCAT PSBB</td>
<td>0.13</td>
<td><strong>&lt;0.001</strong></td>
</tr>
<tr>
<td>MCAT Total</td>
<td>0.12</td>
<td><strong>&lt;0.001</strong></td>
</tr>
<tr>
<td>Overall uGPA</td>
<td>0.03</td>
<td>0.20</td>
</tr>
<tr>
<td>Science uGPA</td>
<td>0.00</td>
<td>0.92</td>
</tr>
</tbody>
</table>
Findings/Result

• Critical Analysis and Reasoning Skills (CARS)
  • Tests comprehension, analysis, and reasoning skills by asking exam-taker to critically analyze information provided in passages
  • Includes content from ethics, philosophy, studies of diverse cultures, population health, and a wide range of social sciences and humanities disciplines
  • 49% of all applicants with Negative CASPer scores had CARS alone as their lowest scoring MCAT section.
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Current TouroCOM Interview Rubric

In addition to GPA and MCAT scores our current rubric addresses the following non-academic criteria and are given a numerical value.

• Motivation for Osteopathic Medicine
• Consideration for Primary Care
• Insight on Health Disparities
• Community Service
• Interpersonal / Communication Skills
• Cultural Awareness
• Critical Thinking
Findings /Results

- Total interview rubric scores were averaged from the 2 interviewers and assessed for correlation with the candidates CASPer score.
- A slight correlation was found between CASPer & interview scores $[r = .09, p = .08, n = 719]$. 
- This perhaps supports that the CASPer is perhaps assessing the candidate in a different way than the traditional interview.
Findings/Results

Data comparing CASPer® results to faculty acceptance recommendation based on interview.

- 60% of applicants with positive CASPer® results received double accept decisions.
- 49% of applicants with negative CASPer® results received double accept decisions.
Findings /Results

• Admissions recommendations were submitted to the Dean by the Admissions Committee based upon holistic review of applicants AACOMAS application and interview rubrics.

• The average CASPer scores were calculated for interviewed candidates in each decision category (accept, waitlist, reject).

<table>
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<tr>
<th>Decision</th>
<th>Average CASPer Score</th>
<th>Average Interview Score</th>
<th>Number of Decisions</th>
</tr>
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<tbody>
<tr>
<td>Accept</td>
<td>0.153</td>
<td>74.071</td>
<td>358</td>
</tr>
<tr>
<td>Waitlist</td>
<td>0.099</td>
<td>69.275</td>
<td>144</td>
</tr>
<tr>
<td>Reject</td>
<td>-0.156</td>
<td>60.517</td>
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Finding / Results

- Current student 1\textsuperscript{st} and 2\textsuperscript{nd} year DO students, as well as deposited accepted applicants were asked to report their experiences with the CASPer test.
- We received 192 responses out of 720 surveys sent out.

How many medical schools you applied to included the CASPer test as an admission requirement?

![Graph showing the distribution of medical schools including CASPer test as an admission requirement.](image)
## Finding / Results

We wanted to assess if applicants understood what the CASPer test was assessing and if they felt it actually did stress those aspects.

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<thead>
<tr>
<th>Statement</th>
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<td>I understood what the CASPer test was assessing.</td>
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Here we wanted to assess if candidates were putting effort into performing well on the CASPer test.
Finding / Results

• 2/3 of the respondents agreed or strongly agreed that they understood what the test was assessing.

• About 60% of respondents felt the scenarios were thought-provoking and emphasized professionalism and empathy.

• A similar percentage stated they were motivated to perform to their best ability.
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About ½ of the respondents felt that there was not enough time provided to answer the test questions fully.
Finding / Results

Please provide us with any other feedback regarding your experience with the CASPer® test:

• Most comments focused on time provided to answer each question
• Several test-takers commented on the added cost, however less than ¼ of respondents indicated that the cost of the test was outside the range of their budget
• A few candidates commented on not getting to know how they performed
Conclusions

• Requirement of CASPer® into the TouroCOM Admissions process had no impact on the number of applicants or applicant demographics.

• When looking at CASPer® score against MCAT subsections, the section with the strongest association was the CARS subsection.

• Faculty interview decisions did not always reflect CASPer® scores. When reviewed by subcommittee it was found that approximately 49% of the “Double Accepts” had a negative CASPer® score.

• However, average CASPer® score aligned with average interview score and final admissions decisions.

• Overall, most of the survey respondents had neutral to positive experiences with CASPer®. Time provided to answer the questions appeared to be an issue with many test-takers.
Future Directions/ Implications

• CASPer® and issues of professionalism
• CASPer® and its correlation with performance on OSCE exams/clinical courses
• CASPer® as a predictor of COMLEX PE performance on the Humanistic Domain
• CASPer® in relation to various candidate demographic factors including, including English as a second language
• CASPer® in relation to various candidate educational backgrounds and majors
• CASPer® and its weight in the selection of candidates from the wait list
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Questions