

Situational Judgement Tests

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SJTs

- Why
- What they are
- The evidence behind them
- How we have been using them
- Future applications
- Questions



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Why SJTs?

- Despite the importance of measuring noncognitive competencies related to professionalism, few tools have been developed to measure noncognitive competencies in residency
- Many programs heavily rely on USMLE test scores, LORs, previous academic achievement, and MSPE.
- These assessments primarily predict performance on future tests and give little information about the qualities of each candidate that are likely predictive of a competent clinical anesthesiologist



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Why SJTs?

- Broad consensus regarding the need to assess professionalism and interpersonal skills in residency applicants
 - Professionalism includes traits such as ethical principles, accountability, self-awareness, effective interactions with patients and coworkers, and a drive for continuous self-improvement.



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Why SJTs

- The importance of assessing professionalism and interpersonal skills in physicians is reinforced by their inclusion in physician assessment frameworks
 - AAMC's Core Entrustable Professional Activities for Entering Residency
 - ACGME's educational milestones in the Next Accreditation System .



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What are SJTs?

- SJTs are a measurement method that can be used to measure a wide variety of psychological constructs
- Present respondents with a job-relevant situation or scenario and ask them to choose the best way of responding.
- The method of scenario presentation varies
 - Both written and video-based formats.
- SJTs are a popular measurement method in employment and organizational settings due to their high criterion-related validities, positive applicant reactions, and small subgroup differences relative to more cognitively loaded measures



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The Evidence

- Evidence suggests SJTs are useful predictors of short- and long-term outcomes in physicians.
 - Lievens et al. found that an interpersonally-oriented SJT used for medical school selection predicted medical school GPA, internship performance, and job performance over a 7-year period
 - Other studies have demonstrated that interpersonally-oriented SJTs predict diverse training outcomes
 - in-training performance, end-of-training performance, supervisory ratings of performance, and OSCEs.

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The Evidence

- Cullen et al. (2020) developed and validated an SJT to measure seven dimensions of professionalism and interpersonal skill
- Found that their SJT predicted overall ACGME milestone performance and performance on an independent measure of professionalism (MPA) created for the study
- In addition, the SJT score contributed incremental validity over USMLE scores in predicting overall ACGME milestone performance one year later and MPA performance three months later.

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The Evidence

- In preliminary analyses, this SJT has also proven useful in predicting the need for remediation.
- In a multi-institutional, multispecialty study Cullen et al. (2021) found that a 1 standard deviation increase on the SJT reduces the probability of a resident experiencing any professionalism issues by 39% at mid-year.
- Similarly, a 1 standard deviation increase on the SJT reduces the probability of a resident needing active remediation at mid-year by 51%.

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How we are using SJTs

- Every interviewed applicant (120) completes SJT on interview day
- We then weighted SJT results as a component of rank list (33%)
- Matched applicants and program received full SJT report for debrief

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Future plans

- If we find significant differences between residents who performed well on the SJT and those who were average, we may consider increasing the weight of the SJT in our process.
 - This may be helpful especially in the current environment with the USMLE moving toward a P/F reporting system
- Annual debrief with individual resident on SJT results and incorporation into overall residency evaluation/milestones

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Future plans

- Residents in the cohort will be exposed to SJTs every year of the residency to assess incremental improvements in the evaluation of parameters not tested in the AKTs and Part I and Part II ABA examinations.
- We further intend to follow the 10 matched residents for their performance on Milestones throughout the 4 years of residency to determine how residents' performance correlates with SJT scores

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Potential Problems

- Cultural and socioeconomic bias
 - Western standards, non-native English speakers



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Thank You!



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