Performance Variation in Assessment Center Business Simulations

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Managers are not confronted with problems that are independent of each other, but with dynamic situations that consist of complex systems of changing problems that interact with each other. I call such situations messes. Problems are abstractions extracted from messes by analysis; they are to messes as atoms are to tables and chairs. We experience messes, tables, and chairs; not problems and atoms.... Managers do not solve problems: they manage messes.

(Ackoff, 1979, pp. 99-100)
## Performance Variation

<table>
<thead>
<tr>
<th>Competency</th>
<th>First Simulation</th>
<th>Last Simulation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Competency 1</td>
<td>2.5</td>
<td>3.5</td>
</tr>
<tr>
<td>Competency 2</td>
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<td>4.0</td>
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<tr>
<td>Competency 3</td>
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<td>4.0</td>
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<td>Competency 4</td>
<td>2.5</td>
<td>4.5</td>
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<td>Competency 5</td>
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“The Paradox”

- Multitrait-multimethod (MTMM) reveals “the paradox”

- Assumptions

- Interpretation

<table>
<thead>
<tr>
<th></th>
<th>Interview</th>
<th>Testing</th>
<th>In-basket</th>
<th>Direct Report Meeting</th>
<th>Peer Meeting</th>
<th>Competency Average</th>
</tr>
</thead>
<tbody>
<tr>
<td>Comp 1</td>
<td>3.0</td>
<td>2.5</td>
<td>2.5</td>
<td>2.0</td>
<td>3.5</td>
<td>2.70</td>
</tr>
<tr>
<td>Comp 2</td>
<td>2.5</td>
<td>3.0</td>
<td>2.0</td>
<td>2.0</td>
<td>4.0</td>
<td>2.70</td>
</tr>
<tr>
<td>Comp 3</td>
<td>3.5</td>
<td>3.0</td>
<td>2.0</td>
<td>2.5</td>
<td>4.0</td>
<td>3.00</td>
</tr>
<tr>
<td>Comp 4</td>
<td>3.5</td>
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<td>2.5</td>
<td>3.0</td>
<td>4.5</td>
<td>3.40</td>
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<tr>
<td>Comp 5</td>
<td>4.0</td>
<td>3.5</td>
<td>2.0</td>
<td>3.0</td>
<td>3.5</td>
<td>3.20</td>
</tr>
</tbody>
</table>
Consider what work might feel like to these individuals. Through such reflection, we may better recognize that work not only means different things to different people, it is also experienced quite differently owing to the specific objectives for which it is performed.

What would a thoroughly person-centric examination of work be like? What would an examination be like that took as its starting point the rejection of the treatment of people as objects in organizational systems in favor of a full and focused appreciation of the individual at work, his or her thoughts and feelings and behaviors? What would be the result of the rejection of a justification for research based on application and collective purpose and the substitution of a justification based entirely on understanding human work experience?

I-O psychology is nomothetically oriented

Objectification of participants

Power, “experts,” and I-O psychologists

There is variation

Quantitative research insufficient

ACs are a-theoretical
Conclusions

- Deconstruct the current AC narrative
- Focus on the individual
- Bring participants into the conversation
- Increase understanding of variation
- Improve quality of AC methodology
What are the possible reasons for variation in assessment center (AC) simulation scores?
Research Method

Explanatory Sequential Mixed Method
Creswell & Plano Clark, 2011

Research Design

- Test for mean variation among “methods”
- Create the simulation vector (simvec)
- Purposive sample of outliers
- Co-researchers’ individual descriptions
- Assessors’ descriptions
- *Explain* the quantitative results with qualitative interviews from theoretical perspectives
Phase I
Quantitative Results
Description of the Population N = 2,968
Description of the Population n = 407
Standardize Scores

The graph illustrates the mean simulation rating for 2011 participants across different scenarios: Behavioral Interview, Testing, In-basket, Direct Report, and Peer Meeting. Each bar represents the average rating with error bars indicating variability.
Simvecs for the population N = 2,968
Simvecs for the Population n = 407
**Purposive Sample**

Outliers are potential co-researchers
Invitations Sent

- $n = 407$ from year 2011
- 10% of $n = $purposive sample $= 41$
- $\text{Simvec} \geq 95\% = 20$ potential co-researchers
- 8 (40%) accepted $= 57\%$ of co-researchers
- $\text{Simvec} \leq 5\% = 21$ potential co-researchers
- 6 (29%) accepted $= 43\%$ of co-researchers
Figure 6. Co-researchers with positive simulation vectors (simvecs)
Negative Simvecs
6 Co-researchers

Figure 7. Co-researchers with negative simulation vectors (simvecs)
The Importance of Listening

Quantitative research has not sufficiently explained empirical incidences of variation.
Possible Theoretical Explanations
Theories From The Literature Review

- Reflective thinking theories
- Whole person theories
- Discriminative facility theories
- Interaction theories
- Knowledge and appraisal model of personality architecture (KAPA)
- Opportunity, time, importance, urgency, and means (OTIUM)
- Impression management (IM)
Theoretical Explanations

- Positive Simulation Vectors
- Negative Simulation Vectors
- Intrinsic Motivation
- Experiential Learning Theory
- Cognitive Affective Personality System (CAPS)
- Knowledge & Appraisal Model of Personality Architecture (KAPA)
Is this a satisfactory explanation for positive and negative simvecs?
All co-researchers experienced stress
**Intrinsic Motivation Theory**

- A drive from within the individual rather than from external sources.
- Reflects a focus on that which one feels she or he *can* influence. Thus...
- Allows them to achieve their goals.
Explaining Positive & Negative Simvecs

- Intrinsic motivation - what one can influence, skills that help “manage the mess.”
- Growth: Incremental theory - Positive simvecs
- Fixed: Entity theory - Negative simvecs

Incremental Theory

Growth
Self-mastery
Learning goals

7 of 8 (88%) returned for coaching, average 1.3 visits

Entity Theory

Fixed
Learned helplessness
Performance goals
2 of 6 (33%) returned for coaching, average 1.0 visit

Andragogy

- Adults need to know why they are learning
- Self-concept of responsibility for their life
- Prior experience of the adult learner
- The adult is ready to learn
- Learning is life centered
- Intrinsic motivation to learning
Explanation

- Positive simvecs and intrinsic motivation
- Positive simvecs and incremental theory
- Negative simvecs and entity theory