Strategizing Beyond Individual Cases of Bias

Laura W. Perna, Vice Provost for Faculty

November 2, 2022

With valued input from Dr. Carmen Guerra, Lead DSA, PSOM
Topics for Today

Need for:

• Intentional attention to how bias can influence faculty search processes
• Recognizing problematic practices
• Advancing strategies for reducing bias and increasing diversity and inclusion
We Are Making Progress – And – More Progress is Needed

Trends in Representation of Females and ABHI Among Penn’s Standing Faculty

Between 2011 and 2021, the number of female standing faculty increased by 36% (777 to 1,053) and the number of BHI standing faculty increased by 63% (158 to 258), while the total standing faculty increased by 9% (2,531 to 2,749).
# Penn’s Diversity Dashboard

[https://ira.upenn.edu/penn-numbers/diversity-dashboard](https://ira.upenn.edu/penn-numbers/diversity-dashboard)

## Penn Community
### Representation by Sex and Race/Ethnicity
**Annenberg, GSE, Law, SAS, SEAS, SP2, Weitzman, Wharton**

<table>
<thead>
<tr>
<th>Select a Academic Year</th>
<th>Select Area</th>
<th>Race/Ethnicity Group</th>
<th>Race/Ethnicity Detail (IPEDS)</th>
</tr>
</thead>
<tbody>
<tr>
<td>AY 2022</td>
<td>Annenberg, GSE, Law, SAS, SEAS, SP2, Weitzman, Wharton</td>
<td>Race/Ethnicity Group</td>
<td>Race/Ethnicity Detail (IPEDS)</td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>Gender</th>
<th>Traditional Undergraduates</th>
<th>Other Undergraduates</th>
<th>Graduate &amp; Professional Students</th>
<th>Postdoctoral Affiliates</th>
<th>Standing Faculty</th>
<th>Associated Faculty</th>
<th>Staff</th>
</tr>
</thead>
<tbody>
<tr>
<td>Female</td>
<td>1,938 (20.2%)</td>
<td>217 (19.3%)</td>
<td>1,438 (11.4%)</td>
<td>45 (9.5%)</td>
<td>121 (12.0%)</td>
<td>15 (10.9%)</td>
<td>589 (17.5%)</td>
</tr>
<tr>
<td>Male</td>
<td>2,778 (29.0%)</td>
<td>149 (13.2%)</td>
<td>1,894 (15.1%)</td>
<td>84 (17.8%)</td>
<td>162 (16.1%)</td>
<td>16 (11.7%)</td>
<td>2,361 (70.1%)</td>
</tr>
</tbody>
</table>

- **International Citizen**: 3,572 (37.2%) in Traditional Undergraduates, 559 (49.6%) in Other Undergraduates, 4,649 (37.0%) in Graduate & Professional Students, 207 (43.8%) in Postdoctoral Affiliates, 723 (71.9%) in Standing Faculty, 106 (77.4%) in Associated Faculty, 2,361 (70.1%) in Staff.

- **Gender Distribution**: 4,586 (47.8%) Female, 5,005 (52.2%) Male.

- **Race/Ethnicity Groups**: BHI, Asian Am, White/Other/Unknown.
Diversity Search Advisors

**Responsibilities**

- Ensure that faculty search processes are broad, inclusive, and designed to bring outstanding professors to Penn
- Ensure that Penn meets its federal regulatory affirmative action obligations

**Requirements**

- Tenured members of the Standing Faculty
- Serve a minimum two-year term
- Keep up to date with bias education, every three years at a minimum**
- Certify that they, or DSA designee, were involved in the many aspects of the search

**All faculty on search committees are expected to complete bias training at least once every three years.**
Bias Training for 2022-23

Asynchronous Bias Training Course

- Interactive, with scenarios that reflect situations that occur during faculty searches and other aspects of faculty work
- Developed by faculty at the University of New Hampshire with funding from the National Science Foundation

To register: https://upenn.co1.qualtrics.com/jfe/form/SV_1zVTZI7egivX0GO

In-Person Bias Training Workshops

- Advancing Equity and Excellence through Rubrics and Other Evaluation Tools
  Wednesday, October 19, 10:15 am – 11:45 am, Houston Hall 223-Golkin Room

- Strategizing Beyond Individual Cases of Bias
  Wednesday, November 2, 10:15 am – 11:45 am, Houston Hall 223-Golkin Room
Examples of Cognitive Bias in Academic Workplace

- Confirmation bias
- Similarity effect
- Anecdotal fallacy
- Categorical thinking

Behaviors to Intervene

- Address the process
- Educate the offender
- Introduce factual information

More Scenarios and Approaches

- Faculty search
- Faculty peer evaluation
- Faculty meetings
- Casual interactions
Cognitive Shortcuts Can Result in Bias

Types of Cognitive Bias

**Similarity Effect Bias** occurs when we imagine people or things we are familiar with as better.

**Confirmation Bias** is when we actively seek or are drawn to details that confirm our existing beliefs.

**Anecdotal Fallacy** occurs when we find stories and causal patterns based on very small sample sizes; assuming that if something happened a particular way once, it must always be that way.

**Categorical Thinking** occurs when we wrongly assume that an individual possesses characteristics based on a group to which we think they belong.

Source: University of New Hampshire, IncludeU
https://www.unh.edu/includeu/about/about
Bias Can Influence Every Phase of the Faculty Search Process

Phase 1
Framing the Position, Forming the Committee
- Job advertisement
- Committee membership

Phase 2
Marketing, Outreach, Recruitment
- Placement of ads
- Networks used to encourage applications

Phase 3
Evaluating Candidates
- Reference letters
- CVs
- Teaching evaluations
- Writing samples
- Interviews

Phase 4
Short Lists, Finalists, Appointment
- Perceptions of candidate’s potential, rigor, leadership, fit
- Job talks and other hiring practices
- Committee discussion on final decision
Bias in Reference Letters

Study of 312 recommendation letters for faculty hired at a major US medical school

Letters for women:
- Are shorter, less focused on record of accomplishment
- Had more gender terms “intelligent young lady,” “insightful woman.” There were no equivalent descriptors in men’s letters
- Showed less professional respect – first name for women, titles for men

<table>
<thead>
<tr>
<th>Components/Language in the letter</th>
<th>Males (222)</th>
<th>Females (89)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Standout adjectives(^1)</td>
<td>2.0/letter</td>
<td>1.5/letter</td>
</tr>
<tr>
<td>Grindstone adjectives(^2)</td>
<td>23%</td>
<td>34%</td>
</tr>
<tr>
<td>Doubt raisers(^3)</td>
<td>12%</td>
<td>24%</td>
</tr>
<tr>
<td>Reference to personal life</td>
<td>1%</td>
<td>6%</td>
</tr>
<tr>
<td>Multiple mentions of research</td>
<td>62%</td>
<td>35%</td>
</tr>
<tr>
<td>Accomplishments/Achievements</td>
<td>13%</td>
<td>3%</td>
</tr>
<tr>
<td>References to publications</td>
<td>13%</td>
<td>3%</td>
</tr>
<tr>
<td>Successful</td>
<td>7%</td>
<td>3%</td>
</tr>
</tbody>
</table>

1 “excellent,” “outstanding,” “superb,” “unique”
2 “hardworking,” “conscientious,” “dependable,” “thorough,” “dedicated,” “careful,” and “meticulous”
3 negative language, unexplained comments, faint praise and irrelevancies

Gender Differences in “Doubt Raisers” in Reference Letters

**Study 1**
- 624 letters written for 174 men and women applying for 8 assistant professor positions in psych department
- Letters for women more commonly had doubt raisers (hedging, negatively, faint praise) even after controlling for number of publications

**Study 2**
- 305 professors’ assessment of applicants’ competence
- Regardless of gender, applicants evaluated lower on research skills if negativity or hedging in letters

Mitigating Bias

Although unconscious bias training raises awareness about the impact of bias, studies show that training does not lead to changes in behavior.

Bias can only be mitigated by design.

Change the process, not people.

How can we change the process to mitigate bias associated with letters of reference?
Strategies for Mitigating Bias Associated with Reference Letters

- Reduce weight given to letters of recommendation
- Review other application materials before asking for letters of reference
- Provide a structure for reference letters (e.g., prompts)

Faculty Search Scenarios:
Scenario 1: Will he leave?

Part 3: More Scenarios and Approaches to Intervening

Faculty Search Scenario 1

Sharon Tobin, Associate Professor
Miles Lindsay, Full Professor
Jordan Jenks, Assistant Professor
Soledad Gonzalez, Full Professor

Source: University of New Hampshire, IncludeU [https://www.unh.edu/includeu/about/about](https://www.unh.edu/includeu/about/about)
Intervention Behaviors

When you witness bias incidents, it is important that you intervene to mitigate the negative effect of the incident on its target, on other witnesses, and on the organization as a whole. There are many ways to intervene, and you can choose to respond directly or indirectly and immediately or in a delayed manner, after the incident. Below are types of intervention behaviors that vary along those lines. Depending upon your own preferences, as well as your own position within your department or organization, certain behaviors will feel more comfortable to you than others.

**Highest Risk** (Direct and usually immediate but can be delayed)

- Confronting the offender (e.g., Pointing out the biased behavior)
- Censoring (e.g., Telling offender that the behavior is inappropriate)
- Educating (e.g., Informing the offender why an attitude or behavior is inappropriate)
- Disagreeing (e.g., Disagreeing with the statement by stating the opposite)
- Appealing to shared values (e.g., Stating that the behavior is not consistent with shared values)
- Arousing dissonance (e.g., Stating that the behavior is not consistent with the offender’s values)

**Medium Risk** (Indirect and usually immediate)

- Introducing factual information (e.g., Providing contradicting evidence)
- Sharing your own experience (e.g., Sharing your own experience as a target of bias)
- Pivoting (e.g., Interrupting the incident to stop the problematic behavior)
- Amplifying (e.g., Stating that someone has already made the suggestion)
- Clarifying (e.g., Clarifying what the offender was trying to say)

**Lowest Risk** (Indirect and usually delayed)

- Seeking support (e.g., Speaking to a trusted senior colleague or person in authority after the fact)
- Supporting the target (e.g., Asking the target how they feel about the incident)
- Expressing harm (e.g., Stating how a behavior made you feel)
- Addressing the process (e.g., Suggesting or making a change to the process to make it more objective)
- Addressing the environment (e.g., Ensuring the physical environment is inclusive)

Source: University of New Hampshire, IncludeU  [https://www.unh.edu/includeu/about/about](https://www.unh.edu/includeu/about/about)
Course Part 3 - Which of the intervention behaviors below would you be most likely to use in similar situations (choose all that apply)?
After you view each of the scenarios in Part 3 of the Bystander Intervention course use this worksheet to document your answers. Remember to opt for interventions that involve a degree of risk commensurate with your standing in the group. Reference the Intervention Behaviors high, medium and low risk areas in the takeaway guide, page 2.

<table>
<thead>
<tr>
<th>LOW RISK</th>
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<th></th>
<th></th>
<th>HIGH RISK</th>
</tr>
</thead>
<tbody>
<tr>
<td>Support the Target</td>
<td>Addressing the Process</td>
<td>Seeking Support from a Trusted Colleague</td>
<td>Expressing Harm</td>
<td>Amplifying</td>
<td>Pivoting</td>
<td>Sharing Your Own Experience</td>
<td>Clarifying the Policy</td>
</tr>
</tbody>
</table>

**Faculty Search Setting**
- Scenario 1: Will He Leave?
- Scenario 2: She Won't Fit In!

**Faculty Peer Evaluation Setting**
- Scenario 1: Bias in Teaching Evaluations
- Scenario 2: Shifting Standards for Evaluation

**Faculty Meeting Setting**
- Scenario 1: Getting Your Voice Heard
- Scenario 2: Misappropriation of Ideas

**Casual Interaction Setting**
- Scenario 1: False Attribution of Success
- Scenario 2: Being Excluded Based on Gender

Now, look back at page 2 of this guide to evaluate whether your chosen intervention behaviors above tend to correlate with a particular level of risk.

Source: University of New Hampshire, IncludeU [https://www.unh.edu/includeu/about/about](https://www.unh.edu/includeu/about/about)

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Faculty Search Scenarios: Scenario 1: Will he leave?

Intervention Behaviors

Faculty Search Scenario 1: Will He Leave?

Educating the Offender
Introducing Factual Information
Addressing the Process

Source: University of New Hampshire, IncludeU https://www.unh.edu/includeu/about/about
Faculty Search Scenarios: Scenario 2: She Won’t Fit In

Part 3: More Scenarios and Approaches to Intervening

Faculty Search Scenario 2

- Sam Baumgarten, Associate Professor
- Margaret Parker, Full Professor
- Michael Milano, Associate Professor
- AJ Callahan, Associate Professor

Source: University of New Hampshire, IncludeU https://www.unh.edu/includeu/about/about
Faculty Search Scenarios:
Scenario 2: She Won’t Fit In

Intervention Behaviors

Faculty Search Scenario 2: She Won’t Fit In

Pivoting

Speaking to the Offender in Private

Sharing Your Own Experience

Source: University of New Hampshire, IncludeU https://www.unh.edu/includeu/about/about
## How To Combat Bias in Faculty Search Processes

- Explicitly discuss the role of bias at the start of search proceedings
- Establish a clear set of baseline practices and expectations
- Standardize practices and use same practices for all candidates
- Build-in opportunities to do ‘bias checks’ throughout the process
- Give candidate statements related to contributions toward diversity and equity the same level of evaluation and rigor as statements on research and teaching
- Consider the climate of your department and address issues

Source: [How to make the faculty hiring process more equitable and effective](https://www.duke.edu). Duke University. (January 2021).
Applicant Evaluation Tool (example)

Please indicate which of the following are true for you (check all that apply):

- [ ] Read applicant’s CV
- [ ] Read applicant’s statements (re research, teaching, etc.)
- [ ] Read applicant’s letters of recommendation
- [ ] Read applicant’s scholarship (indicate what): __________________________

Please rate the applicant on each of the following:

<table>
<thead>
<tr>
<th>Evidence</th>
<th>strong</th>
<th>moderate</th>
<th>weak</th>
<th>none</th>
<th>unable to judge</th>
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<tbody>
<tr>
<td>Evidence of scholarly productivity commensurate with career stage and norms for subfield</td>
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<tr>
<td>Evidence of (potential for) scholarly impact</td>
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<tr>
<td>Evidence of strong background in [relevant fields]</td>
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<tr>
<td>Evidence of (potential for) teaching effectiveness</td>
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<td>Potential to teach courses in desired areas</td>
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<tr>
<td>Evidence of (potential for) effective collaboration with others</td>
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<td>Evidence of (interest in and commitment to) teaching/mentoring/training students of diverse backgrounds</td>
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<tr>
<td>Evidence of effectively mentoring undergraduate or graduate students</td>
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<tr>
<td>Evidence of DEI activities in professional roles</td>
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<tr>
<td>Potential for positive contributions to unit climate</td>
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<tr>
<td>Evidence of service activities that contribute to unit/institution/profession</td>
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</tbody>
</table>

Source: advance.umich.edu/resources/candidate-evaluation-tool.docx
Questions to Consider in Developing a Rubric

- What are the requirements of this position?
- What is the relative weight that should be given to each requirement?
- What types of evidence demonstrate past achievement, and promise of future achievement, in each area?
- Are any of the requirements ambiguous?
- How do the requirements and types of evidence incorporate Penn’s commitment to diversity, equity and inclusion?
Standardized Interview Questions (examples)

Introductory Questions
- Please take just a few minutes to tell us a little about yourself and how your background, experiences and pursuits have prepared you for this position?
- What attracts you to this position?

Research
- What research agenda would you like to carry if you become a member of this department?
- What types of resources would you require to successfully continue your research agenda?
- With whom would you like collaborate, if you were selected for this position?

Teaching
- Tell us about your teaching methods, philosophy and goals.
- What is your experience in teaching students of diverse backgrounds? What methods have proven to be effective and what have you learned from the experience?
- Describe strategies that you have used to create an inclusive learning environment for your students.
- Tell us about a time when you successfully managed a difficult student and a time when you did not successfully manage a difficult student.
- What have evaluations for your teaching indicated, both positive and negative? How has evaluation feedback changed how to teach today?

Source: UC Davis
https://health.ucdavis.edu/facultydev/pdfs/searchmaterials/SampleFacultyInterviewQuestions.pdf
Case for Discussion

As chair of a search for an assistant professor, you worked with the committee to create an “applicant evaluation tool.” Your committee is now ready to review applications. But, you see there are 300 applications. What do you do? Do you use the “evaluation tool”? 
Concluding Thoughts and Next Steps

- Recognize importance of intentional, ongoing attention to how bias can influence faculty search processes
- Use positive practices for combatting bias
- Use evaluation rubrics AND continue to interrogate potential for bias