Providing Unbiased Written Feedback to Learners

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Learning objectives

By the end of today's session, each educator will be able to:

1. Identify 2-3 examples of types of bias that can infiltrate written assessments
2. Identify elements of effective (unbiased) written assessments
3. Generate strategies for mitigating bias in written assessments

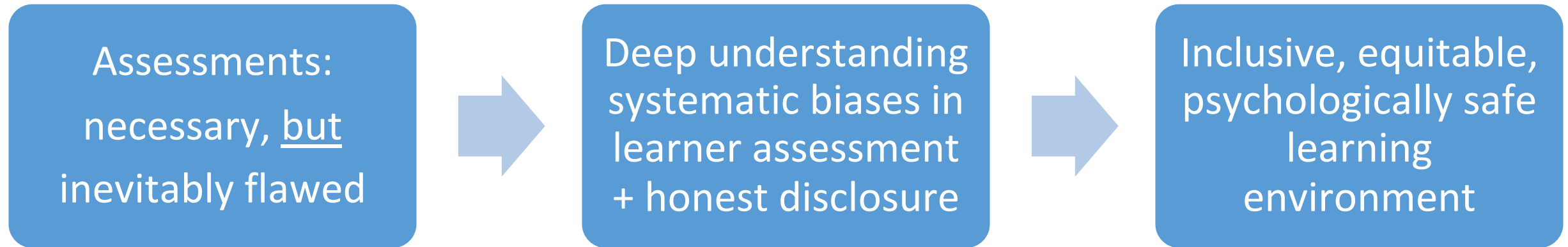# Written assessments present a moral dilemma

- **Necessary**
  - Identifying learners with performance concerns
  - Choosing individuals for promotion, advanced training
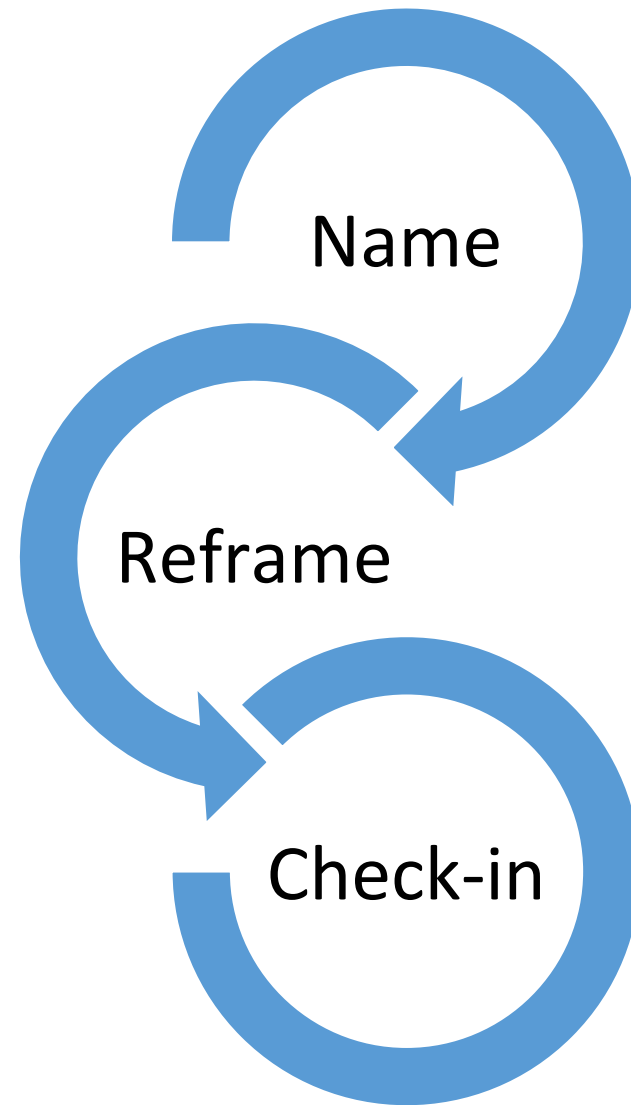 - Holding learners to a high professional standard

- **Inevitably flawed**
  - Educators are not immune to implicit (unconscious) bias → brains evolved to make positive/negative associations about people
  - When assessment is biased against learners → erodes trust, respect, equity

Schumacher et al (2108); Fainstad et al (2021).

How can we make assessments unbiased?

Assessments: necessary, but inevitably flawed

→

Deep understanding systematic biases in learner assessment + honest disclosure

→

Inclusive, equitable, psychologically safe learning environment

Fainstad et al. *Clinical Teacher* (2021).

Framework for mitigating bias in assessments

Name

Reframe

Check-in

Framework adapted from: Fainstad et al. *Clinical Teacher* (2021).

Learner ("X") Assessment:

"It was a pleasure to work with X. X was articulate and well-spoken during rounds. Nurses commented that X was always warm and compassionate. X should work on speaking up more and being more confident."
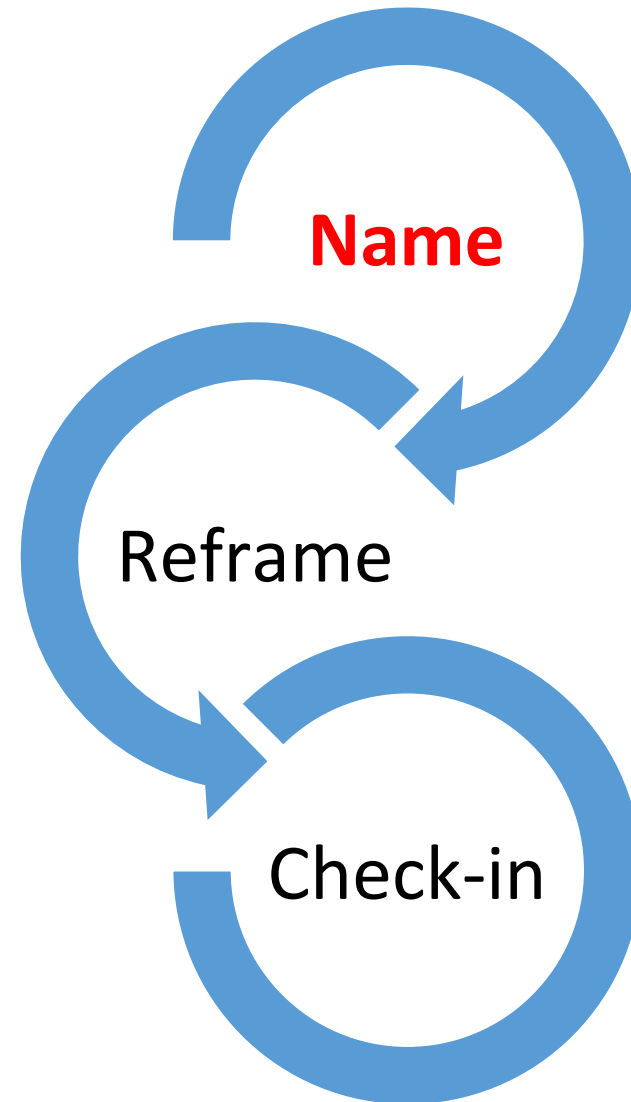
POLL 1: My gut reaction when reading this feedback is:

A) *This is very positive feedback*

B) *I can spot one or more instances of bias*

C) *I know this is a talk about bias, but I'm having a hard time identifying bias in this feedback*
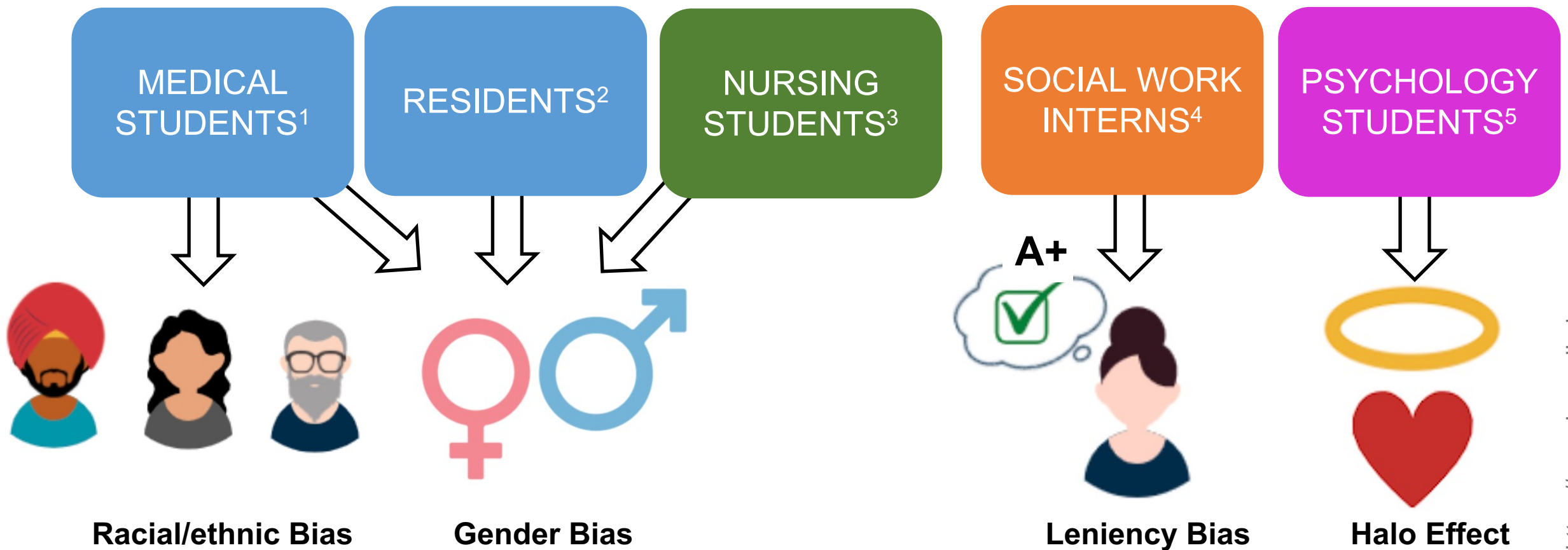
Learner ("X") Assessment:

"It was a pleasure to work with **Marcella**. **Marcella** was articulate and well-spoken during rounds. Nurses commented that she was always warm and compassionate. **Marcella** should work on speaking up more and being more confident."

POLL 2: My gut reaction now when reading this feedback is:

A) *This is very positive feedback*

B) *I can spot one or more instances of bias*

C) *I'm still having a hard time identifying bias in this feedback*

Name

Reframe

Check-in

Bias in assessment present in multiple disciplines

MEDICAL STUDENTS[1]

RESIDENTS[2]

NURSING STUDENTS[3]

SOCIAL WORK INTERNS[4]

PSYCHOLOGY STUDENTS[5]

A+

Racial/ethnic Bias

Gender Bias

Leniency Bias

Halo Effect

Fig: https://www.beapplied.com

Rojek et al (2019); 2. Klein et al (2017); 3. Kiekkas et al (2016); 4. Vinton et al (2009); 5. Mauloff et al (2013).

Female students more often described by personality vs. competency-based attributes

Rojek et al (2019)
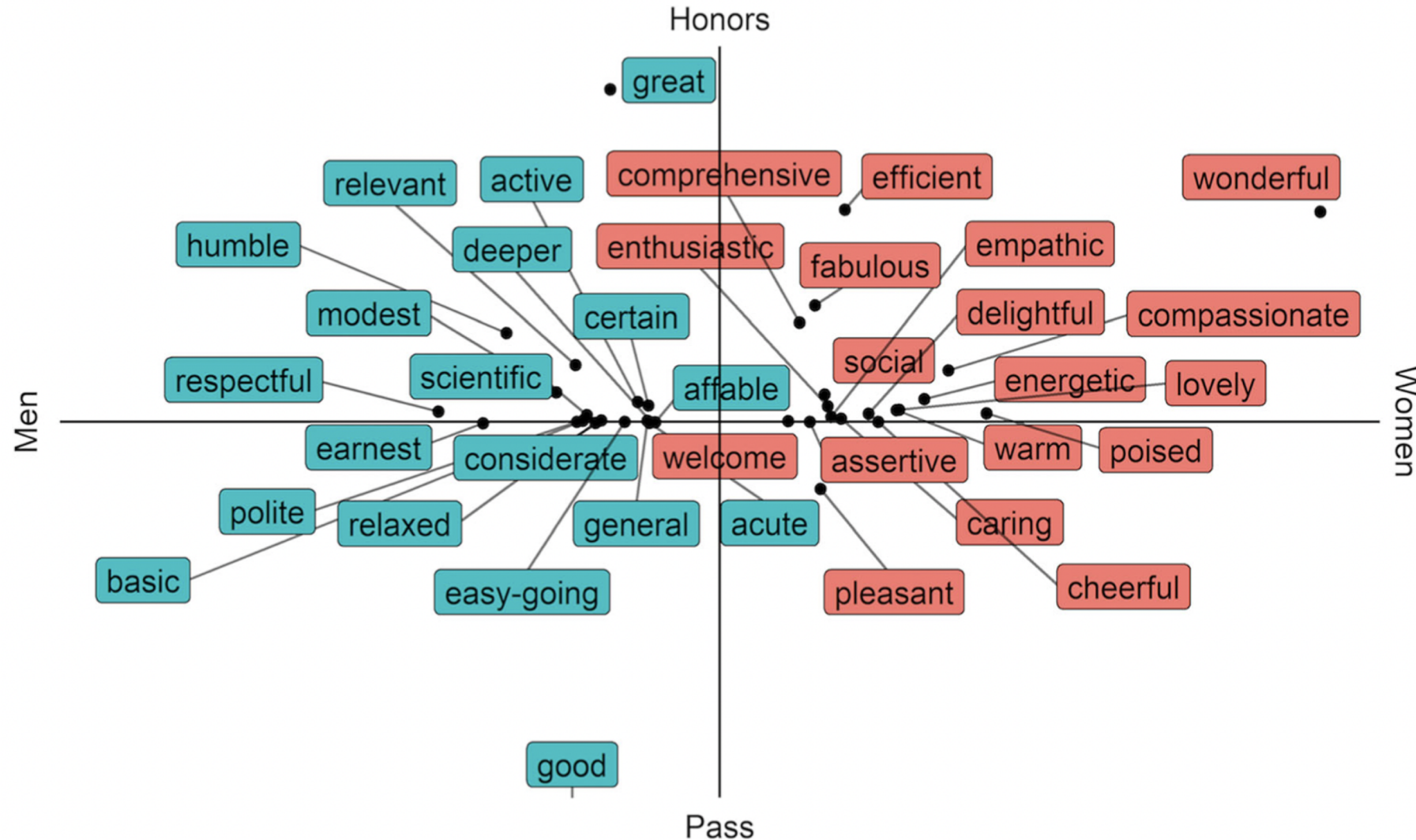
Underrepresented in medicine (URiM) students more often described by personality vs. competency-based attributes

Rojek et al (2019)

Bias in assessments disadvantages key groups

Population group differences in assessments of learners

based on gender and race/ethnicity

**that *virtually always* disadvantage women, URiM learners**

Consequences of bias in learner assessments

- Small differences in assessed clinical performance → large differences in grades and awards ("amplification cascade")[1]

- Lower ratings in performance for female emergency medicine residents = several months of catch-up training[2]

- Black students less likely to be members of honor society (alpha-omega-alpha) even after controlling for other measures of achievement[3]

1. Teherani et al (2018); 2. Dayal et al (2017); 3. Boatright et al (2017)

Take home point

- **Bias is pervasive in learner assessments**

- **We must recognize this and commit to uncovering and mitigating bias**

- **One strategy -> focus on elements of effective assessments**
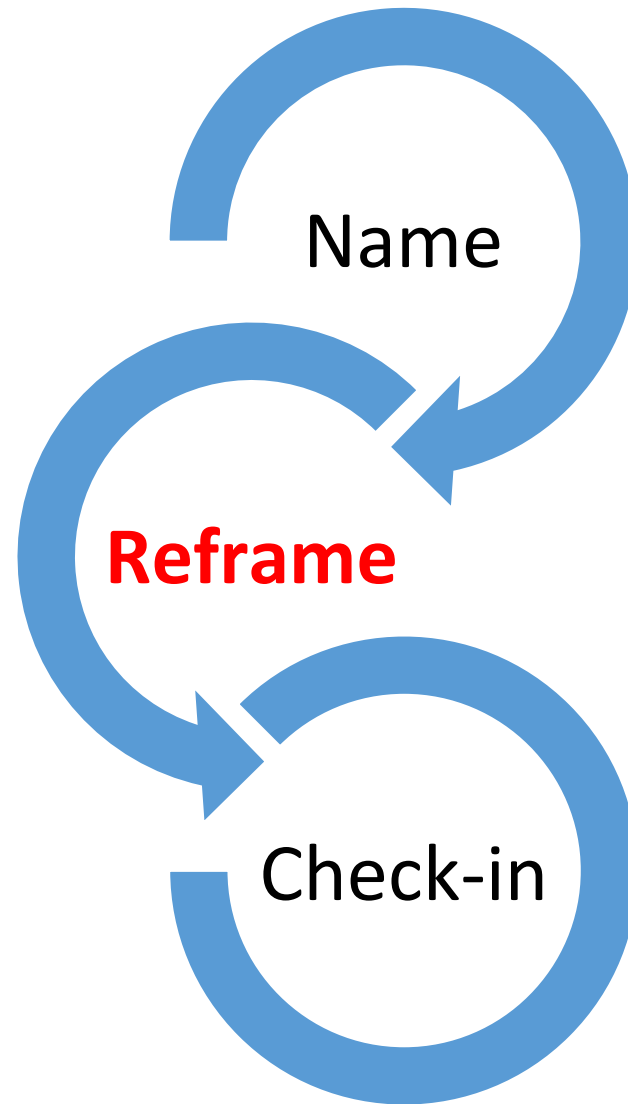
Name

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Check-in

Elements of effective written assessments

1. Assess and evaluate alongside a set of standards

Examples of standards

BCH Core Values	
Excellence, respect, communication, accountability, innovation and teamwork are our core values.	
A strength this employee has:	An opportunity for growth this employee has:

Clinical Competencies	
Using nursing knowledge, critical thinking, and a questioning attitude to assess, plan, implement and evaluate care.	
A strength this employee has:	An opportunity for growth this employee has:

Caring Competencies	
Respecting the many facets of diversity and incorporating them into acts of caring during difficult situations (including maintaining safety and managing pain). Advocating on behalf of the pt/family.	
A strength this employee has:	An opportunity for growth this employee has:

Systems Competencies	
Working with others to facilitate care with respect to the complex inter-relationships that exist in any patient care situation. Embedding teaching and learning in patient and family care.	
A strength this employee has:	An opportunity for growth this employee has:

Examples of standards

In order to make these evaluations most helpful to the resident and to avoid bias that can be unknowingly introduced into assessments (including, but not limited to, bias based on one's race/ethnicity, gender, sexual orientation, gender identity, or disability), please provide comments on OBSERVABLE BEHAVIORS (rather than personality traits) and use SPECIFIC EXAMPLES to support these behaviors. If you would like to discuss

...more

Potential topic areas for your evaluation:

-ability to gather information about a patient
-organization and prioritization of responsibilities
-transfer of care/hand-offs of patients
-clinical judgment, diagnostic/therapeutic decision-making
-development of management plans
-application of evidence-based medicine
-coordination of patient care within a complex health system
-work in inter-professional teams
-identification of own strengths, limits
-seeking out learning resources to guide development
-incorporation of feedback
-humanism, respect for others
-professionalism
-self-awareness of own skill & help-seeking behaviors
-trustworthiness
-ability to deal with uncertainty
-communication with patients and families
-management of own emotions

...less

Elements of effective written assessments

1. Assess and evaluate alongside a set of standards

2. Be specific (behaviors, not labels)

Behaviors versus Labels

- Behaviors: specific knowledge or skills based on observations

- Labels: judgements or perceptions

Behavior	• Inaccuracies • Lateness • Absenteeism • Incomplete actions • Yelling/ interpersonal issues
Absence of Behavior	• Lack of follow through • Not communicating changes • Not getting patient input • Not informing leadership • Not achieving tasks/outcomes
Label	• Careless • Poor communicator • Uninformed • Impatient • Reactionary • Nice • Pleasant • Attentive • Lazy • Angry

Elements of effective written assessments

1. Assess and evaluate alongside a set of **standards**

2. Be **specific** (behaviors, not labels)

3. **Identify** the performance gap

4. Provide a learning **plan**

5. Do I get to **say** anything positive?!?!

Feedback

Do this in S^{2}IPS

Applying S²IPS framework exercise (breakout rooms)

"It was a pleasure to work with X. X was articulate and well-spoken during rounds. Nurses commented that X was always warm and compassionate. X should work on speaking up more and being more confident."

Work in groups to deconstruct and re-write above (S²IPS framework):

1. State what is problematic about assessment (eg, perpetuates__ [type] bias)
2. Practice rewriting the assessment (use creative liberty to make up examples of behaviors)

Feedback	Why is it problematic?	How to fix it: principle(s) Example of ineffective -> effective feedback
X was articulate and well-spoken.	Describing someone as articulate or well-spoken could perpetuate stereotypes (racial bias) *From an anonymous learner (a Black man): "When people comment on how articulate or well-spoken I am, like it is a surprise"*	**Focus on BEHAVIORS, not labels** "X communicated clearly using family-friendly language (with little to none medical jargon, eg 'elevated heart rate') that was easily understood by patients and families, as evidence by their ability to 'read-back' and restate an accurate summary of the assessment and plan."
Nurses commented that X was always warm, compassionate.	Using these personality-based labels can perpetuate gender-based, race-based stereotypes and disadvantage women, URiM learners	**Focus on BEHAVIORS that map to the established standards** "Nurses commented on X's ability to develop rapport with patients and their families through empathetic language and listening, for instance, squatting down or sitting to ensure that X was at eye level (and thus minimizing the power hierarchy), as well as offering supporting statements like 'I hear your concerns'".
X should work on speaking up more and being more confident.	Potential to again perpetuate gender-based or cultural-based stereotypes; not helpful or actionable *From an anonymous learner (an Asian woman): "As an Asian person I always feel annoyed when 'quiet' 'meek' or 'timid' show up in my evals. Especially because I don't think it's particularly true!"*	**Focus on BEHAVIORS, performance gap and follow with actionable plan** "I noticed X would look to the charge nurse on rounds whenever there was a question from the family, which led to the charge nurse jumping in and answering the questions. I would encourage X to try and answer questions that they feel comfortable with, knowing that the charge nurse will step in for support when needed."

Real examples of feedback received learners:

- As a woman: *"spoke to a consultant in a way that was too 'assertive'"*
- As a Black woman: *"'too defensive' when asking questions/making statements"*
- From a physician: *"Because I have an accent, people have considered me 'less smart' than other faculty"*
- From LGBTQ+: *"needed to 'tone it down' and not let on that I was gay or else I wouldn't get promoted and my career would suffer because people wouldn't take me seriously"*

Name

Reframe
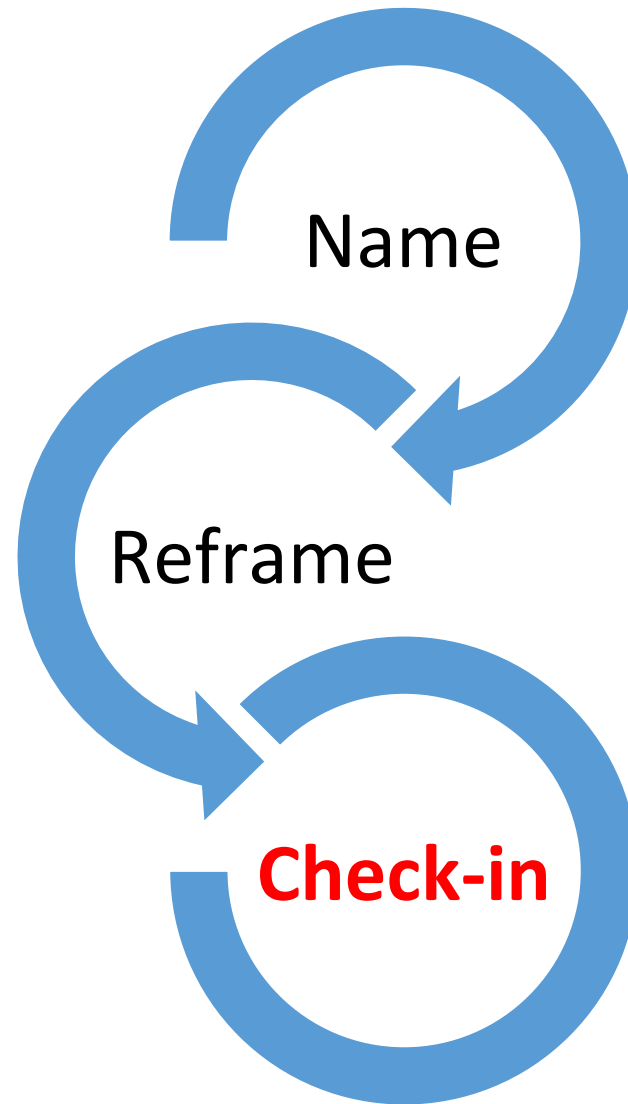
Check-in

Check-in with stakeholders

SELF
- Have I followed the systematic framework to write my assessment?
- If peer were to read my assessment, could they tell it was written about [a female]?

LEARNER
"How did my assessment land with you? I want to make sure I didn't miss something or misinterpret anything. My judgement is coming through a particular lens and represents only one perspective."

PEERS
Ask peers to read your assessment, provide feedback

SUPERVISORS/ LEADERS
Advocate for systemic changes to help mitigate bias in assessment (eg, diversifying workforce, optimizing learning environment)

Adapted from: Fainstad et al. *Clinical Teacher* (2021).

Challenges to writing effective assessments or mitigating bias? (Brainstorming)

Challenges	Possible solutions
Short amount of time with learner	Focus on specific competencies to give feedback on (ask learner for 1-2 goals); write down specifics in notecard
Difficult to give interprofessional feedback	Focus on direct observations and the professional standards

Commitment to change

- Write down one change you will commit to making when providing written assessments to learners based on this presentation

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Learners – who teach *us*, and inspire *us* every day

Additional thoughts? Questions?

Email us!

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References

- Boatright D, Ross D, O'Connor P, Moore E, Nunez-Smith M. Racial Disparities in Medical Student Membership in the Alpha Omega Alpha Honor Society. JAMA Intern Med. 2017;177(5):659–665.

- Dayal A, O'Connor DM, Qadri U, Arora VM. Comparison of Male vs Female Resident Milestone Evaluations by Faculty During Emergency Medicine Residency Training. JAMA Intern Med. 2017;177(5):651–657.

- Fainstad, T.L., McClintock, A.H. and Yarris, L.M. (2021), Bias in assessment: name, reframe, and check in. Clin Teach. https://doi.org/10.1111/tct.13351

- Gingerich A, Kogan J, Yeates P, Govaerts M, Holmboe E. Seeing the 'black box' differently: assessor cognition from three research perspectives. Med Educ. 2014;48(11):1055–68

- Hyde, C., Yardley, S., Lefroy. J., Gay, S., & McKinley, R. (2020). Clinical assessors' working conceptualisations of undergraduate consultation skills: a framework analysis of how assessors make expert judgements in practice. Advances in Health Sciences Education, 25(4), 845–875.

- Kiekkas P, Igoumenidis M, Stefanopoulos N, Bakalis N, Kefaliakos A, Aretha D. Gender bias favors female nursing students in the written examination evaluation: Crossover study. Nurse Educ Today. 2016 Oct;45:57-62.

- Klein R, Julian KA, Snyder ED, Koch J, Ufere NN, Volerman A, Vandenberg AE, Schaeffer S, Palamara K. Gender Bias in Resident Assessment in Graduate Medical Education: Review of the Literature. J Gen Intern Med 2017 10(4):411-415

- Malouff, J. M., and E. B. Thorsteinsson. 2016. "Bias in Grading: A Meta-Analysis of Experimental Research Findings." Australian Journal of Education 60(3):245–256.

- Morgan AU, Chaiyachati KH, Weissman GE, Liao JM. Eliminating Gender-Based Bias in Academic Medicine: More Than Naming the "Elephant in the Room". J Gen Intern Med. 2018;33(6):966–968.

- Rojek, A.E., Khanna, R., Yim, J.W.L. et al. Differences in Narrative Language in Evaluations of Medical Students by Gender and Under-represented Minority Status. J Gen Intern Med 34, 684–691.

- Ross DA, Boatright D, Nunez-Smith M, Jordan A, Chekroud A, Moore EZ. Differences in words used to describe racial and gender groups in Medical Student Performance Evaluations. PLoS One. 2017;12(8):e0181659.

- Schmader T, Whitehead J, Wysocki VH. A Linguistic Comparison of Letters of Recommendation for Male and Female Chemistry and Biochemistry Job Applicants. Sex Roles. 2007;57(7–8):509–514.

- Stone, A. (2013). How to give written feedback. Education for Primary Care, 24, 473-475.

- Stone, D. & Heen, S. (2014). Thanks for the Feedback. Penguin Books.

- Teherani A, Hauer KE, Fernandez A, King TEJ, Lucey C. How small differences in assessed clinical performance amplify to large differences in grades and awards: A cascade with serious consequences for students underrepresented in medicine. Acad Med. 2018;93:1286–1292.

- Vinton L, Wilke DJ. Leniency Bias in Evaluating Clinical Social Work Student Interns. Clin Soc Work. 2011; 39(3):288-295.