Empowering Early Career STEM Teachers

Collaborative Conversations for Equitable Practices

Dr. Gina Wilson, NBCT

Dr. Joyce Lin

Knowles
TEACHER INITIATIVE

Dr. Gina Wilson, NBCT
gina.wilson@knowlesteachers.org

Dr. Joyce Lin
joyce.lin@knowlesteachers.org

Knowles
TEACHER INITIATIVE

Today's Agenda

Introduction

01

04
LOREM

Knowles' Use of the
Collaboration Guide

Exploring the Collaboration Guide

02
LOREM

05
LOREM

Your Thoughts

Using the Collaboration Guide

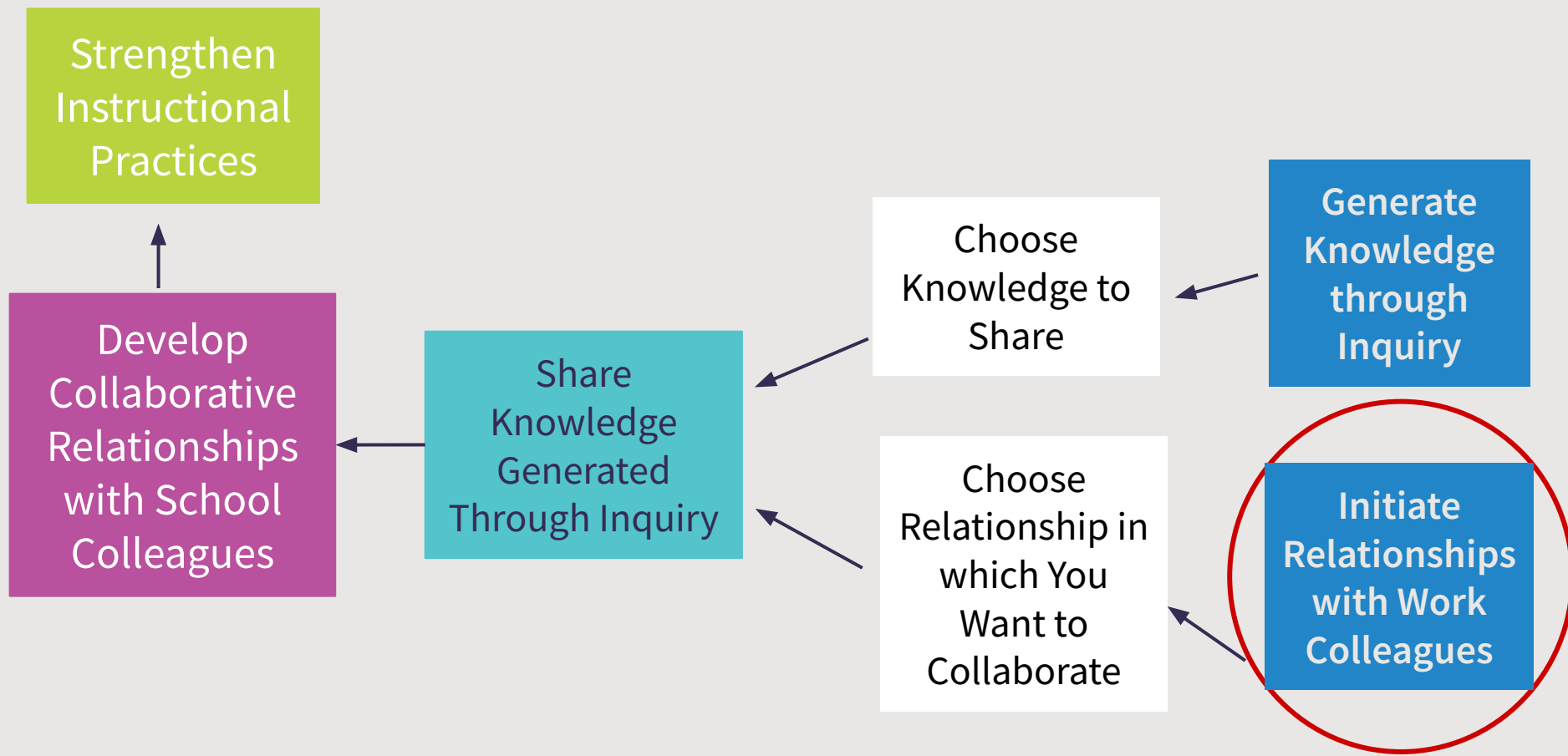**03**
LOREM

06
LOREM

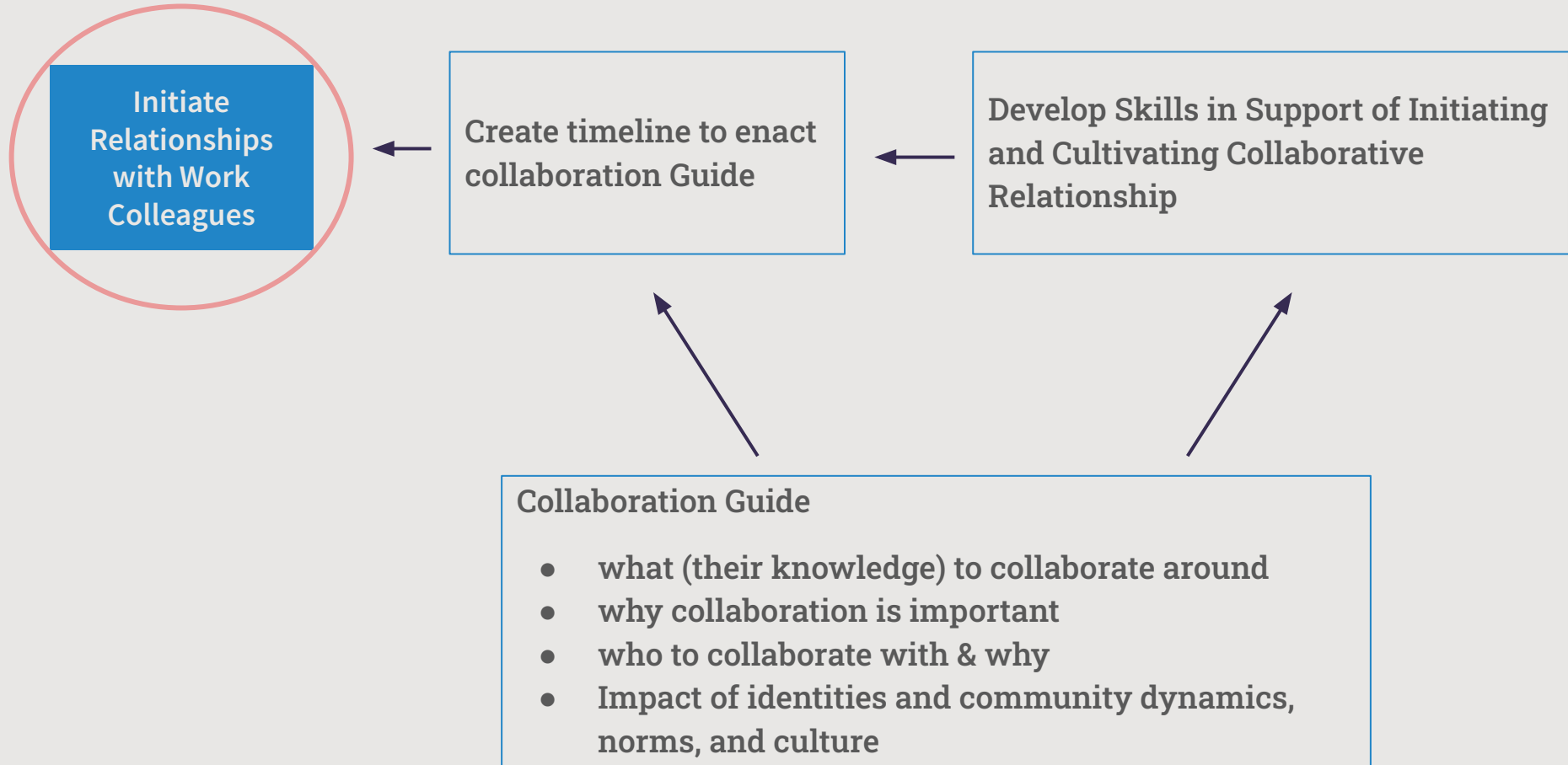Closing

Knowles
TEACHER INITIATIVE

Support a national network of math and science teachers who are **collaborative**, innovative leaders improving education for all students in the United States.

Foster powerful communities of teachers who inquire **together**, advocate for change, and drive improvement.

Supporting ECSTs

Strengthen Instructional Practices

Develop Collaborative Relationships with School Colleagues

Share Knowledge Generated Through Inquiry

Choose Knowledge to Share

Generate Knowledge through Inquiry

Choose Relationship in which You Want to Collaborate

Initiate Relationships with Work Colleagues

Our Approach

Initiate Relationships with Work Colleagues

Create timeline to enact collaboration Guide

Develop Skills in Support of Initiating and Cultivating Collaborative Relationship

Collaboration Guide

- what (their knowledge) to collaborate around
- why collaboration is important
- who to collaborate with & why
- Impact of identities and community dynamics, norms, and culture

Exploring the Collaboration Guide

How do you see this guide helping you/ECSTs determine

- What to collaborate around?
- Why collaboration is important?
- Who to collaborate with & why?
- How identities and community dynamics, norms, and culture impact collaboration?

15:00

Individual Time & Partner Chat

Collaboration Guide for Early Career STEM Teachers

Early Career STEM Teachers (ECSTs) often experience risk and uncertainty when starting conversations around problems of practice and engaging with more veteran colleagues. This Collaboration Guide is a resource for supporting ECSTs in creating collaborative relationships with colleagues around equitable teaching practices (as we do) or other department/school/district initiatives.

Category	Reflecting on Collaboration	Reflecting on my Practice	Reflecting on my Community
	Ask a colleague how they think	- What does participation/talk/doing looks like for this group of students in this task?	- How is this group of students doing in this subject/content/class? - What do or don't our students

Planning to Use with ECSTs

Thoughts about using this to determine
- What to collaborate around
- Why collaboration is important
- Who to collaborate with & why
- Impact of identities and community dynamics, norms, and culture
- Other Ideas, Realizations, or Questions?

Use the Collaboration Guide

- Cultivate/Strengthen a Relationship with a Colleague
- Support an ECST in a Challenging Situation

- Briefly Share your Choice with a Partner

Using the Collaboration Guide

20:00 MINUTES

Find the Collaboration Guide

- AMTE Conference Guide
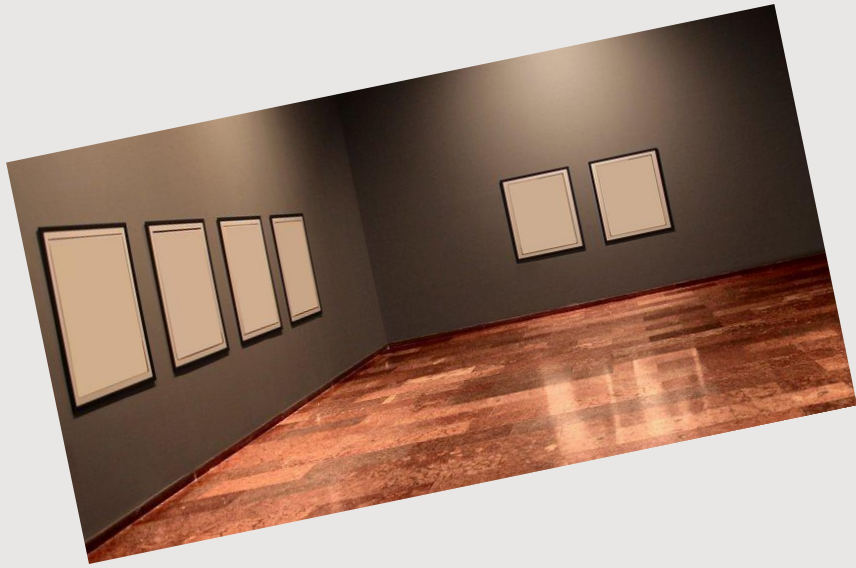- Paper Copy
- At …

Use the Collaboration Guide

Small Group Discussion

- Use in your Context

- Considerations when using

- Revisions/Modifications

Gallery Walk

- Noticings and Wonderings

- Similarities/Differences to your Context

- Ideas You want to Incorporate

Facilitation Notes

Same Facilitation with Fellows:

- Explore
- Discuss
- Use
- Gather Feedback
- Revise

Collaboration is More Accessible

- "Who, what, where prompts made it less daunting - this is a scary process and the prompts helped"
- "The when and where were good to talk about because of so many different places to open collaboration and need [for a] relationship before [we] can really collaborate"
- "I appreciated the dedicated time to really make a plan for collaboration. It feels a bit overwhelming, but breaking it down and really processing the steps I need to take to make it successful with a lot of different people made the overall process a bit easier to stomach."

Hopes, Fears, & Wonderings

Hopes
- Inspire Colleagues to Adopt New Practices
- Fostering Deeper Discussions about Student Needs

Fears
- Dismissal of Ideas
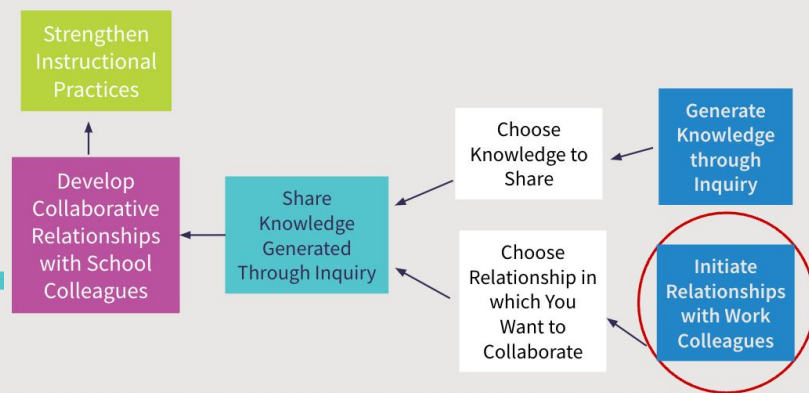- Lack of Engagement from Colleagues

Wondering
- How can we modify this when it feels like collaboration isn't really possible or doesn't feel possible or it feels unsafe?

After Collaboration

- Conversations
  - Aligned mostly with Expectations
  - Didn't always Lead to Immediate Change

- Positive impact on Relationships with Colleagues
  - More Potential for Future Collaboration
  - New Collaboration Opportunities

- Desire to Continue Collaboration
  - Continue and Even Deepen Collaboration
  - Include More Colleagues
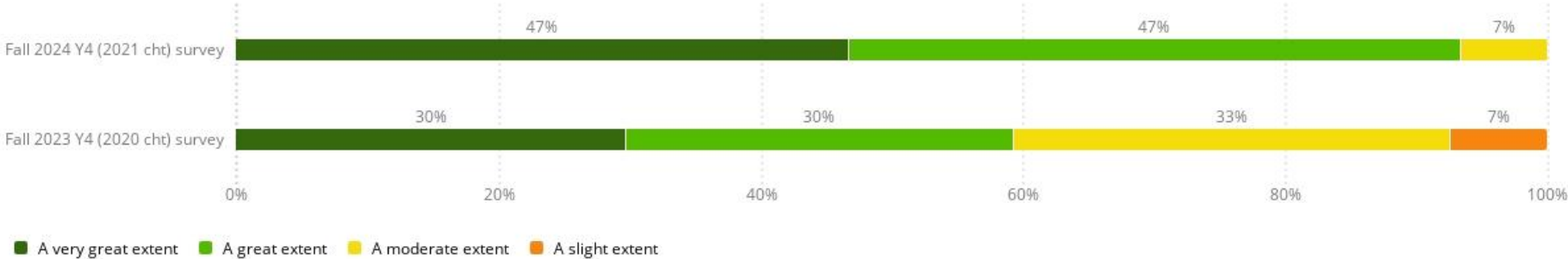 - Already Created Plans for More Collaboration

After Collaboration

- Collaboration can Positively Impact Student Outcomes
  - "We were able to share more strategies and plan for continuing reflections next year."
  - "I hope that this conversation will lead to more community connection within the STEM field and our classes."
  - We can collaborate in "our role as teachers to combat academic status in our classrooms (especially as a result of gender identity)."

Strengthen Instructional Practices

Generate Knowledge through Inquiry

Choose Knowledge to Share

Develop Collaborative Relationships with School Colleagues

Share Knowledge Generated Through Inquiry

Choose Relationship in which You Want to Collaborate

Initiate Relationships with Work Colleagues

Our Learning as MTEs

To what extent did Knowles fall work support you in considering your school colleagues as thought partners in your inquiry on equitable teaching? 42

	A very great extent	A great extent	A moderate extent	A slight extent
Fall 2024 Y4 (2021 cht) survey	47%	47%	7%	
Fall 2023 Y4 (2020 cht) survey	30%	30%	33%	7%

- ■ A very great extent
- ■ A great extent
- ■ A moderate extent
- ■ A slight extent

Our Learning as MTEs

Fellows Value Collaboration
- Continue Strengthening their own Collaboration Skills
- Continue Strengthening Collaboration with Colleagues
  - Even Those with Collaboration in place Already
- Fellows Desire More Structured Time for Collaboration
  - Schools with More Collaboration Structures have Higher Collaboration

Fellows Have Concerns
- Time Constraints & Scheduling Conflicts Impede Collaboration
- Worried Colleagues won't Engage in Collaboration

Revising Plans

Your Thoughts...

- Takeaways
- Wonderings
- Next Steps

Want to learn more about MTEP 2.0?

- **Visit our table in the exhibit area**
- **Check out featured MTEP sessions at AMTE 2025**
- Connect with us on LinkedIn, Facebook, and Bluesky
- Visit our website
- Subscribe to our newsletter
- Learn about upcoming events

linktr.ee/mtep2.0

SCAN ME

KNOWLES TEACHING FELLOWSHIP

COMMUNITY MEMBERSHIP

MENTORING AND COACHING

FINANCIAL SUPPORT

Knowles Academy Professional Learning

CUSTOMIZED FOR SCHOOLS & DISTRICTS

FREE ONLINE COURSES & WORKSHOPS

COACHING FOR TEACHERS