

WELCOME!

Please sit at the same table with people who went to school in the same region as you! Tell your tablemates how it influenced you as a learner and educator.

- Southwest
- Northwest
- West Coast
- Northeast
- South East
- Midwest
- International

ENSURING EQUITY IN ACCESS FOR NEWCOMERS

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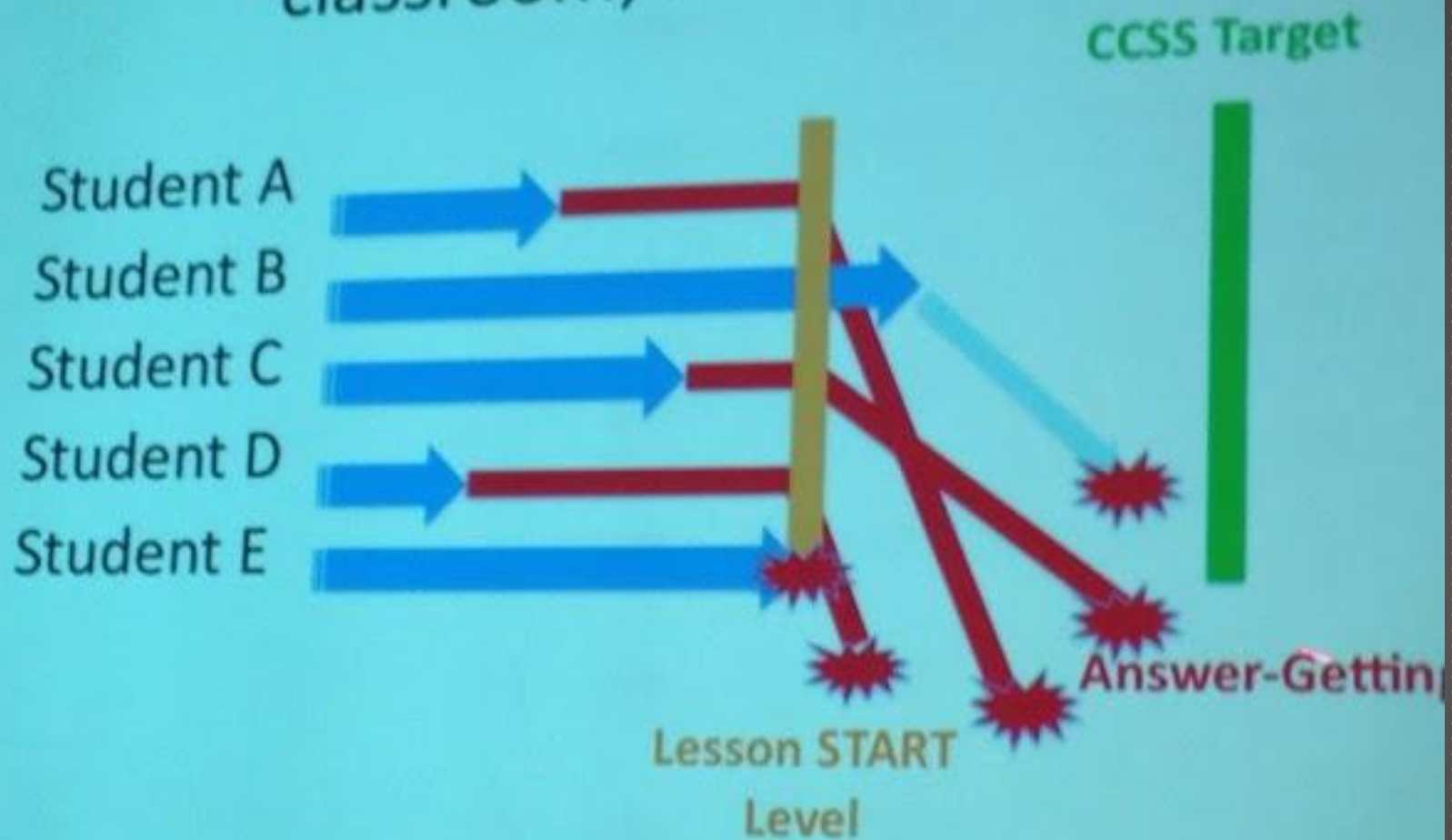
NORMS

- ▶ Even though we are presenting, we value everyone's perspectives and experiences
- ▶ Assume best intentions
- ▶ Respect others' learning styles
- ▶ Share airtime
- ▶ Before you share, please state your name

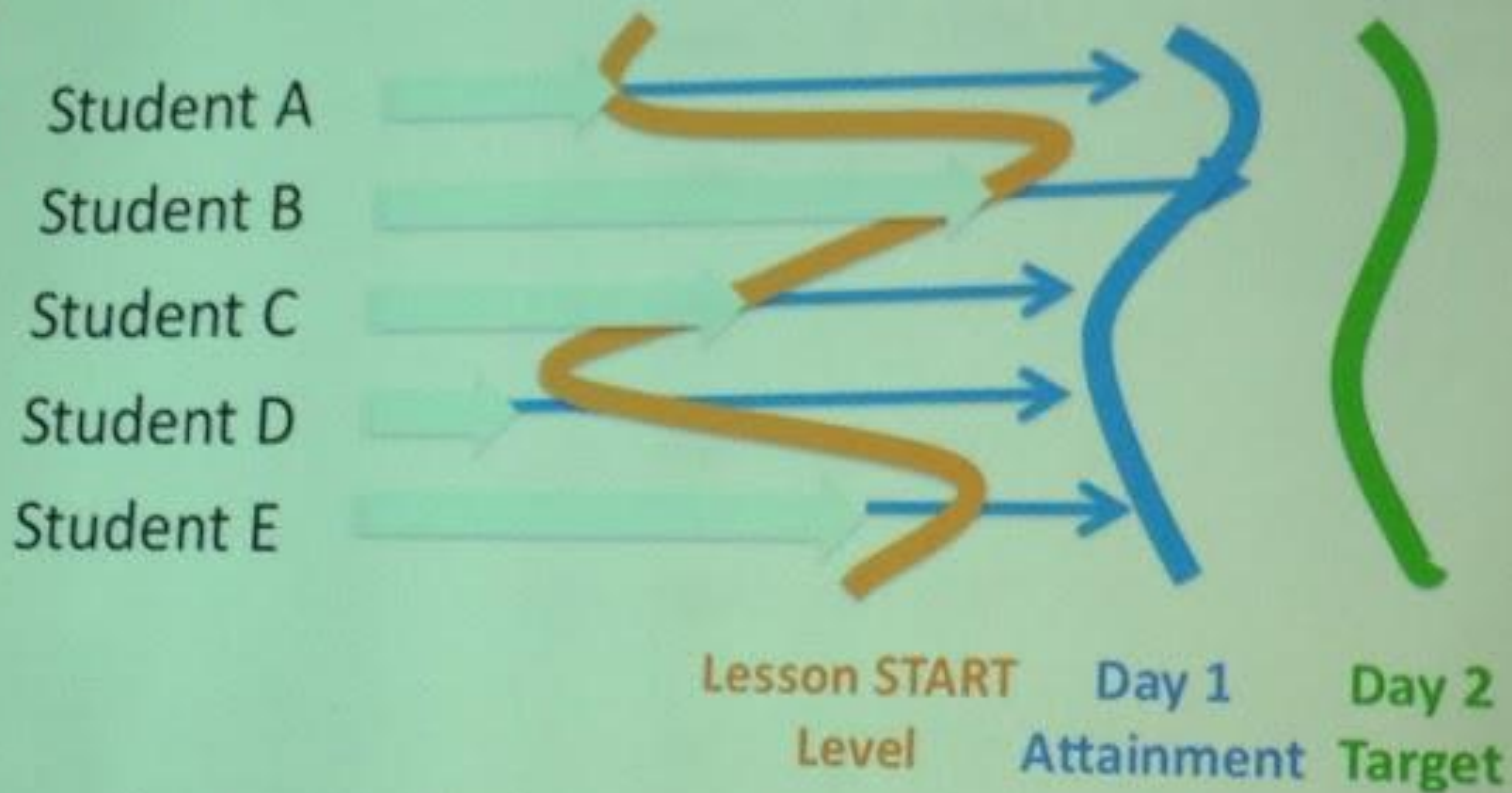
WHO ARE WE AND WHO OUR STUDENTS ARE?




Variety of prior knowledge in every classroom; I - WE - YOU



You - we - I designs better for content that depends on prior knowledge



WHY IS THIS WORK IMPORTANT?

- ▶ Addressing low literacy skills without compromising the rigor of tasks
 - ▶ Students are where they are and our role is to push their thinking to the next level
 - ▶ Increasing student self-confidence by validating their ways of thinking
 - ▶ Being strategic given parameters and limitations- ELLs have double the work (accessing challenging core content through English) but we don't have double the time
- 

TASK AT HAND

- ▶ As you are reading through the task, based on your experience, what would make this task difficult for newcomer students and ELLs?
- ▶ What are students being asked to do?

AUDIENCE CONCLUSIONS

- ▶ Translating and organizing the information in the text
- ▶ Same statement sentence structure
- ▶ One thousand students and one thousand lockers; what does this mean?
Managing two different parameters
- ▶ A lot of reading
- ▶ Lack of student experience with lockers

- ▶ How are we scaffolding?
- ▶ Understanding the instructions
 - ▶ Action words: modeling, change the state (what does this actually mean)

- ▶ Students are being asked to find patterns based on multiples and factors.
- ▶ Generalize the patterns = mathematical understanding

STUDENT WORK

- ▶ In your tables, use these questions to frame your conversations as you analyze the student work.
 1. What evidence do you notice that shows if the student was able to identify a pattern?
 2. What questions would you ask the student to...
 - Push their understanding/thinking of the problem
 - Address misconceptions

AUDIENCE CONCLUSIONS

- ▶ What does A and C mean? (Labeling the drawing, graph, model)
- ▶ How does your representation illustrate what is happening in the task?
- ▶ Used only numbers- hinders the ability to see a pattern.
- ▶ How do you know what is happening to the state of the lockers?
- ▶ What is your thinking behind knowing that these lockers are open/closed?
- ▶ What is your reasoning? How does it relate to your model/illustration?
- ▶ Systematic approach led to visible pattern, limit the model to one page
- ▶ Model allows for seeing the pattern and the academic understanding (factors, perfect square, etc.)

PROCESS FOR LESSON PLANNING

Do assessment item yourself

- What are the skills that my students need to master before they do the task?
- What are some different ways my students might solve the problem?

What is my students prior knowledge?

- Check assessment data (diagnostics, data from previous years, etc)
- Where are the gaps? What potential misunderstandings will my students have while completing the task?
- How can I use this task to uncover how students organize their thinking about mathematics.

Questioning

- Use DOK (Depths of Knowledge) Chart to frame questions using the content
- What specific questions can I draft to get my students unstuck?
- What questions am I going to ask specific students to push their thinking to the next level?

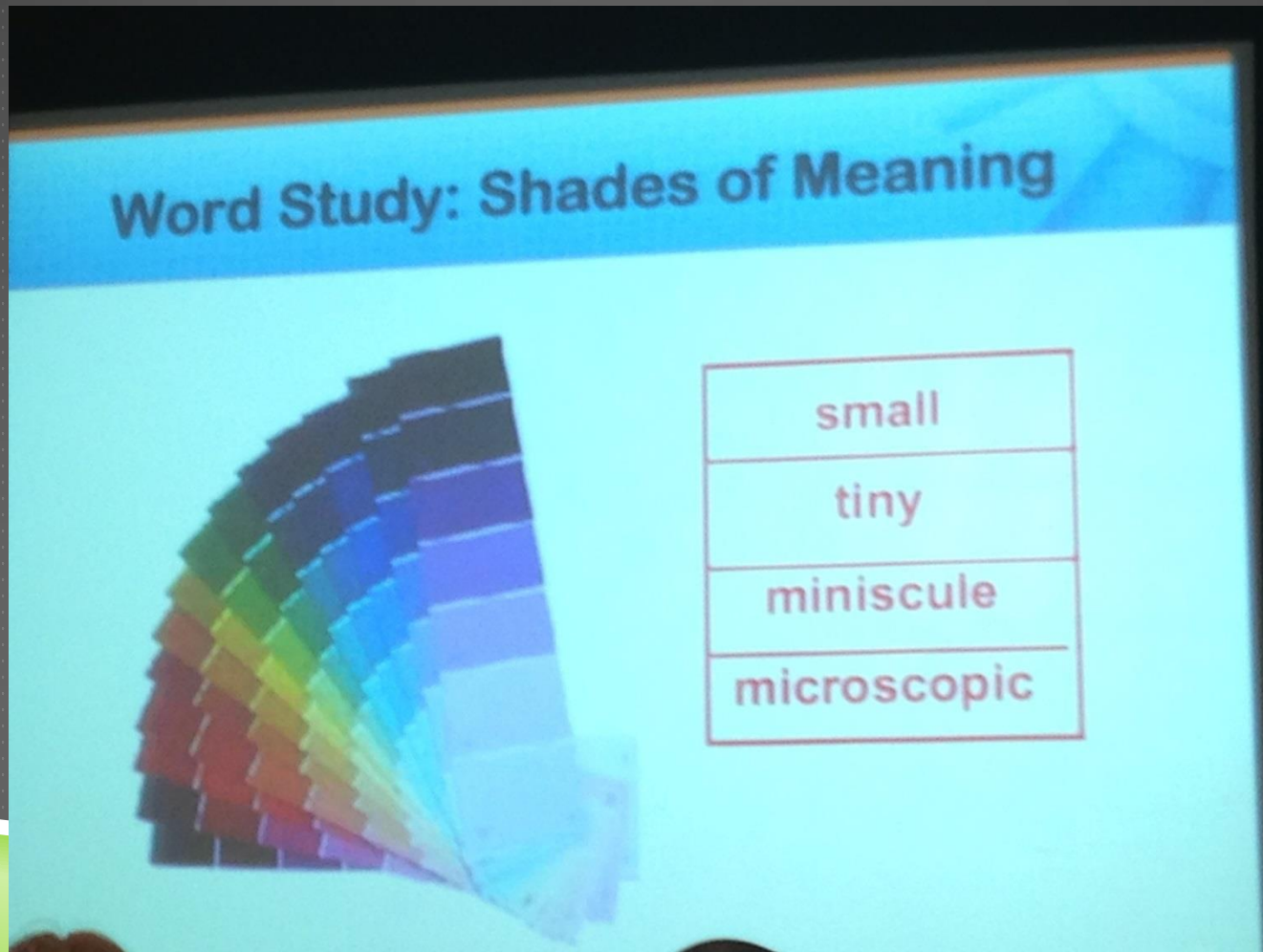
Maintaining Rigor

- Consciously select students to share their strategies in a specific order to build a deeper understanding for all students.
- After student four presents, you want to give students the precise academic vocabulary to label their conceptual understandings.

TOOLS FOR ACCESS- HOW CAN WE RE-CONTEXTUALIZE AND SCAFFOLD A TASK TO MEET STUDENTS WHERE THEY ARE?

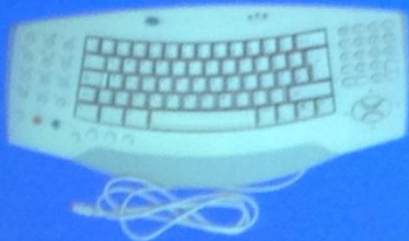
- ▶ SIOP strategies (Presentation on May 2014 by Deborah J. Short, New York, NY)
 - ▶ Word Wheels
 - ▶ 4 Corners Vocabulary
 - ▶ Language Frames for Vocabulary Definitions
- ▶ Frayer Model
- ▶ 4 Step Method for Understanding a Word Problem
- ▶ Creating videos, role playing, or other visuals to contextualize tasks
- ▶ Constantly shifting from student language to precise academic vocabulary

WORD WHEELS



4 CORNERS VOCABULARY

4-Corners Vocabulary

<p>Illustration</p> 	<p>Sentence</p> <p>The curved keyboard is better for my wrist.</p>
<p>Definition</p> <p>The part of a computer with keys for typing words, numbers, and symbols.</p>	<p>Word</p> <p>keyboard</p>

LANGUAGE FRAMES

Use Language Frames to Define Vocabulary Terms

X is a (type of) _____

X has _____ and _____

X is similar to _____

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COMPREHENSIBLE INPUT

- ▶ Modeling mathematic learning after language acquisition theory

Q & A

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