

## Lucy's Engineering Adventure Discussion Guide Grades K-2

## Before Reading: to activate schema, build background knowledge, and set a purpose.

- Discuss the importance of air in everyday life. Why do buildings need heat and air conditioning? What happens if a building gets too cold? Make a list of student generated responses on an anchor chart or whiteboard.
- Before reading, have a class discussion to activate prior knowledge about careers in engineering and HVAC.
- Frontload vocabulary: engineer, design, problem, solution, duct, fuel

## During Reading: to engage students, check for understanding, and make connections.

- How does Lucy feel about going to work with her dad? How can you tell?
- Why do Lucy and her dad need to wear safety gear like hard hats and glasses?
- What are some ways that the building is like a person?
- Why are the air ducts important in the building?
- What would you do if your room was so cold you could see your breath?

## After Reading: to summarize, question, and reflect.

Engineers ask questions! What are some questions you have about the way things work in your home or school? Write them down on chart paper or a whiteboard.

If your students enjoyed this book...

- Encourage them to continue to discuss it and refer to it in other lessons and conversations.
- Let them explore more about the topic by reading other books with similar themes, structure, characters, or content.