Narrator: "Students in Mr. Foster's third-grade class are settling into their seats after lunch and getting ready to start a new group project."

Mr. Foster: "Okay class; who's ready to start our new group project? Today, you will be breaking up into teams of four and measuring your group members' heights. Then, after everyone in your group has been measured, each group will make a bar graph showing their data. Once every group is finished, we will display our graphs in the classroom. Does anyone have any questions about the project before we begin?"

Nathan: "Will each group be making their own bar graph, or will we make one together as a class?"

Mr. Foster: "Can anyone help answer Nathan's question?"

Gabby: "Mr. Foster said that each group will make their own bar graph."

Mr. Foster: "That's right, Gabby; each group will make their own. OK, let's get in our groups and get to work."

Narrator: "Mr. Foster assigns students into groups and instructs them to first get their materials, then measure each group member's height, and finally create a bar graph displaying their measurements. The students get to work."

Gabby: "OK team, the first thing we need to do is..."

Sarah: "Get our materials!"

Cory: "I will go get the things we need to make our bar graph: colored pencils, a ruler, and graphing paper."

Nathan: "I can get the measuring tape! Who wants to be measured first?"

Sarah: "This project is going to be so fun. I love making graphs."

Nathan: "I like making graphs, too. Who wants to be measured first?"

Gabby: "Why don't we go alphabetically? Cory will be first, I will be second, Nathan will be third, and Sarah will be..."

Sarah: "LAST. Why do I always have to be last?"

Gabby: "Hmm, I have an idea. When we start graphing, you can be the first to graph your height. How does that sound?"

Sarah: "OK, that sounds good to me."

Nathan: "OK Cory, you're up. Let's stand up against the wall when we are getting measured. That seems like the best way. Sarah, can you help me? Sarah?"

Narrator: "Sarah grabs the measuring tape and starts measuring Gabby's height."

Sarah: "Wow Gabby, you are really tall. It's hard to measure you."

Nathan: "I can help you measure, Gabby."

Sarah: "Thanks, Nathan. When we're done, we can both measure Cory."

Narrator: "Nathan and Sarah work together to measure Cory and Gabby."

Cory: "Alright, now we can switch roles. Gabby and I can measure you and..."

Gabby: "I want to measure Sarah."

Narrator: "Cory and Gabby take turns measuring Nathan and Sarah. Once everyone in the group is measured, they compare each other's heights."

Sarah: "Wow, I'm 48 inches!"

Gabby: "I'm 52.5 inches!"

Nathan: "I'm 50 inches!"

Cory: "I'm 51 inches! Wow, I am the tallest in the group."

Nathan: "Actually, Gabby is 1.5 inches taller than you. She said she was 52.5 inches tall."

Sarah: "Alright, should we start graphing now? Who wants to draw the graph?"

Cory: "I can't believe that I'm the second tallest. I wanted to be first."

Gabby: "I will draw the x-axis and y-axis for our graph. Who wants to label them?"

Cory: "I can label them and then Sarah can be the first to put her height on the graph. Remember, we agreed that she should go first."

Narrator: "The students use their graphing materials to help them draw their graph, and now it's Sarah's turn to graph her height."

Sarah: "We should each use a different color to represent our heights on the bar graph. I will pick green since it's my favorite color. (Sarah colors in her bar on the graph). I'm done. Who's next?"

Nathan: "I'll go next. I'll use purple since that's my favorite color. Hold on, I forgot how tall I was."

Gabby: "You said that you were 50 inches tall."

Nathan: "That's right; thanks, Gabby!"

Gabby: "No problem. My turn. I will pick red. (Gabby starts graphing her height but is having a hard time.) How am I supposed to make sure that my bar is straight? This is so hard."

Nathan: "I used my ruler to make my line straight. Here, do you want to borrow it?"

Gabby: "Sure. Thank you. Wow, my bar is so tall."

Nathan: "That's because you're taller than all of us. I wonder if you are the tallest kid in our whole class."

Cory: "That would be awesome. Maybe we will find out after all of the other groups are done."

Narrator: "The groups are finishing up their graphing projects. Mr. Foster asks for everyone's attention."

Mr. Foster: "OK class, let's start cleaning up and getting back to our desks. We will talk about each of our group's..."

Cory: "Are we going to compare our height with kids from other groups?"

Mr. Foster: "We will talk about the project once we are back in our seats."

Sarah: "I will put the colored pencils away. You can all clean up the rest of our materials and our area."

Nathan: "OK. Hurry, Sarah. Mr. Foster wants us in our seats."

Sarah: "I'm trying but there are so many colors to put back."

Cory: "I can help you! I'm finished cleaning up our area."

Narrator: "The students put away all of their materials and get their work stations cleaned up. Each student is sitting in their seat waiting for Mr. Foster."

Mr. Foster: "So class, who ended up being the tallest person in your group?"

Cory: "Gabby is the tallest one in our group. She is 52.5 inches tall! Her parents must be really tall, too."

Gabby: "My dad is really tall, but my mom is pretty short. I must have gotten my height from my dad."

Mr. Foster: "That's probably true, Gabby. So class, what did everyone think of this assignment? If we did it again, what else would be fun to graph?"

Nathan: "I think it would be fun to graph the number of pets we have."

Cory: "I would like to graph how many siblings..."

Sarah: "Birthdays! We could graph how many kids in the class have January and February birthdays and the rest of the months, too."

Mr. Foster: "That's a great idea, Sarah, but next time, please wait for the person to finish before you speak. Go ahead Cory, what was your idea?"

Cory: "I think it would be fun to graph how many siblings we all have. I have five brothers and it would be fun to see if anyone has more siblings than me."

Mr. Foster: "These are all great ideas. Make sure to write them down so we remember them for next time. Thank you for working so well together and listening to one another. You all make great teams."