

[MUSIC PLAYING]

**AUDIENCE:** And then--

[INTERPOSING VOICES]

--it comes back to you but--

**SPEAKER:** Why do you think that?

**AUDIENCE:** Because in the classroom, we can't make an echo because it's like when we said "Seahawks," it didn't come back to us because I think the door was open and it bounced out. It didn't bounce back.

**SPEAKER:** So do you think it would echo if we were in the hallway?

**AUDIENCE:** Yes.

**AUDIENCE:** I kind of disagree with you.

**RICARDO:** I think it echoes because [INAUDIBLE] somewhat clear because it's like a square, and there's cabinets and all that.

[INTERPOSING VOICES]

**AUDIENCE:** I agree and disagree with Ricardo because I thought that you can only make a echo in an open-- like a really wide-open space because a comparison to echo-- when I was cooking-- when I just moved into my house, it was an echo because nothing was in there. It was empty. So I said it smells nice in here, and I can hear myself echo because it was like an open space, and it was empty. So I'm not sure if what Ricardo said is right or if what you said is right because the hallway-- I don't think will echo. If you were in a hallway, I don't think it would echo.

[MUSIC PLAYING]

**AUDIENCE:** What am I doing?

OK, so what I drew here-- this is, like, a wall, for example. It's like this wall, and this is Ms. Flaherty's room. And this is our room. And sometimes, when Flaherty says something, we can hear it across, even if the doors are shut. And I said right here that the solids are made out of particles because they're compact, like, stuck together to make one. I don't know how to explain that.

**SPEAKER:** Sounds good so far.

**AUDIENCE:** So I wrote right here-- sound waves push through the particles in the solid. So when someone's talking in that room, you can go through solid.

**SPEAKER:** All right. So let's take some time just to look this over and think about what he said. And we can take what Muhammad was talking about and add that to this thinking.

**AUDIENCE:** So I overheard you say that--

[INTERPOSING VOICES]

**AUDIENCE:** The vibrations can't only go through the door because--

**AUDIENCE:** It's hard to explain. We have the idea, but we don't know how to explain.

**SPEAKER:** Because you were saying something earlier in the partner share about the idea of how can the vibration go through the wall but not the air--

**AUDIENCE:** Not the gas.

**SPEAKER:** Yeah, that was something you were talking about, if that helps.

**AUDIENCE:** Why is it that you said the vibrations can go through the wall but then why can't the gas go through the wall?

**AUDIENCE:** I never said the gas could go through the wall.

**AUDIENCE:** I mean, can't.

**AUDIENCE:** --go through the wall. I think I said it can't.

**AUDIENCE:** [INAUDIBLE]

**SPEAKER:** We're inferring that--

**AUDIENCE:** [INAUDIBLE]

**AUDIENCE:** If the sound waves can come through the door, then why can't particles come through the door?

**SPEAKER:** James.

**AUDIENCE:** I remember a while back-- I don't know how long ago it was, but we had a substitute, and he did a little thing with sound and how we were able to hear it. Well, there was something that was kind of like a little-- kind of like our flesh or whatever it's called, like tissue. It's kind of blocking it off towards near the end of the inner part of our ear.

**SPEAKER:** Your eardrum?

**AUDIENCE:** And the sound would be going through it. So that's a solid.

**AUDIENCE:** Can you repeat that? Can you repeat that?

**AUDIENCE:** Yeah, because the sound-- the tissue inside of our ear, there's like a little blocking inside of our ear, so nothing could go through it, but like sound can, but it's solid. So I mean, sound can go through solid.

**AUDIENCE:** Oh, I get it. I get it. It's like-- so you can't just--

**AUDIENCE:** The tissue in our skin-- it'll just go right through it.

**SPEAKER:** Because the tissue is kind of like a drum.

**AUDIENCE:** You can't grab a pencil and just like stick it all the way in.