Pick a Path

Directions:

1. Share **Background Information** with students.

2. Divide the class into four groups. Assign each group one of the following titles: water, sand, silt, and clay.

3. Soil particles should position their arms like the examples in the drawing below.

4. Group the sand particles together so that each particle is touching another (finger tip to finger tip). Now tell students in the water group to try and run through the sand group (under their arms). They should be able to run through will little difficulty.

5. Repeat the above step for silt and clay. Silt particles should be touching elbows, and clay particles should be touching shoulders. Discuss the results.

6. Mix up the sand, silt and clay particles (students) to make a loam. Ask the water group to run through. Discuss the results.

![Sand Silt Clay](Image)

Discussion:

1. In the "Pick a Path" activity, which group did the water have more difficulty running through?

2. Which types of soils hold more moisture?

3. Does the amount of organic matter affect the water holding capacity of soil?

4. Looking at the Comparison Chart, which soil had the most sand? Which had the most clay?

5. Can you figure out the water holding capacity of the soil?

6. Who needs to know about how water percolates through soil? Why?