What is STEM?

STEM stands for Science, Technology, Engineering, and Math. Did you know STEM is important in baseball? Let’s see how!

LESSON: Ballpark Dirt Science

Soil minerals are divided into three size classes — clay, silt, and sand. The percentages of particles in these size classes is called soil texture. Let’s find out what the soil texture of the dirt at Oriole Park at Camden Yards!

CLAY

On the pitcher’s mound and home plate area, the soil used is 100% clay. Clay retains water which makes it sticky and solid so the players can have better footing and stability. This helps with a perfect pitch and grand slam swing.

SAND

This might come as a surprise, but underneath the grass at Oriole Park at Camden Yards is 100% sand. Water drains through sand much better than clay and silt, which allows the Orioles to play games after a thunderstorm without risking the safety of the athletes. However, sand does not hold many nutrients, so nutrients need to be added to the field to provide healthy turf.

CLAY, SILT & SAND

The infield dirt is made up of a combination of 22% clay, 18% silt, and 60% sand. This mixture allows for players to have more stable footing and softer hops for groundballs. Additionally, it can handle a fair amount of rain before becoming too muddy to play a game.