## CORE, YOU SEE THE SOIL HEALTH?

## These soil cores provide a vertical view of everything below ground level.

These cores were taken the same day from a **Canisteo soil type**, five feet apart.

Canisteo soils are clay loam soils with a very deep A-Horizon, and can be poorly to very poorly drained with a slope of less than 2%.

## Do you notice a difference in

- > soil structure?
- > soil permeability?
- > color of soil?
- > compaction?



## So, why two cores?

The difference is one is from a site that had a continuous living root from alfalfa for five years, and the other was taken from a site with both spring and fall tillage with a corn-on-corn rotation.

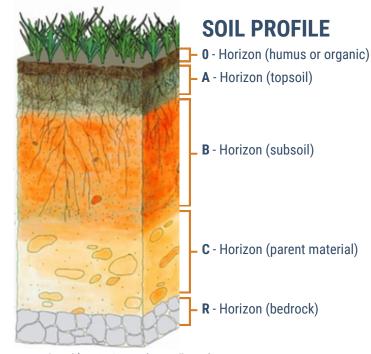


Image adapted from Razi Brown (Jotscroll, 2020)

Soil profile also helps in determining the role of the soil. Differences in factors like color, texture, structure, and thickness, as well as its chemical composition, help differentiate soil samples.

One of these might be ideal for building a foundation, but have low longer-term resilience in a cropping situation.



Our purpose is not to encourage farmers to only grow alfalfa, but to think about adding more living cover for longer time periods throughout the year. This will help you build more topsoil, which leads to higher organic matter numbers, more stable aggregates, and increased water infiltration. All these benefits will reduce erosion and keep topsoil in place to ensure farming remains profitable for years to come.



