

# Strip Tillage can improve Soil Quality characteristics - Porosity

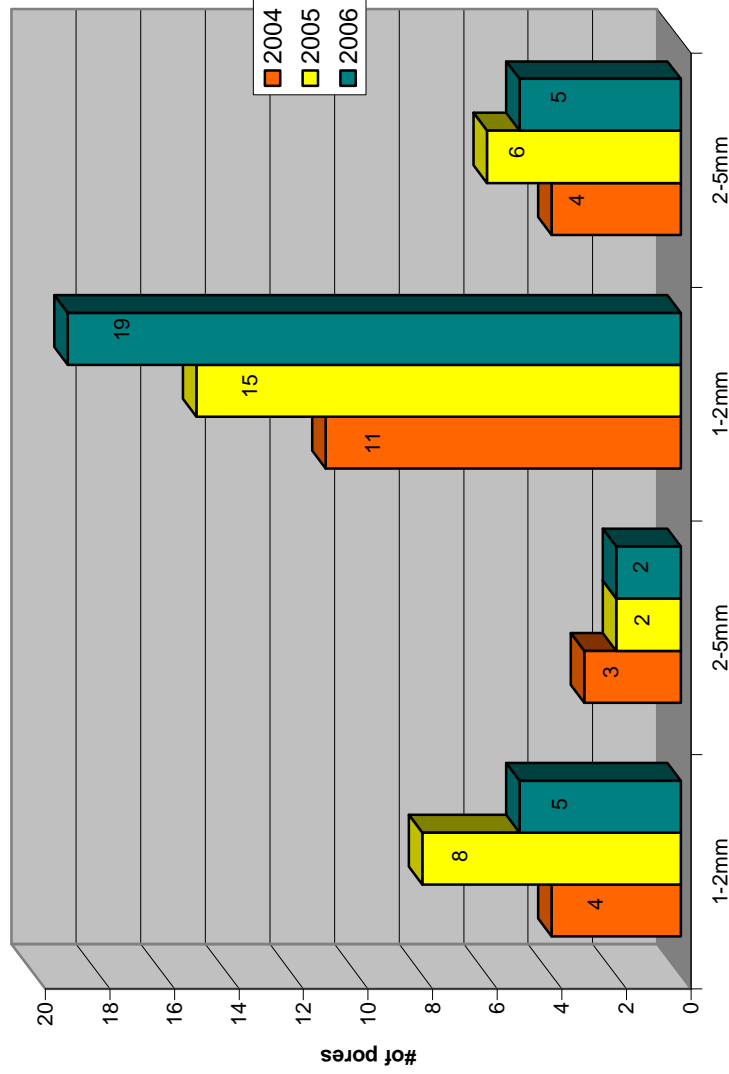
*A typical measurement of Soil Quality is porosity, which is an indicator of water infiltration and downward movement. We have used a modified version of USDA-Soil Survey methods of counting pores with a 10X hand lens to count pores over a 10cmx10cm area - 1 decimeter.*

*These just visible to the naked eye sized pores hold water and gases such as oxygen and carbon dioxide for root uptake. The 3 years of our observations indicate that the pores in the 1-2 mm size are just over 1.8-3.8X more in total number in strip-filled soils compared to the conventional till. The 2-5 mm pores are 1.3 to 3X more, strip-till to conventionally tilled.*

*These measurements were made in mid-late April of each year.*

*May 2006*

Comparison of Porosity Pore Size 1 to 5 mm size 2004 to 2006



Conventional-Till (left) Strip-Till (right) -- measurement of pore sizes 1-2, 2-5mm. Samples of 7 decimeter sites (values are averages of range over 7 sites)