Protocol for Soil Profile Pits

- Soil profile pits are dug at each plot for soil classification and determination of bulk density in subsurface soil horizons. Additional samples are taken by augering through the pit floor.

- Between 1 and 6 profile pits are required at each plot, depending on the size of the plot and the complexity of the soils, geology, and topography. For a typical 50 ha plot, between 4 and 6 pits are required.

- The profile pits are located around the outside of the census plot (usually 20-40 m from the plot boundary).

- Pits are 2 m deep, 1.5 m across the face, and 2 m long. They should be located away from large trees.

- Any large stones removed during excavation should be placed to one side for later assessment.

- The front of the pit, on the uphill side, is used for classification and sampling. It is therefore important that this area is not walked on during the digging.

- Soil should be piled behind (downhill) or to one side of the pit.

- It is convenient to leave steps down to the pit floor on the back (downhill) side of the pit.

- A fence should be placed around each pit, to prevent animals (and people!) falling in. This can be made of wire mesh with metal stakes.