Glossary:Conservational tillage

Statistics Explained

Conservational tillage refers to the arable land treated by conservation (low) tillage, which is a tillage practice or system of practices that leaves plant residues (at least 30 %) on the soil surface for erosion control and moisture conservation, normally by not inverting the soil.

Conservation tillage can include the following systems:

- Strip tillage or zonal tillage refers to a system where strips 5 to 20 cm in width are prepared to receive the seed whilst the soil along the intervening bands is not disturbed and remains covered with residues. The system causes more soil disturbance and provides less cover along the rows than zero tillage.
- **Tined tillage or vertical tillage** refers to a system where the arable land is prepared with equipment which does not invert the soil and which cause little compaction. For this reason, the surface normally remains with a good cover of residues on the surface.
- Ridge tillage is a system of ridges and furrows. The ridges may be narrow or wide and the furrows can be parallel to the contour lines or constructed with a slight slope, depending on whether the objective is to conserve moisture or to drain excess moisture. The ridges can be semi-permanent or be constructed each year which will govern the amount of residue material that remains on the surface.

Further information

• FAO - Soil tillage in Africa: needs and challenges 1993 - Chapter 8 Conservation tillage for increased crop production

Related concepts

- Conventional tillage
- Tillage practices
- Zero tillage

Statistical data

· Agri-environmental indicator - tillage practices