

Water & Sediment Control Basin

PRACTICE INTRODUCTION

USDA, Natural Resources Conservation Service - practice code 638



DEFINITION

A water and sediment control basin (WASCOB) is an earth embankment or combination ridge and channel constructed across the slope and minor water courses to form a sediment trap and water detention basin.

PRACTICE INFORMATION

The purpose of this practice is to improve farmability of sloping land, reduce erosion, trap sediment and reduce and manage runoff.

This practice applies to sites where:

- The topography is generally irregular.
- Water concentrates and causes gullies to form.
- Sheet and rill erosion is controlled by other conservation practices.
- Runoff and sediment are causing damage to land, crops, water or farm facilities.
- Adequate outlets can be provided.

Contour farming, stripcropping, terraces and other practices based on contouring may be more difficult to implement on fields where this practice is used.

WASCOBs are generally installed on land that is relatively steep and undulating with defined drainageways. WASCOBs alone may not be sufficient to control sheet and rill erosion. For this reason, additional practices may be needed adequately to protect sloping upland areas from erosion.

Crop rotations and residue management that leave the crop residues on the soil surface are commonly used inconjunction with this practice to reduce sheet and rill erosion. On fields where contouring is not practical, farming across the slope will help to reduce the velocity of runoff water.

Underground outlets from WASCOBs can provide a direct conduit to receiving waters for contaminated runoff from crop land. Install WASCOBs as part of resource management plan that addresses issues such as nutrient and pest management, residue management and filter areas.

Additional information including design criteria and specifications are in the local NRCS Field Office Technical Guide.

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