

Best Farming Management Practices

By Jack

A barnyard becomes a sea of mud in a rainstorm. This water, carrying the manure of all the cows and other animals living there, either washes into the soil or into a stream. Either way, it's eventually going to get into a body of water. Not only is this not nice to look at, but it can seriously damage our water and our soil. And this is only one example of the myriad things we can do to ruin our land and our watershed.

So what can farmers do to help preserve their topsoil and protect their water sources? Before I answer that, maybe I should explain why we want to preserve our topsoil. The topsoil is the most fertile layer of the soil, and it can take 1000 years to accumulate just one inch of topsoil. In contrast, it can take about one minute for that to wash or blow away if you don't protect it. What will be left will be barren, infertile soil.

So what can a farmer do? Well, in the above example, a concrete barnyard with curbing can keep manure from washing into the river, and a roof on the barn can keep the piled manure from getting wet in the first place. But there are a few named Best Management Practices which can help out a farmer interested in preserving his water and soil.

Contour Stripcropping is a system of growing crops in approximately even width strips or bands on the contours of a hill to reduce soil erosion. Combined with crop rotation, this can reduce soil loss by up to 75%. Cropland Terraces are earthen channels and ridge structures that intercept runoff on moderate slopes. They basically turn long slopes into lots of little slopes. They reduce the rate of runoff and cleaner water is then carried off the field in a non-erosive manner.

A Diversion is a channel and ridge system similar to a terrace that diverts excess runoff from steeper farm fields. It is used on steeper slopes where terraces would be too expensive or difficult to build, maintain or farm. Grassed Waterways are areas planted with grass where water usually concentrates as it runs off a field. Grass in the waterway slows the water and guides it off the field, reducing gully erosion.

There are several other types of Best Management Practices, such as Conservation Buffers, Crop Rotation, Cover Crops, Crop Residue Management and No Till Farming, most of which are pretty self explanatory but are just as useful for protecting your topsoil. I hope that this article gave you a basic look at how we can protect our soil and water, and a good idea of why that is important. We must always remember that soil is essential to life on earth.

Sources:

Erosion and Sedimentation Slideshow, made by the North Hampton Country Conservation District, PA

Lisa Dunne, Watershed Ambassador