

Water Diverters Installed at Greenway Cemetery

Submitted by Warm Springs Watershed Association

On October 23, 2015, four water diverters were installed on a hilly road at the north end of Greenway Cemetery near Berkeley Springs, WV. The diverters, which are made out of treated lumber and recycled conveyor belts, were installed at a 30 degree angle to the road to divert water into an existing ditch and culvert system next to the road. Bob Wurster, Stan Oaks and Brian McCann constructed the devices. The Mellott Company in Warfordsburg, PA donated the recycled conveyor belts. GHS Incorporated, a Morgan County company, dug the trenches into which the diverters were fitted and then compacted the material replaced in the trenches. The project was funded by a Stream Partners grant awarded to the Warm Springs Watershed Association in an effort to reduce erosion and stormwater runoff on this road.

Rebecca MacLeod checked the system during a rainstorm and determined they are indeed doing their job.



Installation of the water diverters

Plans on how to construct and install water diverters are widely available on the Internet, and the devices have been successfully used on certain types of roads throughout the country. However, this is the first time such devices were installed in the Eastern Panhandle of Western Virginia. In the process of installing the water diverters, it became apparent that some adjustments were necessary. For example, Dennis Schaeffer of GHS felt that over time just replacing and compacting the soil dug up from the trenches might not be sufficient to hold the diverters in place when cars drove over them. Compacted crusher run was then used to secure the diverters.

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After installation

The Warm Springs Watershed has further plans to reduce erosion and stormwater runoff in this section of Greenway Cemetery. Where appropriate, ditches will be replaced by swales that better hold stormwater runoff until it can be absorbed into the ground. No- or low-mow grasses will be planted in the swales to catch eroded material; the roots of these plants will draw in water, ultimately preventing it from flowing downhill.

Erosion and stormwater runoff from the cemetery contribute to the severity of flooding in nearby Warm Springs Run. Eroded material fills the bottom of the stream, thus making it shallower and less able to hold significant quantities of rain. Stormwater runoff that is captured and held by swales, and then absorbed by plants never makes it to the stream.