

2017 Partners in Watershed Management Grants

Project No. 1 **South Fork Licking River Debris Removal**
Applicant Licking County Soil and Water Conservation District
Total Project Cost \$29,400.00
MWCD Grant \$28,000.00

PROJECT DESCRIPTION

The South Fork Licking River is a fairly-large watershed. The low-lying areas around the river have struggled with flooding for many years. The area is relative flat and due to the grade of the river, flooding occurs upstream. The river’s capacity has also been tested by Buckeye Lake dam releases and increased development over time. More recently, a Hebron flood study and a channel widening project have aimed to address the South Fork’s ability to effectively carry storm water downstream. Recently, a significant collection of log jams was discovered on the South Fork in an urban/agriculture interface. The river banks and buffer area are forested and generally out of sight. This location allowed debris to build up without anyone’s knowledge.

Over time, small jams have grown larger by new debris lodging among the original debris. The river has naturally mitigated the jams within the floodplain by creating new paths, creating a braided stretch of river. As the river carves a new pathway, sediment erosion is an issue as the newly-carved channels re-enter the main stem of the South Fork. The new pathways have been blocked by new debris and the problem continues. If the river continues to reroute itself each time a new log jam forms, the river could meander into the Hebron Industrial Complex to the west. So far, all the new stream channels are to the west/northwest of the main stem South Fork. Currently, during high rainfall, the South Fork Licking River floods and multiple communities from Pataskala to Hebron are evacuated for their safety. This project proposes removing the debris field’s large logs in the main stem of the South Fork Licking River. Access to the project is via an existing agricultural access road; a graveled access ramp will also be created. The landowner gives permission to use the road and execute the project. The project crew will use specialized equipment including a vehicle with a long-arm boom to not enter the stream. Additionally, properly trained individuals will operate chainsaws to free up the large debris. No heavy equipment will enter the river.

Project No. 2 **Jackson Township Debris Removal**
Applicant Jackson Township Trustees, Guernsey County
Total Project Cost \$30,328.32
MWCD Grant \$14,584.32

PROJECT DESCRIPTION

The area of this debris removal project has long been susceptible to flooding in the past and is causing erosion issues along Wills Creek and flooding in the bottoms of the Village of Byesville. The goal of this project is to successfully remove multiple log jams and flood debris and to move it to an area that is away from potential flooding (to ensure that it does not end up back in the waterways). The success of this project will be determined by the decrease in erosion and flooding issues during periods of heavy rain with the primary benefactors being the residents in the bottoms of the Village of Byesville. Also, Jackson Township will be using the Guernsey County Community Development Corporations road crews for this work. They have the manpower and equipment necessary to complete the task. In addition, its workforce development project helps individuals who have suffered from long-term unemployment by giving them the training and skills necessary to seek employment in the construction industry.

Project No. 3 **Camp Piedmont WWTP Improvements**
Applicant Eastern Ohio Extension Camps, Inc.
Total Project Cost \$300,000.00
MWCD Grant \$50,000.00

PROJECT DESCRIPTION

The Eastern Ohio Extension Camps received financial assistance to repair an aging and potentially failing wastewater system at 4-H Camp Piedmont on Piedmont Lake. The current package plant is not compliant with Ohio EPA requirements, which places the water quality and recreational use of Piedmont Lake at risk. The proposed project includes removal of the existing package plant and installation of a new recirculating sand filter treatment facility. The new treatment plant would include a 20,000-gallon pretreatment tank, a 7,000-gallon recirculation tank, and 1,000-square-foot sand filter with 7,000 GPD ultraviolet disinfection.

Wastewater treatment and collection system projects have an immediate water quality impact. Located directly on Piedmont Lake, this project has been identified as a Priority Level One wastewater system project. The project replaces a potentially failing package plant, ensuring compliance with the Ohio EPA and eliminating untreated wastewater from discharging directly into Piedmont Lake.

Project No. 4 **Zoar Log Jam Removal - DRP**
Applicant **Tuscarawas Soil and Water Conservation District**
Total Project Cost \$59,190.00
MWCD Grant \$46,440.00

PROJECT DESCRIPTION

This debris removal project consisted of a large log jam at an iron truss walk bridge located west of Dover-Zoar Road and north of Towpath Road (directly across from Canal Tavern). The project included coordination with adjacent landowners to access equipment to site, brush clearing and rough access road construction for access, removal, loading, hauling, grinding and disposal of trees, cleanup and reseeding of the site. The work was performed in cooperation with the Tuscarawas County Engineer.

Project No. 5 **Valley Township – Buffalo Ball Fields DRP**
Applicant Valley Township Trustees, Guernsey County
Total Project Cost \$9,471.96
MWCD Grant \$7,503.96

PROJECT DESCRIPTION

This debris removal project consisted of two large log jams located in Wills Creek and adjacent to the area known as the Buffalo Ball Fields and Minors Park, a new complex that consists of three little league fields that are utilized by the area youth. The goal of this project is to successfully remove the log jams and flood debris and to move it to an area that is away from potential flooding (to ensure that it does not end up back into the water). The success of this project will be determined by the decrease in flood issues during periods of heavy rain with the primary benefactors being the residents in Buffalo and the youth of Guernsey County that play on the adjacent ball fields and residents of Valley Township and Pleasant City.

Valley Township will use the Guernsey County Community Development Corporations (CDC) labor crews for this work. The CDC has the manpower and equipment necessary to complete the task. In addition, its workforce development project helps individuals who have suffered from long-term unemployment by given them the training and skills necessary to seek employment in the construction and labor industry.

Project No. 6 Killbuck Wetlands Acquisition and Conservation

Applicant Holmes County Park District

Total Project Cost \$122,648.00

MWCD Grant \$25,000.00

PROJECT DESCRIPTION

The Holmes County Park District received financial assistance to acquire 35 acres of wetlands and woodlands, along 1,600 feet of the Killbuck Creek in Killbuck Township. The property also includes a portion of the Holmes County Trail. The wetlands provide important water quality and wildlife habitat components, and its connection to the Holmes County Trail offers public access and an educational outreach component.

The property acquisition will ensure the perpetual protection and conservation of ecologically important wetlands. The property acquisition will maintain and improve water quality of the Killbuck Creek, preserve wildlife habitat, and provide opportunities for educational programming.

The applicant received a \$91,963 Clean Ohio Conservation Fund grant through the Ohio Public Works Commission as match for this grant request.

Project No. 7 Township Road 451 Stream Bank Stabilization

Applicant Washington Township (Holmes County)

Total Project Cost \$77,300.00

MWCD Grant \$65,000.00

PROJECT DESCRIPTION

In 2016, Washington Township in Holmes County received a Partners in Watershed Management grant for the design and engineering of a bank stabilization project along the Mohican River and Township Road 451. The proposed project received additional financial assistance for the construction of the recommended stabilization solution: the installation of an articulating concrete block revetment anchored together with steel cables and conforming to the shape of the slope. The project will also include curbing along Township Road 451 to prevent roadway run-off from eroding channels in the streambank.

The project will stabilize a severely eroded bank of the Mohican River, which will protect the township road and improve public health and safety. By reducing erosion and sedimentation, this project will positively affect the water quality of the Mohican River.

Project No. 8 Blackberry Alley Restoration Project

Applicant City of Mount Vernon

Total Project Cost \$370,267.00

MWCD Grant \$135,000.00

PROJECT DESCRIPTION

The City of Mount Vernon received financial assistance to address storm water management in its urban core with an innovative underground detention and infiltration system project. The Blackberry Alley Restoration Project includes a complete reconstruction of the brick roadway, curbs, sidewalks, and extensive water quality and flood reduction measures, utilizing underground retention and infiltration systems. The underground retention system includes 2,300 square feet of infiltration area and 8,530 cubic feet of capacity within the stone backfill and storm chambers. The project will reduce peak discharge and downstream flooding on the Kokosing River.

The project will reduce storm water runoff, promote the infiltration and treatment, and positively affect the water quality of the Kokosing River. The Blackberry Alley Restoration represents the first project of the City of Mount Vernon's Green Infrastructure Program.

Project No. 9 **Muskingum River Gage at McConnellsville**
Applicant Heidelberg University, National Center for Water Quality Research
Total Project Cost \$20,580.00
MWCD Grant \$10,000.00

PROJECT DESCRIPTION

The National Center for Water Quality Research (NCWQR) of Heidelberg University received financial assistance to continue the operation and maintenance of the water quality monitoring station on the lower Muskingum River at McConnellsville in Morgan County. The monitoring station collects a number of water quality data, including concentrations of nutrients, total suspended solids, and amounts of sediments transported downstream. The nutrient and sediment data are used by scientists and policy makers. PWM grant funding partially funded the operation of the gage in 2015 and 2016.

The gage provides important water quality data that is used extensively by government agencies, educational institutions, commercial organizations, and non-profits. The data show trends and patterns in water quality, measure pollutant loads, and analyze the effectiveness of best management practice implementation.

Project No. 10 **Lock 10 Debris Removal Project**
Applicant City of Zanesville
Total Project Cost \$176,000.00
MWCD Grant \$13,000.00

PROJECT DESCRIPTION

The City of Zanesville received financial assistance to remove a significant log jam at the Lock 10 Dam on the Muskingum River. The log jam has caused erosion and sedimentation, which has threatened scouring along the Lock 10 Dam. The mass of the debris also presents a potential risk of a dam breach, which would lead to significant flooding.

The project will remove a significant log jam at Lock 10 on the Muskingum River. The removal of the debris will lessen the pressure on the Lock 10 Dam, improve the water quality of the Muskingum River, and enhance the scenic riverbank within the City of Zanesville.

Project No. 11 **Tuscarawas River Improvement Corridor**
Applicant City of Massillon

Total Project Cost \$30,119.00
MWCD Grant \$22,500.00

PROJECT DESCRIPTION

The City of Massillon received financial assistance to develop a plan to embrace and revitalize the Tuscarawas River through the City of Massillon. The City of Massillon and the Third Century Massillon Committee are working together to promote the Tuscarawas River as a vibrant natural resource and economic, cultural, and educational asset. The proposed project will collect data, identify existing conditions and issues, coordinate with agencies, recommend development projects, and identify potential funding sources.

The project will develop an implementation plan for water quality and habitat improvements to the Tuscarawas River through the City of Massillon. While working within the current flood control facilities, the plan that will also identify solutions to maximize the inherent economic, cultural, and educational potential of the Tuscarawas River.

Project No. 12 **Wilmot Stream Restoration Project**
Applicant Village of Wilmot
Total Project Cost \$439,094.00
MWCD Grant \$130,000.00

PROJECT DESCRIPTION

The Village of Wilmot received financial assistance to restore the natural stream channel of a tributary to the Middle Fork Sugar Creek in the Village of Wilmot. The project will restore approximately 1,100 feet of stream and adjacent floodplain in the Village. The Village of Wilmot was awarded a Partners in Watershed Management grant in 2016 for the design and engineering of this project. The construction portion of the project includes the creation of a floodplain bench, installation of scour protection, and re-vegetation of the riparian corridor using aggressive native vegetation.

The project will support the restoration of the stream’s flood storage capacity and connection with its floodplain. The project will also reduce erosion and sedimentation. The project will primarily benefit residents in the Village of Wilmot. The project will result in a more stable streambank, which will protect adjacent residential dwellings. The floodplain bench and reduction in sediment loads will provide flood reduction benefits and improved water quality.

The Village of Wilmot is also seeking a Clean Ohio Conservation Fund grant for a significant portion of its proposed local match.

Project No. 13 **Regional Stormwater Basin Study**
Applicant City of Green
Total Project Cost \$59,500.00
MWCD Grant \$50,000.00

PROJECT DESCRIPTION

The City of Green received financial assistance to address regional storm water management and flooding. Heavy rain events contribute to regular flooding in the southeastern corner of the City of Green, as well as increased water volume and peak flow into the Zimber Ditch in Stark County. The Regional Stormwater Basin Study will provide for the design of the proposed basin to alleviate this flooding. The project will include the

development of an as-built survey, an in-depth review of existing conditions, an environmental review, geotechnical investigation, and development of a preliminary design.

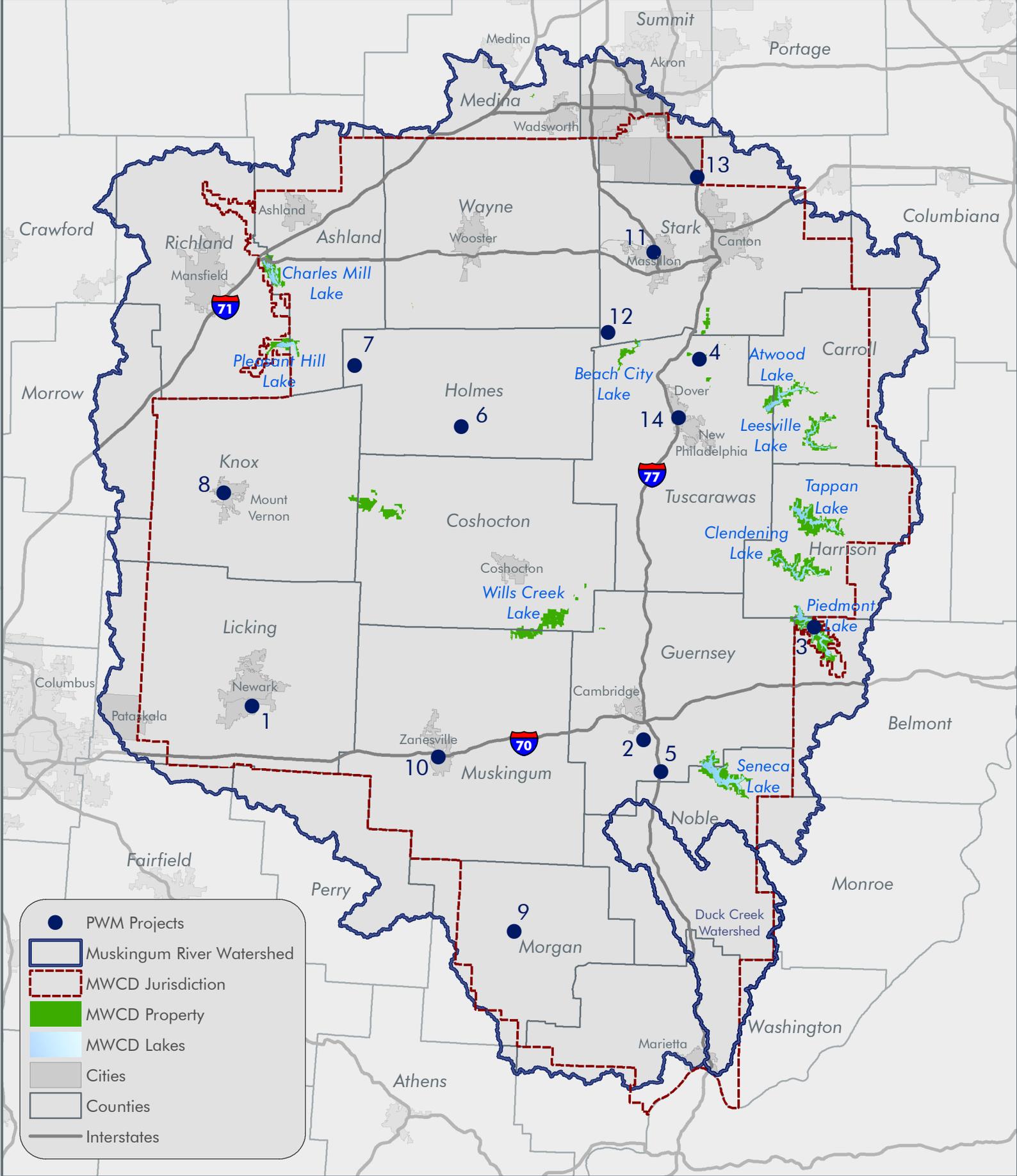
The project will reduce flooding impacts locally in the City of Green and downstream along the Zimber Ditch in Stark County. The project will primarily benefit the residents of the City of Green and the Zimber Ditch Watershed.

Project No. 14	Dover Low-Head Dam Monitoring Project
Applicant	City of Dover
Total Project Cost	\$18,687.00
MWCD Grant	\$12,500.00

PROJECT DESCRIPTION

The City of Dover received financial assistance to monitor habitat and biological water quality around the low-head dam on the Tuscarawas River. The project will include three sites for monitoring fish, aquatic macroinvertebrates, and habitat following Ohio Environmental Protection Agency level three credible data collection guidelines. The data collection will help the City of Dover consider options for maintenance and possible future modifications. Low-head dams have been documented to have a detrimental environmental impact on the aquatic life and water quality of their associated water features. Biological and water quality monitoring data are required for any future dam modification projects.

The project will study habitat and biological water quality near the Dover low-head dam. The results of the analysis will assist the City of Dover in considering options for maintenance and possible future modifications. The monitoring project will provide the City of Dover with invaluable information necessary for making future decisions regarding maintenance or future modifications.



Partners in Watershed Management 2017 Grant Recipients



Sources: MWCD, ESRI, ODNR, ODOT, USGS