

Upper Goose Creek, Cromwells Run, and Little River Implementation Plan Agricultural & Residential Working Groups Meeting

September 22, 2016

Meeting Notes

Location: Wakefield School
4439 Old Tavern Road
The Plains, VA

Start: 6:00 p.m.

End: 8:00 p.m.

Meeting Attendance:

May Sligh, VA Department of Environmental Quality (DEQ), Facilitator
Heidi Moltz, Interstate Commission on the Potomac River Basin (ICPRB), Facilitator
Scott Kaiser, Interstate Commission on the Potomac River Basin (ICPRB), Facilitator
Patrick Mauney, Rappahannock-Rapidan Regional Commission (RRRC), Scribe
Gem Bingol, Piedmont Environmental Council (PEC)
Warren Darrell, Citizen
Mike Kane, Piedmont Environmental Council (PEC)
Matt Kowalski, Chesapeake Bay Foundation
Kaitlin Ranger, VA Department of Environmental Quality (DEQ)
Jim Sawyer, Fauquier County Community Development
Ben Shoemaker, Loudoun Water
Rebecca Shoemaker, VA Department of Environmental Quality (DEQ)
Jeff Sledjeski, Citizen
Tom Turner, John Marshall Soil and Water Conservation District
Marcia Woolman, Goose Creek Association

I. Welcome & Introductions

May Sligh (DEQ) welcomed attendees to the second agricultural and residential working group meetings for the Upper Goose Creek, Cromwells Run, and Little Rivers Total Maximum Daily Load (TMDL) Implementation Plan, and provided background information on the purpose of the planning effort and activities to date.

II. Gilberts Corner Farm Project

Mike Kane (PEC) discussed the ongoing Gilberts Corner Farm Project as an example of a project that manages agricultural property for multiple objectives, including agriculture production, wildlife, and water quality. PEC acquired the property, which is located east of the Gilberts Corner traffic circle, in 2013. Historically, the property was used for cattle grazing with no stream fencing in place. Following acquisition, PEC completed water quality testing at four locations on Howsers Branch within the parcel boundaries and developed a plan to create separated pastures to foster rotational grazing practices. Utilizing the 100% cost share program for stream fencing through the Soil and Water Conservation District, more than two miles of stream fencing was installed. In addition, two hardened crossings across Howsers Branch and 4,400 feet of piping emanating from a well located in the middle of the property and connecting to 6 tank vaults were installed to support the rotational grazing practices. The total cost of the project was around \$125,000, with over \$112,000 of that cost reimbursed through the cost-share program. A portion of the property acquired by PEC was also transferred to the Northern Virginia Park Authority for inclusion in the Gilberts Corner Regional Park.

Meeting attendees had several questions for Mr. Kane.

Q: Who is farming the land?

A: There was an existing lease with a private farmer at the time of acquisition that remains in place today. PEC is interested in exploring long-term lease possibilities.

Q: Is PEC interested in on-farm, educational opportunities?

A: Yes, a number of field walks have been held, with the next one scheduled for mid-October. The property has historical significance, as well, with part of the Old Carolina Road running on the property.

Q: Were there significant issues related to invasive plant species?

A: There were some issues, but not terrible. The land was primarily used for grazing, so there were no major problems with exotic invasive species.

III. Joint Agriculture/Residential Work Sessions

Meeting attendees reviewed handouts and answered questions during a session facilitated by May Sligh (DEQ). Copies of the handouts are available on [DEQ's webpage](#) or on [RRRC's webpage](#).

Comments during the Agricultural Work Session included:

- There is a general lack of interest in stream fencing, even with 100% cost share programs. Many farmers do not want to give up the amount of land needed for a 35 foot buffer. May Sligh (DEQ) noted that with the TMDL implementation plan in place, there is the potential for 10 foot buffers to be implemented, but with only 50% cost share.
- Scott Kaiser (ICPRB) discussed the activities that have taken place in the watershed since the initial TMDL development in 2002. In the interim period, 46% of opportunity fencing has been put in place in the watershed, which is a positive indicator for overall participation and implementation of stream exclusion fencing. That percentage may reflect low-hanging fruit.
 - Questions regarding the methodology for calculating the 46% figure were raised. Mr. Kaiser indicated that the total opportunity figure was derived based on the linear feet of streams intersecting pasture (fallow or hay-crop) in the watershed based on aerial imagery. Tom Turner (JMSWCD) indicated that much of this watershed would be difficult to assess based solely on aerial photography and suggested making an on the ground stream fencing inventory a priority.
 - There was a question regarding whether wooded areas were captured as part of the inventory. Mr. Kaiser indicated that they were not captured in this exercise. May Sligh (DEQ) referenced the Woodland Filter Buffer Area program (FR-3) on the handout as a potential implementation strategy to focus on.
 - Attendees suggested the possibility of overlaying easement data with fencing as another method of identifying where stream exclusion fencing might not be in place, as the vast majority of the watershed is in conservation easement at present
- Piedmont Environmental Council and Goose Creek Foundation were identified as the best methods for communicating information about conservation programs to farmers. Overall, the watershed is positioned favorably for education and outreach compared to other watersheds.
- Meeting attendees suggested that John Marshall Soil & Water Conservation District and Loudoun Soil & Water Conservation District continue to work with public and private schools, and specifically with the Future Farmers of America programs to share information. Marcia Woolman (Goose Creek Association) indicated that she has had success working with club organizations in Loudoun County

that are often in need of community service credits. Working with school systems outside the watershed was also suggested (Fairfax was specifically mentioned).

- Matt Kowalski (Chesapeake Bay Foundation) asked about alternative fencing installations. There has been successful use of hot wire fencing for stream exclusion in the Valley at a much lower cost. Meeting attendees indicated that the Valley has a history of using hot wire fencing, but it is not as common in this region, and also noted that the presence of deer and the need for active management and maintenance also may be obstacles to implementation in this watershed.
- Other outreach opportunities and/or partners that were referenced during the discussion included hunt clubs, local veterinarians (including those making house calls), and cattleman's associations

During the discussion, attendees were asked to rank a set of seven (7) best management practices and five (5) obstacles to addressing the bacteria impairments relative to their applicability to agricultural lands in the watershed. Results were tabulated following the meeting and are shown below.

Potential best management practices for consideration:

Please rank the practices included in the table below (7 total) with 1 being the highest priority practice (one that you feel is most applicable in the area) and 7 being the very lowest priority (one that you feel is the least applicable to area farms). *Note: Rank is an average of responses (n=6).*

Best management practice	Description	Rank (1-7)
Streamside livestock exclusion fencing	Excluding livestock from streams with fencing, providing alternative water sources or limited access points to the stream	1.0
Rotational grazing/Grazing land management	Establishing a series of grazing paddocks with cross fencing and rotating livestock to maximize forage production while preventing overgrazing	3.2
Forested streamside buffers	Planting trees and shrubs in strips (35 foot minimum) along streams adjacent to pasture and cropland	3.2
Grassed streamside buffers	Planting grasses in strips (35 foot minimum) along streams adjacent to pasture and cropland	4.3
Forestation of crop, pasture or hayland	Convert existing pasture, crop or hayland to forest (hardwood or conifers)	6.0
Continuous no-till/Conservation Tillage	Cropland is planted and maintained using no-till methods, only effective in reducing bacteria for cropland receiving manure applications (not commercial fertilizer)	5.8
Manure composting/storage facilities (equine)	Construction of planned system designed to manage solid equine waste from areas where horses are concentrated either through composting or storage	4.5

Obstacles to streamside livestock exclusion:

In order to address the bacteria problem in the Upper Goose Creek watershed, livestock will have to be excluded from the stream. In order to identify the best way to accomplish this, it's important to understand the obstacles to fencing livestock out. Please rank the following obstacles to fencing livestock out of streams 1-5 with 1 being the most common and relevant obstacle to address and 5 being the least common or relevant obstacle. *Note: Rank is an average of responses (n=6).*

Obstacle	Rank (1-5)
The cost of installing fencing and off stream water is too high, even with cost share	2

assistance from federal and state programs	
Cannot afford to give up the land for a 35 foot buffer	2.3
General maintenance of fencing is time consuming and expensive	3.7
Grazing land is rented with short term leases and landowners are not interested in installing and/or maintaining streamside fencing and off stream water	2.8
People do not trust the government and do not want to work through state and federal cost share programs to installing fencing systems	4.2

The discussion then shifted to the residential work group handout and associated questions. Comments during the Residential Work Session included:

- There are ongoing changes to methods of monitoring and enforcing failing septic systems by the Virginia Department of Health related to determinations of malfunctioning system versus a system requiring repair.
- Most residents are unaware of septic system maintenance needs.
- Loudoun County has a strong septic inspection program that requires once per year examinations. Fauquier County has less stringent inspection at present.
- Meeting attendees responded favorably to the idea of septic tank pump out program in the watershed, and were also in favor of having no restrictions based on distance from streams.
- Straight pipes were not identified as a major problem in the watershed area. Those that may be found in the watershed were more likely found with older house along smaller creeks and/or swales, and may not be easy to locate and identify using float trips.
- Alternative septic systems are prevalent in the watershed, and the larger issue is that most owners do not understand the maintenance requirements or procedures, whether due to lack of education on the subject or lack of disclosure in some instances.
- Connecting failing septic systems to public sewer may be possible in parts of Loudoun County.
- Meeting attendees identified a number of locations where pet waste stations might be located: Wildlife Management Areas in the western part of the watershed; Upperville Showgrounds; County parks in both Fauquier and Loudoun; Canoe launches. Pet waste composters have been difficult to move in other rural watersheds, but may have better success here. Education is the key, inclusive of outreach to homeowners associations and developing estimates of the amount of pet waste based on number of houses, number of pets.
- Homeowner education should be done in conjunction with agricultural cost-share education. One drawback in this watershed is that septic cost share is lower than in other Soil & Water Conservation Districts.
- Meeting attendees suggested that education on equine waste was an important topic in the watershed. May Sligh (DEQ) discussed a pilot horse manure compost project in Caroline and Hanover counties that may be replicable. Partnering with the Middleburg Agricultural Research and Extension (MARE) Center in Middleburg may be a valuable exercise in the future.
- Barn run-off was also cited as a topic for additional education and outreach
- Master naturalist organizations were cited as a strong resource in the area for assisting with native plant education and tree planting efforts.

May Sligh requested that attendees pass along additional ideas to Sarah Marsala at DEQ (sarah.marsala@deq.virginia.gov). The meeting ended at 8:00 p.m.