

Total Maximum Daily Load Implementation Plan (TMDL-IP)

Upper York River Watershed

Goldmine Creek (Louisa County),
Beaver Creek, Mountain Run, Pamunkey Creek, Terry's Run (Orange County),
Plentiful Creek (Spotsylvania County)

- First Residential Working Group Meeting -

February 8, 2011- 7 PM

Town of Orange Public Works Community Room,
235 Warren Street, Orange VA

Attendance

Joshua Bateman, Director, Community Development, Town of Orange

Deirdre Clark, R-RRC

Stephanie DeNicola, Culpeper SWCD

Christopher Owens, Citizen

Alex Ramey, Eastern View High School

Richela Rosales, Eastern View High School

Chip Russell, Virginia Department of Health

Jimmy Stevens, Citizen

Debra Switzer, Citizen

Gary Switzer, Virginia Department of Health

May Sligh, VA Dept. of Conservation and Recreation

Greg Wichelns, Culpeper SWCD

Opening Comments

Participants were directed to the Residential Working Group (RWG) Fact Sheet and informed that they will be asked to focus on the identification and reduction of bacterial loads from human sources and pets. This will include:

- Determining strategies to identify and eliminate straight pipes and failing septic systems;
- Identifying the problems faced by landowners in remediating failing septic systems and straight pipes;
- Identifying potential funding sources for remediation;
- Identifying strategies to encourage landowners to come forward despite fear of regulatory action and un- known costs;
- Identifying the type(s)of technical assistance needed and methods of delivery;
- Identifying practical and appropriate educational tools; and
- Identifying effective pet waste management strategies.

Participants were asked to think about effective outreach strategies and how they might be received in their communities. The group was informed that their report, along with reports from the Agricultural and Government Working Groups, will be submitted to the Steering Committee for consideration for inclusion in the Implementation Plan. In addition, it was noted that members of the RWG are welcome to participate as members of the Steering Committee.

Septic System Concerns

Participants reviewed the residential best management practices listed on the RWG Fact Sheet. The limits and function of septic systems, conventional and alternative, were discussed. Comments and observations include:

- Septic pump-outs were characterized as "eye-opening" experiences for the uninformed homeowner;
- Most localities recommend pump-out every five years – not necessarily required or tracked;
- There might be opportunities within the watershed for connecting to public sewer;
- Cost estimates, as provided by Blue Ridge Environmental Solutions, seem low for both conventional and alternative systems;
 - Spotsylvania resident with property near Lake Anna was required to include a lateral ground movement barrier in the design of his system, adding significantly to the cost;
- Maintenance requirements of alternative systems are costly; and
- Greywater containing disinfectants and detergents from maintenance activities contributes to the degradation of surface and groundwater quality.

- Spotsylvania adopted Chesapeake Bay regulations countywide;
 - No enforcement program – complaint driven.
 - Many landowners do not comply;
 - Septic systems may not be constructed within the 75' set-back from the high water mark of Lake Anna; and
 - Some counties and localities have different shoreline setback requirements.
- **Alternative systems:**
 - Recently approved Virginia legislation allows on-site systems just about anywhere;
 - Legislation has created a climate in which land purchasers fully expect to be able to install some type of on-site treatment system on any parcel;
 - Most owners of alternative systems are uninformed of mechanical function, costs and failure rates;
 - Many areas within the watershed are unsuited for systems of any kind – conventional or alternative;
 - Specific soils determined to be unsuitable (Louisa Comp. Plan).
 - Virginia requires that alternative systems be inspected periodically by certified inspectors;
- **Straight pipes and failing systems:**
 - Older structures along Tomahawk Creek and the Houseworth Street area (Pamunkey Watershed) should be evaluated;
 - Annexed sections of the Town of Orange may not have been connected to public sewer;
 - Older homes along Route 15 might have failures;
 - CSWCD's staff experience suggests that projected numbers of straight pipes and failing systems might be higher;
 - The general public would probably be surprised at the number of failures;
 - Identification process
 - The older the structure, the greater the probability of straight pipes and/or failing systems;
 - Homes constructed before 1960 are suspect;
 - Building inspectors and Health Dept. employees can provide information;
 - Private sector may not want to provide any information because of fiduciary responsibility to clients;
 - GIS and tax data are key elements;
 - Greywater discharge is illegal.
- **Municipal sewage treatment**
 - Town of Orange has new plant;
 - Rapidan Service Authority provides water and sewer for many parts of the watershed; and
 - Gordonsville has its own plant that most likely discharges into the North Anna.
- **Education and Outreach**
 - Information regarding septic system type, function, location and maintenance, including costs, should be included in closing documents at all home sales;
 - Realtors in other jurisdictions support requiring septic system information as part of closing documents;
 - To reach all property owners, include septic system information with tax assessments;
 - Loudoun County/ Catoclin Watershed – Health Dept. partnered with tax office to provide information resulting in good response from residents seeking technical assistance
 - Raise awareness of fact that funding and technical assistance is available;
 - Newspaper articles and word-of-mouth are most effective – more effective than brochures, mailings, etc.
 - CSWCD has had success with bulk mailings to everyone in a watershed;
 - Even if a problem is identified, a warrant may be needed to access the property; and
 - The Water Quality Improvement Fund has assisted with the repair and/or replacement of systems in various localities.

Pet-source Bacteria

Comments regarding pet waste management include:

- Most dog owners within the watershed are not inclined to practice effective pet waste management;

- Two pet waste collection kiosks have been strategically placed in the Town of Orange (Pamunkey Watershed) to encourage identified owners to clean up after their dogs;
- There are several hunt kennels in the watershed – it is doubtful that they have waste management plans;
- Although some localities require special use permits for kennels, many may be informal business or breeding facilities;
- Greywater containing disinfectants and detergents from maintenance activities contributes to degradation of surface and groundwater quality;
- **Education/Outreach:**
 - Develop and implement public information campaigns
 - "It's Your Doody" – Fauquier County
 - "Poop Fairy" – Virginia Beach
 - Devise and implement pet waste composter construction workshops similar to rain barrel workshops;
 - Work with a commercial kennel to develop and implement a watershed waste management pilot project;
 - Fauquier SPCA's waste management system could be used as a model for effective practices; and
 - Reach out to home owners associations to promote pet waste composters and other management strategies.

Enforcement Considerations

In response to a question regarding the regulation of bacterial impacts to streams, it was noted that impacts from untreated human waste are illegal and sources must be remediated. The Virginia Department of Health responds to such complaints. Agricultural producers are encouraged/ persuaded to reduce impacts that are associated with everyday farm operations; however, deliberate dumping of contaminants by agricultural operations is illegal. Such practices may be reported to the Virginia Department of Agriculture and Consumer Services which investigates claims. If a complaint is verified, the perpetrator will have a specific period in which to remediate the impact and/or effect improvements. Fines may be applied.

Next Steps

Attendees expressed interest in continuing to participate as members of the Residential Working Group. They were encouraged to inform other residents of the watershed of the TMDL-IP and invite them to attend future meetings. . Participants will be notified of future meetings. Information about the project and meeting minutes may be accessed at http://www.rregion.org/tmdl_york.html. Questions and comments are welcome. Please contact:

Deirdre Clark
 Rappahannock-Rapidan Regional Commission
 540-829-7450
dbclark@rregion.org

May Sligh
 Virginia Department of Conservation and Recreation
 804-443-1494
may.sligh@dcr.virginia.gov

Byron Petrauskas
 Blue Ridge Environmental Solutions, Inc.
 540-977-0619
byron.petrauskas@comcast.net