



David Ward
info@loudounwatershedwatch.org
Loudoun Watershed Watch
38659 Bolington Rd
Lovettsville, VA 20180

April 13, 2015

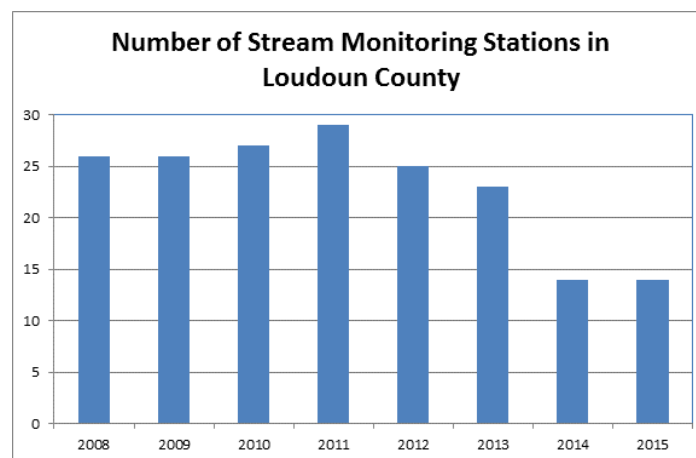
Mr. Stuart Torbeck, Water Quality Data Liaison
Virginia Dept. of Environmental Quality
629 East Main Street
Richmond, VA 23219

Sent via E-mail: charles.torbeck@deq.virginia.gov

Subject: Citizen Nomination for Stream Monitoring

Dear Mr. Torbeck:

Loudoun Watershed Watch is pleased to provide several nominations for additional stream monitoring locations to be considered for inclusion in DEQ's Water Quality Monitoring plan in calendar year (2016). We believe that this year submission of sites is especially important in that the total number of sites in Loudoun for CY 2015 is significantly less than in previous years. While we understand the rotating watershed strategy used by DEQ, we would like to add particular emphasis to our nominations this year.



We are aware that only about 30 percent of the stream miles in Loudoun County have been assessed for aquatic life use through benthic monitoring of the macroinvertebrate community in the streams. We understand that VA DEQ began stream monitoring in Loudoun County in 1994. Over the years the number in sites has grown to about a dozen sites wherein a site is typically monitored in both the spring and fall as VA DEQ requires that two benthic sampling be conducted to be used in the water quality assessment. The site locations change around as DEQ seeks to maximize coverage and, in part, because of previous site nomination submitted by Loudoun Watershed Watch.

This year our maps include stream reach nominations from previous years to help guide the 2015 selection process. We are cognizant of resource limitations are have selected four locations seeking to monitor stream reaches across the county under a variety of conditions. We have leveraged several data sources including state, county and citizen stream monitoring.

This year we utilized the state EDAS Family and Genus MS Access files with data available through Fall 2014. The 2014 DEQ data was posted in March 2015. We observed that there were several occasions in 2010 through 2012 where there were either duplicate samples or analysis of VSCI scores based on both family and genus level analysis. We chose to aggregate data for each station for each sampling period (spring and fall) into one score. We support this approach after noting the relatively variability between duplicates and between family versus genus level identification. For each aggregated results, we have posted DEQ results on the maps.

We have also used the comprehensive DEQ-approved Loudoun County Stream assessment, conducted in the spring of 2009 (<http://www.loudoun.gov/streamassessment>). This provides high-quality results using DEQ-approved protocol for 200 locations.

Additionally in recent years two active partners of Loudoun Watershed Watch, specifically Loudoun Wildlife Conservancy and Goose Creek Association have provided additional locations and multi-year benthic assessments (2008-2013). Based on the benthic assessments, as well as the habitat assessments, we have assembled a series of priority site nominations as attached.

The goal of our site nominations is to suggest stream reaches that in our opinion are strategic to support identification of both “healthy” and potentially “impaired” (for aquatic life use) segments. Based on the 2009 Loudoun County stream assessment, 78% of the streams are statistically under stress or severe stress and would be designated as impaired, however, even with 200 monitoring events from the spring of 2009, this comprehensive survey does not provide sufficient coverage of all streams in Loudoun as the goal of the study was an overall assessment and was not designed to analyze each and every segment. Furthermore, the sampling was a one-time event and VA DEQ requires at least two events during the sampling window of the assessment cycle.

Regarding bacteria monitoring, we are not nominating any additional sites as we recognize that there is a high probability (80-90 percent) that streams within Loudoun County if sufficiently monitored would probably fail to meet the recreational use criteria established by VA DEQ.

Attached are sites that we believe are priority locations for benthic monitoring in CY 2016. The nominated stream reaches include:

1. Brens Creek
2. Simpsons Creek
3. Foley Branch
4. Howsers Branch

We look forward to your response and continued efforts to evaluate stream health in Loudoun County.

Sincerely,



David Ward
Loudoun Watershed Watch

REQUEST TO INCLUDE A WATER SEGMENT IN DEQ'S ANNUAL MONITORING PLAN

Name: David Ward, Loudoun Watershed Watch Date: April 6, 2015

Mailing Address: 38659 Bolington Rd
Street

City: Lovettsville State: VA Zip: 20180

E-mail address: info@loudounwatershedwatch.org

Telephone: Home: 540-822-5092 Business: _____ Fax: _____

Geographic description of the water body:

(1) Name of the water body or segment proposed for monitoring:

Brens Creek

(2) Description of the upstream and downstream boundaries of the water body proposed for monitoring. Attach a map (preferably a photocopy of a 7.5 minute quad USGS topographic map) which delineates the boundaries:

Brens Creek runs west to east between Lovettsville and Purcellville, discharging to the mainstem of Catoctin Creek. The creek is crossed at four bridges and generally accessible from each location.

(3) Reason for requesting that this water body be monitored:

While we have suggested the mainstem of Catoctin Creek in years past. We believe that much like North Fork Catoctin Creek, understand the tributaries such as Brens Creek and Milltown Creek are essential in developing a holistic understanding of the entire Catoctin Creek watershed.

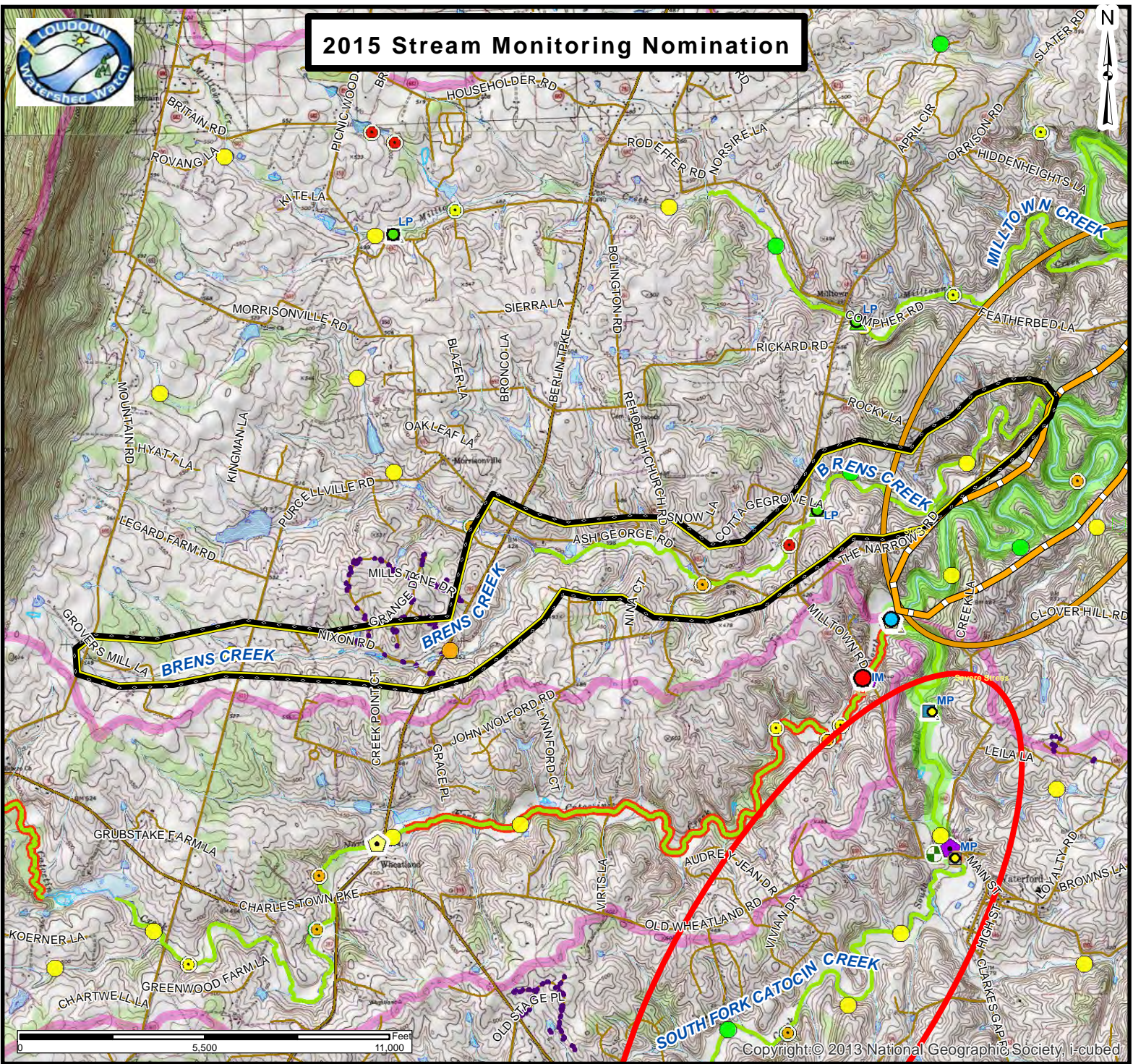
(4) Attach any water quality data that you have collected or compiled. Include the name of the organization/entity that generated the data.

Data, reports, maps, presentations and animations are presented at www.loudounwatershedwatch.org and www.loudounwatershed.org

Additional reports and interactive maps of 2009 comprehensive field surveys are presented at www.loudounwatershedwatch.org/maps.



2015 Stream Monitoring Nomination



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LWW Site Nominations 2015

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- DEQ 2012 Monitoring Stations (Benthic)**
- FS (Fully Supporting)
- IM (Impaired)
- HP (Citizen Mon - High Probability for Adverse Conditions)
- MP (Citizen Mon - Medium Probability for Adverse Conditions)
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- IN (Insufficient Data)
- J (Reserve Judgment / BPJ)

DEQ EDAS (2008 to 2013) Average SCI (2008-2013)

- Excellent (>=73)
- Good (60 - 72)
- Stress (43 - 59)
- Severe Stress (< 42)
- Citizen (VASOS) Benthic (2008-2013) Average (2008-2012)**
- Acceptable
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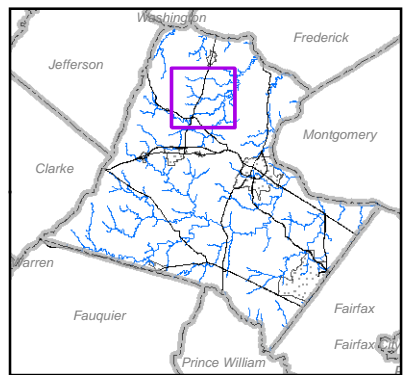
Loudoun Watershed Watch Benthic Average (1997-2007)

- Excellent
- Good
- Fair
- Poor
- Loudoun County 2009 Benthic Benthic VSCI Score**
- Excellent (> 73)
- Good (60 - 72)
- Stress (43 - 59)
- Severe Stress (< 42)
- Loudoun County 2009 Habitat Habitat Class**
- Optimal
- Suboptimal
- Marginal
- Poor

Loudoun Wildlife Conservancy Potential Sites

- USGS Streamflow Gages
- VPDES_Individual_Permit
- VPDES_General_Permit
- Impaired for Recreational Use (Bacteria) 2014
- Impaired for Aquatic Life Use (Benthic) 2014
- Impaired for Fish Consumption (PCB, Hg)
- Impaired for Fish Consumption (PCB)
- DEQ 2015 Monitoring Plan
- DEQ 2014 Monitoring Plan
- DEQ 2013 Monitoring Plan
- DEQ 2011 Monitoring Plan
- Stormwater Structures
- Treated Stormwater Area
- Scenic River
- Wastewater Discharge Facilities

Brens Creek



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(1) Name of the water body or segment proposed for monitoring:

Simpson Creek

(2) Description of the upstream and downstream boundaries of the water body proposed for monitoring. Attach a map (preferably a photocopy of a 7.5 minute quad USGS topographic map) which delineates the boundaries:

Simpson Creek originates near the Round Hill Reservoir flowing southeast under Route 7 and discharging to Sleeter Lake.

(3) Reason for requesting that this water body be monitored:

This reach has in recent years and will continue to experience impact from residential growth in the Town of Round Hill. Drinking water supplies from groundwater may be impact by town and private wells, therefore benthic surveys are suggested. While there are numerous road crossings, it is suggested Airmont Road would provide a good downstream location.

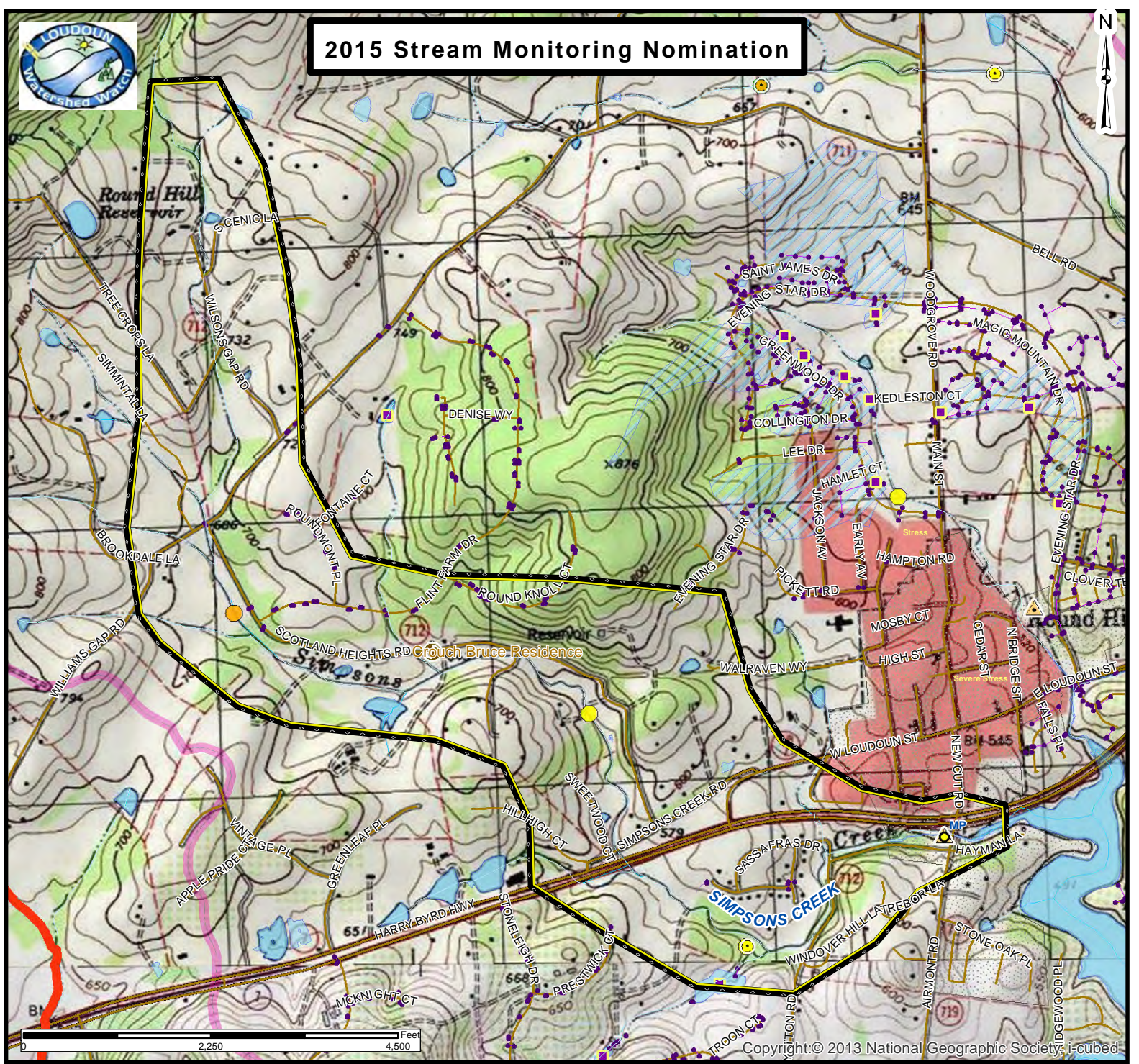
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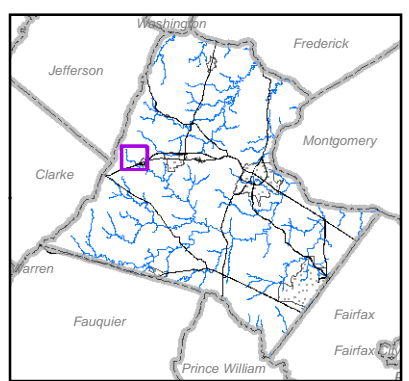
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<p>LWW Site Nominations 2015</p> <ul style="list-style-type: none"> LWW Site Nominations 2014 LWW Site Nominations 2013 LWW Site Nominations 2012 LWW Site Nominations 2011 LWW Site Nominations 2010 LWW Site Nominations 2009 <p>DEQ 2012 Monitoring Stations (Benthic)</p> <p>BENTHIC ST</p> <ul style="list-style-type: none"> FS (Fully Supporting) IM (Impaired) HP (Citizen Mon - High Probability for Adverse Conditions) MP (Citizen Mon - Medium Probability for Adverse Conditions) LP (Citizen Mon - Low Probability for Adverse Conditions) IN (Insufficient Data) J (Reserve Judgment / BPJ) 	<p>DEQ EDAS (2008 to 2013) Average SCI (2008-2013)</p> <ul style="list-style-type: none"> Excellent (>=73) Good (60 - 72) Stress (43 - 59) Severe Stress (< 42) <p>Citizen (VASOS) Benthic (2008-2013) Average (2008-2012)</p> <ul style="list-style-type: none"> Acceptable Indeterminant Unacceptable 	<p>Loudoun Watershed Watch Benthic Average (1997-2007)</p> <ul style="list-style-type: none"> Excellent Good Fair Poor <p>Loudoun County 2009 Benthic Benthic VSCI Score</p> <ul style="list-style-type: none"> Excellent (> 73) Good (60 - 72) Stress (43 - 59) Severe Stress (< 42) <p>Loudoun County 2009 Habitat Habitat Class</p> <ul style="list-style-type: none"> Optimal Suboptimal Marginal Poor 	<ul style="list-style-type: none"> Loudoun Wildlife Conservancy Potential Sites USGS Streamflow Gages VPDES_Individual_Permit VPDES_General_Permit Impaired for Recreational Use (Bacteria) 2014 Impaired for Aquatic Life Use (Benthic) 2014 Impaired for Fish Consumption (PCB, Hg) Impaired for Fish Consumption (PCB) DEQ 2015 Monitoring Plan DEQ 2014 Monitoring Plan DEQ 2013 Monitoring Plan DEQ 2011 Monitoring Plan Stormwater BMP Stormwater Structures Treated Stormwater Area Scenic River Wastewater Discharge Facilities
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Simpson Creek



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Foley Branch

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Foley Branch flows southward and discharges to Bull Run.

(3) Reason for requesting that this water body be monitored:

The contributing watershed to Foley Run has experienced recent residential development and new stormwater systems in the past few years. The area is anticipated for further development. A baseline benthic assessment is needed.

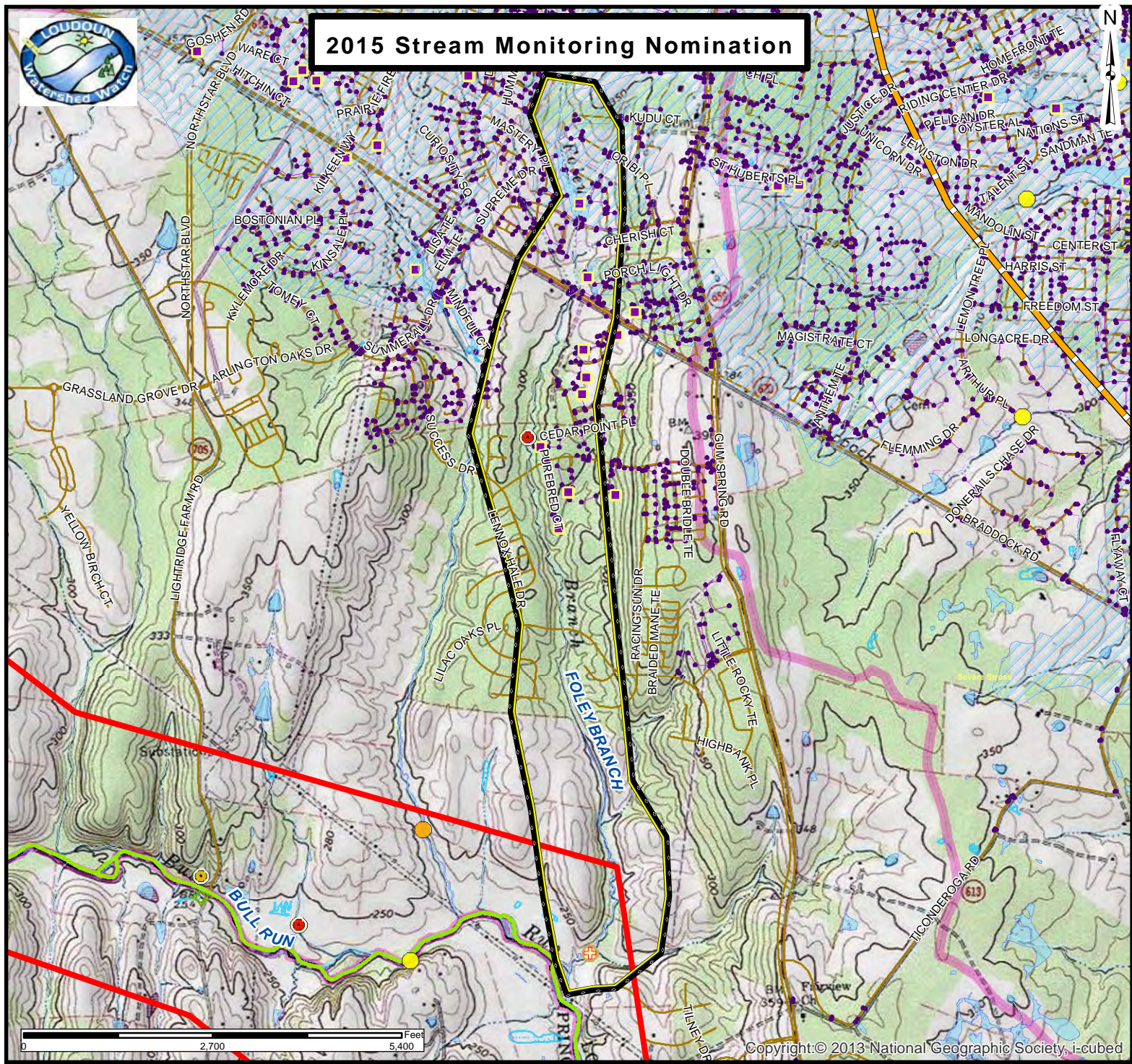
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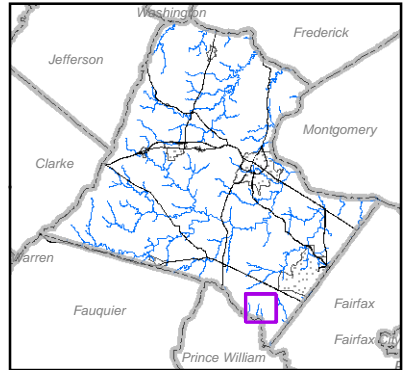
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Foley Branch



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Howsers Branch

(2) Description of the upstream and downstream boundaries of the water body proposed for monitoring. Attach a map (preferably a photocopy of a 7.5 minute quad USGS topographic map) which delineates the boundaries:

Howsers Branch flows northward towards Little River. The creek flows through Ritz-Carton Golf Club (Creighton Farms), in which there may have been significant alterations to the hydrology.

(3) Reason for requesting that this water body be monitored:

The watershed has experienced limited developed due to zoning and slopes. It is anticipated that benthic conditions may still be good, but needs to be monitored to know for certain. The creek is crossed by several roads. A potential downstream location site is off Little River Lane.

Goose Creek Association has begun citizen monitoring at three locations near Rt 50 in the headwaters for benthic and bacteria on the PEC Conservation Easement parcel.

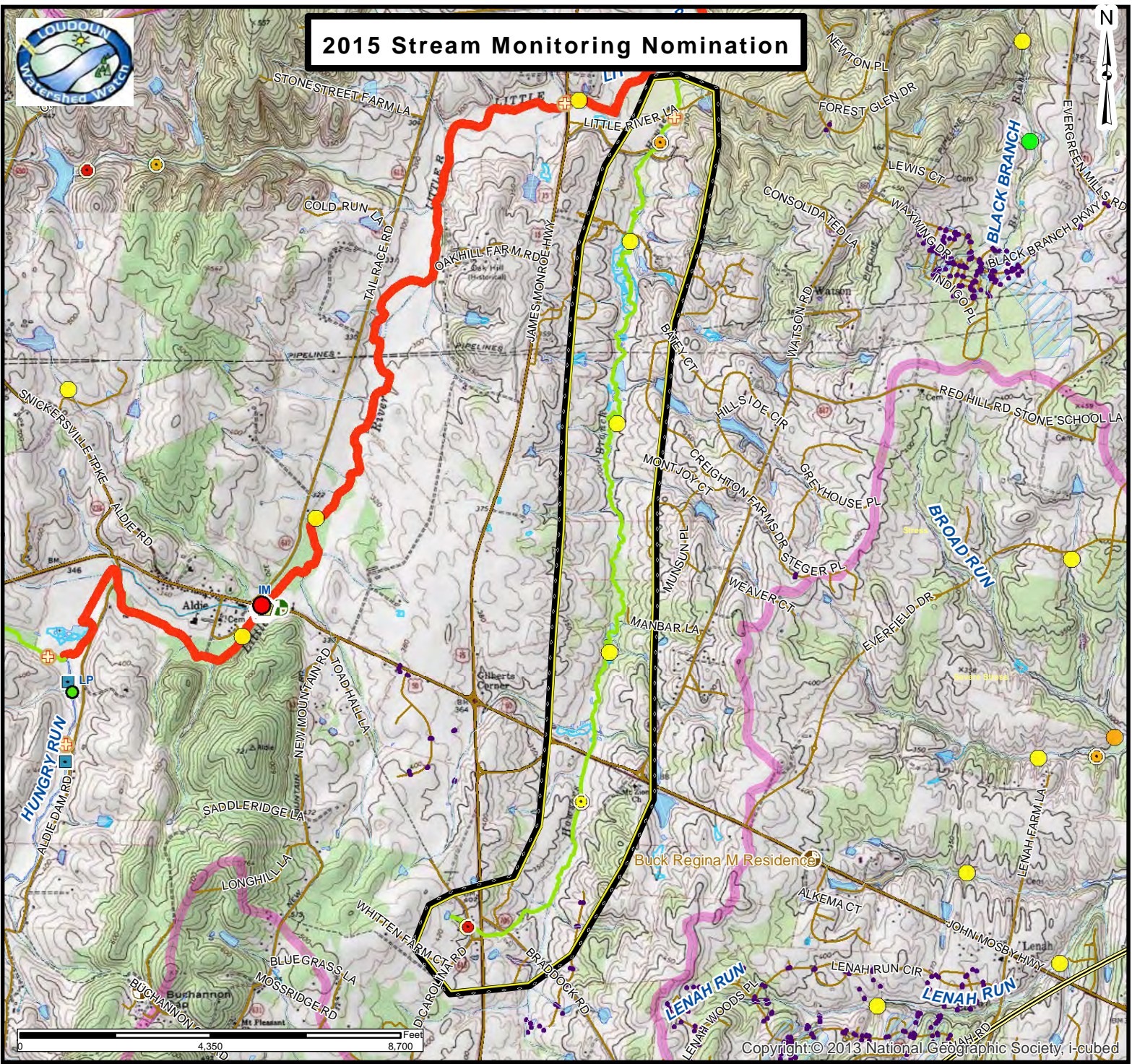
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Howers Branch

