**VIMS Shoreline Permit Application Report # 03-0715**

**APPLICANT:** BRENDA K. SAMUEL  
**Immediate Waterway:** Whiting Creek  
**Locality:** MIDDLESEX COUNTY  
**Purpose:** Erosion Control  
**Application Type:** Wetlands  
**Site Inspection:** 4/15/03  
**Report Date:** 4/30/03

### Type of Activity

<table>
<thead>
<tr>
<th>Type of Activity</th>
<th>Proposed Extent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Riprap (ft)</td>
<td>180</td>
</tr>
<tr>
<td>Impact Brackish Water Mixed Community (Type XII) (ft²)</td>
<td>720</td>
</tr>
<tr>
<td>Fill Brackish Water Mixed Community (Type XII) (ft²)</td>
<td>360</td>
</tr>
<tr>
<td>Total Impacts (ft²)</td>
<td>720</td>
</tr>
<tr>
<td>Total Impacts (Wetlands)</td>
<td>720</td>
</tr>
<tr>
<td>Total Impacts (Subaqueous)</td>
<td>0</td>
</tr>
<tr>
<td>Total Impacts (Beach/Dune)</td>
<td>0</td>
</tr>
<tr>
<td>Total Fill (ft²)</td>
<td>360</td>
</tr>
</tbody>
</table>

### Project Location

![Map of Middlesex County](red_map.png)
NOTICE

The Virginia Institute of Marine Science (VIMS) is aware that regulatory or administrative bodies who weigh the overall potential public and private benefits and detriments in arriving at decisions must also consider other factors such as economics, aesthetics, zoning, or community desires. INFORMATION PROVIDED IN THIS REPORT IS, THEREFORE, ONLY THE ENVIRONMENTAL AND MARINE RESOURCES INPUT INTO THE DECISION MAKING PROCESS.

This assessment is based on biological, chemical, geological, and physical factors affecting the marine environment at and in the vicinity of the proposed activity. Parameters of the marine environment which may influence recreational, commercial, or industrial activities which are dependent on the marine environment are also considered where applicable.

Comments:

We have reviewed this proposal from a marine environmental perspective and it is our opinion that the 180 ft. riprap revetment will adversely impact approximately 720 sq. ft. of mixed brackish marsh. Although the proposed revetment will help to address the erosion (36-48 in. scarp) at the toe of the bank, the bank itself has been cleared of small trees, shrubs and groundcover, which will likely result in the destabilization of this area. Therefore, we recommend revegetating the bank with native shrubby and herbaceous species to stabilize the slope and help reduce unfiltered upland runoff entering the marine environment. We suggest contacting the Chesapeake Bay Local Assistance Department liaison, Nancy Miller, for assistance in this matter.
Hydrologic units represent smaller, isolated watersheds defined by topography and flow direction. These units can be thought of as insulated ecosystems or landscapes within which resources can be managed at a larger scale. The cumulative impact of a project to resources within a hydrologic unit may be significantly greater than the impact to the larger watershed above.
To Wetlands Board: Please indicate Wetlands Board action on this sheet and return to VIMS

Application Number: 03-0715
Name: Brenda K. Samuel
Locality: Middlesex County
Waterway: Whiting Creek

Please check here if this application was approved as proposed ____
Complete the form below if the application was modified.

ACTIVITIES

<table>
<thead>
<tr>
<th>PROPOSED</th>
<th>PERMITTED</th>
</tr>
</thead>
<tbody>
<tr>
<td>Riprap (ft)</td>
<td>180</td>
</tr>
<tr>
<td>Impact Brackish Water Mixed Community (Type XII) (ft²)</td>
<td>720</td>
</tr>
<tr>
<td>Fill Brackish Water Mixed Community (Type XII) (ft²)</td>
<td>360</td>
</tr>
</tbody>
</table>

Comments: __________________________________________________________
____________________________________________________________________
____________________________________________________________________
____________________________________________________________________
____________________________________________________________________

Certified by: ________________________________________________________

Virginia Institute of Marine Science
School of Marine Science
P.O. Box 1346, Route 1208 Greate Road
Gloucester Point, Virginia 23062-1346
phone: (804)684-7380, fax: (804)684-7179, e-mail: wetlands@vims.edu