**Taylor Hesse-** Wetland Plants to Look For on the Ipswich River

**Title:  “**Plant Scavenger on the Ipswich River”

**Central Question:**  “Why are wetland ecosystems so important to the Ipswich River?”

**Description of Theme:**

The Ipswich River is a vital asset and resource to over 21 towns in northeastern Massachusetts. Vernal pools, marshes and swamps are all wetland ecosystems that lie within the Ipswich River watershed. Wetland ecosystems are important to the watershed community because they help to slow down the flow of the river, making it more consistent and are even known as a river’s “clean-up crew” because they filter the water that passes through. The trees that are most evident in the wetlands of the Ipswich River consist of Red and Silver Maples, Atlantic and Northern Cedars, and River Birches. Native shrubs such as Winterberry Holly, Highbush Blueberry, Buttonbush, and Sweet Pepperbush are also common. For the most part, wetlands have low and non-woody plants such as ferns and wildflowers.

 The coastal region of the Ipswich River is abundant with salt marshes and barrier beaches, which are full of species such as the Common Reed, Seaside Goldenrod, and Saltmarsh Cordgrass and hay. Here, plants such as Marsh Orach and Sea Lavender have the ability to exist in a habitat where both salt and fresh waters mix. This combination takes place in the estuary, which is part of the “Great Marsh”. The “Great Marsh” is the largest salt marsh in New England, extending across the North Shore or Massachusetts from Gloucester to Salisbury, and is a key stop on a popular bird migration path.

 The wetlands within and near the Ipswich River watershed are a necessity because they help improve the water quality of the river by filtering out sediments and pollutants. Second, they store and later slowly release flood waters which prevents the flooding of nearby lands and communities, while naturally treating and storing storm-water runoff. Finally, the biodiversity of wetlands is greater acre for acre than in any other environments in Massachusetts. They provide homes and resources to a variety of species, some of which are unique or endangered, such as the blue-spotted salamander, eastern box turtles, and more. Overall, the Ipswich River is a vital part to out community.

**Eight Did-You-Know Facts:**

1.       The value of the Ipswich River watershed wetlands is over $8 billion

2.       The decline of wetland habitats has caused the plant and animal population of the watershed to decrease significantly

3.       The Ipswich River provides drinking water for 335,000 people

4.       About 20% of the Ipswich River watershed is wetland, which is higher than average

5.       Biodiversity is greater acre for acre in wetlands than in any other environment in Massachusetts

6.       The Ipswich River’s estuary is part of the Great Marsh and is therefore a vital part of Atlantic flyway (a major bird migration path)

7.       Species such as sea lavender have adapted over time and are able to survive the mixing of salt and fresh waters that occur within the Ipswich River

8.       The estuary of the Ipswich River remains as one of the most ecologically productive places on the planet

**Places to Learn More:**

1.       The Ipswich River Watershed Association (IRWA) [http://www.ipswichriver.org](http://webmail.masconomet.org/exchweb/bin/redir.asp?URL=http://www.ipswichriver.org/)

2.       Ipswich River Watershed Biodiversity (for a full list of species that exist within the watershed) [http://web.mac.com/jm3/Ipswich\_River\_Nature/Plants.html](http://webmail.masconomet.org/exchweb/bin/redir.asp?URL=http://web.mac.com/jm3/Ipswich_River_Nature/Plants.html)

3.    New England Wild Flower Society (NEWFS) [http://www.newfs.org](http://webmail.masconomet.org/exchweb/bin/redir.asp?URL=http://www.newfs.org/)

4.    Ipswich River Wildlife Sanctuary [http://www.massaudubon.org](http://webmail.masconomet.org/exchweb/bin/redir.asp?URL=http://www.massaudubon.org/)

5.    Massachusetts Department of Environmental Protection (DEP) [http://www.mass.gov/dep/](http://webmail.masconomet.org/exchweb/bin/redir.asp?URL=http://www.mass.gov/dep/)