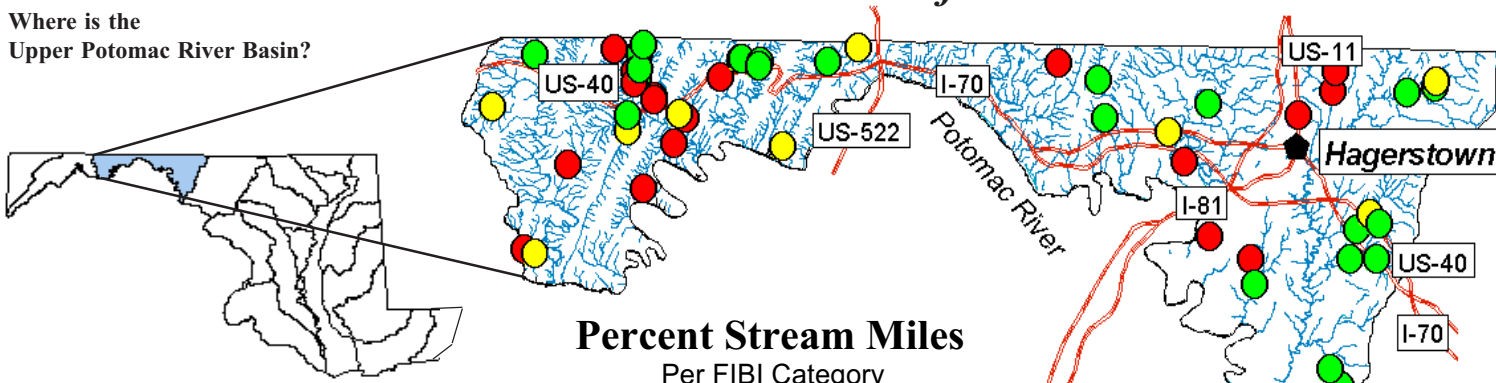




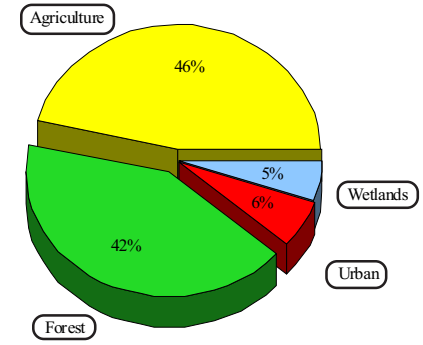
Upper Potomac River Basin

Current Status of Wadeable Streams

Where is the Upper Potomac River Basin?

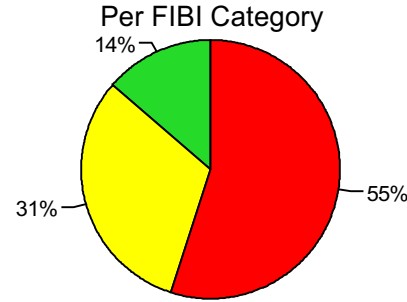


Land Use in the Basin



Land use in the Upper Potomac basin is primarily rural and forest. The basin covers an area of 617 square miles. With a population estimate of 152,000, the basin has a population density of 246 people per square mile.

Percent Stream Miles



Stream Quality

- Good
- Fair
- Poor

The Fish Index of Biotic Integrity or FIBI is a measurement of stream quality based on fish communities.

The Upper Potomac basin is located within Allegany and Washington counties, Maryland. The Potomac River, Marsh Run, Town Creek, Antietam Creek, and Sideling Hill Creek are all part of the network of streams that make up the basin.



Antietam Bridge over Antietam Creek, near Sharpsburg.

What Lives in Our Streams? *



Estimated Fish Abundance:	4.6 million
Number of Fish Species:	50
Number of Gamefish Species:	5
Number of Reptile and Amphibian Species:	28
Number of Freshwater Mussel Species:	1

* Based on the Maryland Biological Stream Survey collections in wadeable streams basin-wide in 1995.

Water Quality



Oxygen - 93% of the streams in the basin had oxygen levels that met the state water quality standard of 5 mg/L.



Nitrate - 32% of the streams had nitrate levels that may affect aquatic life (>1mg/L). The main sources of nitrates are farm fertilizers and acid rain.

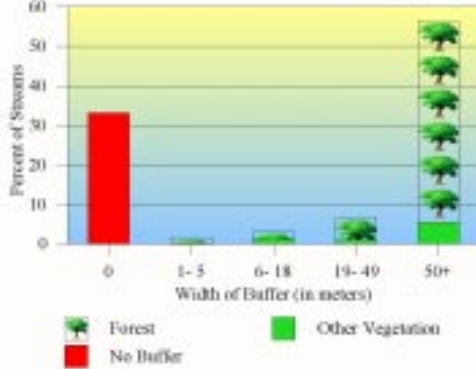


Buffering Capacity - 53% of the streams in the basin are well buffered against acid rain.

● Good ● Fair ● Poor

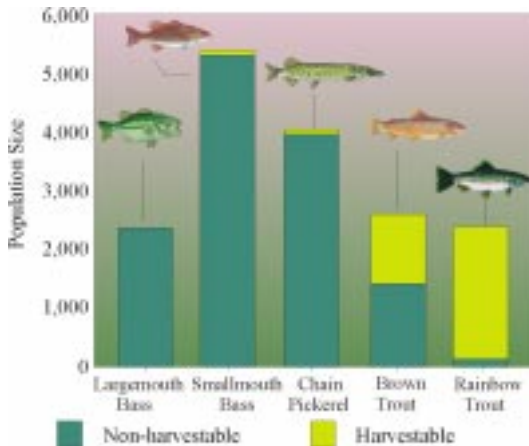
Riparian Zone


Trees, shrubs, and grasses that border a stream are called the stream's *riparian buffer*. This buffer zone can protect a stream against runoff, provides shade, stabilizes stream banks, and supplies food and shelter for aquatic life. A wide and intact buffer offers more protection than a narrow one. The riparian buffers in the Upper Potomac basin are generally in good condition. We can help maintain these buffers by protecting streamside forests and planting trees in disturbed areas.




Gamefish

Five species of gamefish were found in the wadeable streams of the basin. While anglers may be interested in the trout fishing opportunities in the basin, few of the other fish species were of a harvestable size. The wadeable tributary streams in the basin appear to serve as a nursery for these species.





Did You Know???



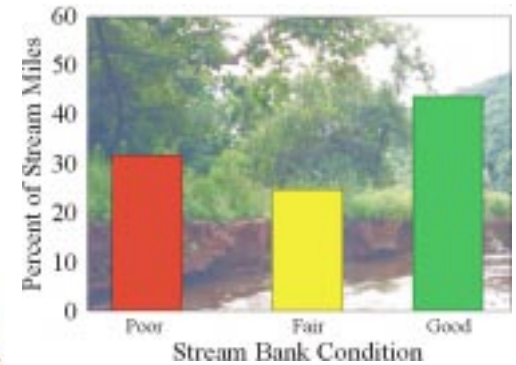
- The first major settlements in the basin were established in 1739: Hagerstown by John Hager, Conococheague by Charles Friend, and Long Meadows (near Hagerstown) by Thomas Cressap.
- The Delaware and Catawba Indians used the area as hunting grounds, and limited European settlement in the basin until the end of the French and Indian War in 1763.



The rainbow darter, rare in Maryland, is found in the Upper Potomac basin.

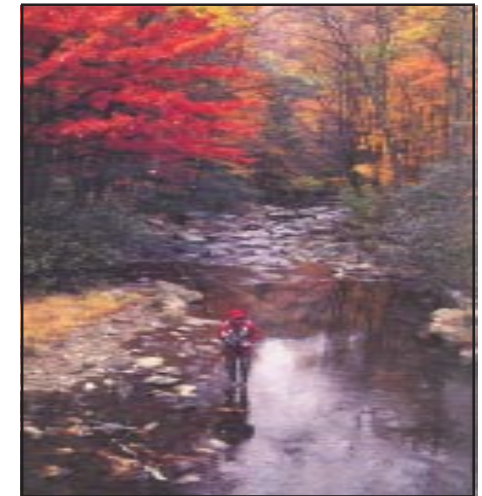
Stream Bank Stability

Eroded, unstable banks reduce habitat quality in streams and contribute to water quality problems in downstream areas. On average, the stability of stream banks in the basin is fair to good. Since streams in this basin flow into the Chesapeake Bay, the bank instability that does exist in the basin streams causes an increase in downstream transport of nutrients and suspended sediments to the Bay.



Recreation

Green Ridge State Park, Chesapeake and Ohio Canal Natural Historical Park, and Cacapon State Park provide many recreational opportunities in the basin. Popular activities include hiking, camping, swimming, picnicking, fishing, and nature observation.



Flyfishing is a popular sport in the basin.

Community Involvement

Want to help? These community groups can show you how!

Alliance for the Chesapeake Bay
6600 York Road, Suite 100
Baltimore, MD 21212
Kathleen Millan (410) 377-6270

Potomac River Association
1185 Clarks Mill Road
Hollywood, MD 20636
Jack Witten (301) 373-5445



For more detailed information about streams in the Upper Potomac basin and elsewhere in Maryland, contact Ann Smith of DNR/MANTA at (410) 260-8611 or email asmith@dnr.state.md.us.