The Edwards Ferry gage is currently unavailable. ICPRB is investigating the problem and hopes to have the gage up and running again soon.

ICPRB maintains a Potomac river level monitor on the Potomac River at Edwards Ferry. Edwards Ferry is approximately 8 miles upstream of the mouth of Little Seneca, 16 miles upstream of Great Falls, and 26 miles upstream of Little Falls. This monitor measures the water level (stage) in the Potomac and sends it to ICPRB by wireless remote modem using CDMA technology. Information on stage at Edwards Ferry is used to predict river flow downstream at Little Falls, in order improve the efficiency of water supply releases from water supply reservoirs during droughts.

The stage monitor is funded by the three Washington metropolitan water suppliers including the Washington Aqueduct Division of the U.S. Army Corps of Engineers, the Washington Suburban Sanitary Commission, and Fairfax Water. The information obtained by the monitor is interpreted using data collected by gages maintained by the United States Geological Survey. Without the USGS gages, the river level measurements would be of little value for drought operations.

Access the Edwards Ferry real-time gage.

The current month's most recently available stage reported for Edwards Ferry can be obtained (download latest stage) as either a graph or a table of river elevations. The stage that is reported corresponds to an arbitrarily selected datum of 100 feet at the top end of the concrete boat ramp at Edwards Ferry. A reported stage in the nineties does not mean that the river is more than 90 feet deep, rather, it means that the river is below the top of the boat ramp. A reading of 100.00 implies that the boat ramp is (just) completely submerged and that the river is at a relatively high flow. A reading in the low nineties corresponds to a relatively low flow.

Estimating flow at Little Falls using Edwards Ferry stage

The stage reported at Edwards Ferry can be used to predict the approximate flow that will occur

at Little Falls. (Link to preliminary table relating stage at Edwards Ferry to predicted flow at Little Falls). The table was created using data collected in summer 2005, and will be refined as more data are collected. The table can be interpreted through the following example. For a stage at Edwards Ferry of 93.20, the predicted flow rate at Little Falls will be 1,140 million gallons per day (MGD), prior to water supply withdrawals. Water supply withdrawals average about 350 MGD in the winter, and about 500 MGD in the summer. Therefore, the predicted net flow at the USGS Little Falls gage in the summer would be the 1,140 MGD minus 500 MGD, for a net flow of about 640 MGD.

Estimating when the predicted flow will occur at Little Falls

The travel time between Edwards Ferry and Little Falls is a function of flow rate, with travel times of 2.5 hours or less during higher flows, and travel times of more than 25 hours during lower flows. These travel times were estimated by following distinct features in the hydrograph (such as the peak flow following a small storm) as they moved downstream from Edwards Ferry to Little Falls. (Link to graph showing approximate travel time as a function of Little Falls flow.) The graph can be interpreted for the prior example in which an Edwards Ferry stage of 93.20 corresponds to a predicted flow rate of 1,140 MGD at Little Falls. The graph shows that for a flow rate near 1,000 MGD at Little Falls (1500 cfs), the travel time is about 20 to 25 hours from Edwards Ferry to Little Falls.