

Woodrow Wilson Bridge

Washington, D.C.

Type: **V-shaped piers and steel girders**

Services: **Conceptual, preliminary, and final design**

Cost: **\$600 million**

Client: **Maryland State Highway Department (D3) District 3 Office
9300 Kenilworth Avenue
Greenbelt, MD 20770**

The Woodrow Wilson Memorial Bridge carries Interstate 95 and the Capital Beltway 1.1 miles (1.8 kilometers) across the Potomac River. The bridge connects Alexandria, Virginia, with Prince George's County, Maryland, and is considered part of Washington's national monuments core. Chosen in a national competition, the movable bridge design incorporates eighteen sets of V-shaped piers that resemble seagulls in flight, giving the twin spans a light, open appearance. The piers form an arcade that recalls traditional Washington bridges with updated, contemporary detailing. The V-piers support curved steel girders that balance loads so that the piers are subjected to minimal dead load bending moments, and the foundations are not subjected to any horizontal arch thrust. The bascule, the movable portion of the bridge, has been integrated into the overall structure, giving it a seamless appearance along the river.

