

#### **PROJECT PROFILE**

# **Constitution Center**

Building Enclosure Commissioning (BECx) | Washington, D.C.







## **CLIENT**

David Nassif Associates/ Kramer Consulting

### **BACKGROUND**

With more than 1.4 million rentable square feet, the Constitution Center (formerly the Nassif Building) is the largest privately owned office building in the District of Columbia. The original building, designed by Edward Durrell Stone, housed the headquarters for the United States Department of Transportation until early 2007, when all employees were moved to a new two-building complex in southeast Washington.

After experiencing the progressive and irreversible effects of strength loss in the original thin marble veneer, the owners sought to fully restore and reposition the property as an example of the current state-of-the-art in sustainable design and in-service operation and performance. The owner selected WJE to provide design peer review, performance testing, and on-site quality assurance (Building Enclosure Commissioning) services in support of the building enclosure, including primarily the new unitized, shop-structurally-glazed aluminum curtain wall system.





#### **SOLUTION**

The primary structure was reused, and a new enclosure was designed. The new radiant fin interior cooling system and building enclosure systems required careful integration and control of air leakage to assure the whole building operated successfully.

WJE, working closely with the Architect-of-Record and the owner, provided design phase consulting services to identify building enclosure curtain wall systems and performance requirements, and to address concerns associated with condensation potential, air barrier continuity, and rainwater penetration. After successfully completing both a preconstruction laboratory mock-up and field testing for air and water penetration resistance, WJE provided on-site construction observation, including coordination of field air and water penetration testing.

