

Jessica A. McIntyre, PE

Senior Waterfront Engineer

EDUCATION

ME Civil Engineering,
University of Florida, 1999
BS Civil Engineering, Cum
Laude, North Carolina State
University, 1996
BA Environmental Ethics,
Policy & Science, Cum
Laude, North Carolina State
University, 1996

REGISTRATION

North Carolina, 037197,
2010
South Carolina, 30646,
2013
Florida, 58695, 2002

AFFILIATIONS

PIANC USA Commissioner
Tau Beta Pi, the National
Engineering Honor Society

EXPERIENCE

Ms. McIntyre is a Waterfront Structural Engineer specializing in the planning and design of recreational and waterfront development projects. Her 18+ years of experience comprises concept development and feasibility, market and economic studies, grant application and implementation, environmental permitting, evaluation and repair of existing facilities, design of new facilities, and bid phase and construction support services. Her structural design experience encompasses structural evaluation and rehabilitation of existing waterfront structures; analytical modeling and design of pedestrian and vehicular bridges, commercial and recreational piers and fixed and floating docks, bulkheads and retaining walls, and other waterfront structures. She provides these services on a wide range of marina, boat launch facility, waterfront park, and other types of waterfront development projects primarily in the U.S. In addition to her project experience, Ms. McIntyre has been actively involved in PIANC for over 10 years, specifically in the Young Professional and Recreational Navigation Commissions and currently as Commissioner for PIANC USA.

Ms. McIntyre is licensed professional engineer in Florida, North Carolina, and South Carolina. She received a dual bachelor's degree in Civil Engineering and Environmental Ethics, Policy and Science from North Carolina State University and her master's degree in Civil Engineering – Structures with a minor in Coastal and Ocean Engineering from the University of Florida.

REPRESENTATIVE PROJECT EXPERIENCE

The Wharf at the Southwest Waterfront, Washington, D.C. Project manager and waterfront structural engineer for the maritime elements of The Wharf development in southwest DC. The project encompasses 4 public piers, 3 marinas, a mooring field, and a commercial pier in addition to landside development of hotels, retail, residential and restaurant space, and parks. Specific tasks included coordination with the landside master developer and construction team and maritime contractors, development of schematic and final design documents, assistance during permitting and construction, pro-forma development for current and future operation of the marina facilities, identification of and grant application preparation for water-dependent programming, and transition planning for existing boating facilities during construction. To date, the Wharf project has received over \$1.9M in grant funding through the Boating Infrastructure Grant, Boating Access Grant, and Clean Vessel Act Programs.

The Yards - Final Design, Washington, District of Columbia. Project Engineer for a new marina at The Yards, a multi-use development in DC along the Anacostia River. The Marina and The Yards consists of 54 slips, including 26 transient slips; a fixed landing; and three public docks – one for water taxis; one for canoes, kayaks and other self-powered craft; and one for events. Consideration for Federal channel limits, WMATA metro tunnel under a portion of the site, and adjacent Naval Yard dedicated the limits of the marina and the location and type of anchorages. A stipulation of the USACE and WMATA approvals required use of catenary anchors for the majority of the marina – no piles were permitted within 25 feet of the tunnel or 75 feet of the channel. In addition, no structures were permitted to cross the Naval Yard property line nor boating allowed along its edge. At the start of design development, prepared and submitted a Boating Infrastructure Grant Program



application for the proposed transient slips; project was awarded \$1.2 million in BIG funding in 2014. Completed construction documents and assisted Owner through bidder selection process and construction phase.

New Orleans Municipal Yacht Harbor, New Orleans, LA. Project engineer for the replacement of a 500+ slip marina severely damaged during Katrina in 2005. City received FEMA funding for the replacement of the 30+ year old concrete and timber fixed docks with floating dock system. Dock design included attenuator floats at the outer edges to mitigate long period wave energy overtopping the breakwater and entering the basin. Other design features included dredging of the entrance channel, new elevated comfort station at the East Entry and arched gateway at the West Entry, replacement of a portion of the bulkhead and site improvements in the parking lots. Removed concrete pier sections and dredge material are planned to be used for the breakwater improvements project, also in receipt of FEMA funding. Construction is expected to commence fall of 2017 and be completed in 2 phases so existing tenants may remain at the marina during construction.

Nashville Riverfront Park, Nashville, Tennessee. Waterfront engineer for the schematic design of the waterside structural components of a downtown riverfront park. Evaluated existing and proposed waterfront structures for the concept development phase of the new park, which encompasses approximately one-half mile along each bank of the Cumberland River fronting downtown Nashville and Titan Stadium. Performed field investigations of existing waterfront structures followed by repair and upgrade recommendations to accommodate both existing and future uses of each. Evaluation of proposed concepts considered impacts to navigation, condition of existing facilities, shoreline features, and accessibility. Developed concept figures showing navigation and docking procedures and order-of-magnitude opinion of probable construction costs for the marine structure components of the master concept plan. Developed final design documents for 1st 2 phases of development – reinforcement of shoreline fronting new play park and Titan Lawn, new ferry boat landing, and upgrades to existing recreational dock on east side of river near Titan Stadium. Provided construction support services for play park shoreline stabilization and riverfront landing.

Marjorie Park Yacht Basin Renovation, Tampa, Florida. Project manager and urban waterfront engineer for the renovation and expansion of an existing city-owned and -operated urban marina. Coordinated efforts among the consultants and with the city for the renovation of the marina facility at Marjorie Park Yacht Basin from concept development through construction. Assisted with the preparation of the environmental permitting packages, responded to requests for information from the agencies, and participated in public hearings for renovation and expansion of the marina. Agencies included Tampa Port Authority, Florida Department of Environmental Protection, U.S. Army Corps of Engineers, Southwest Florida Water Management District, U.S. Fish and Wildlife Service, Florida Fish and Wildlife Conservation Commission, EPC, and HCCPC. Mitigation for poor flushing capability and water quality in the existing basin was included in the permit applications. During construction, completed commencement, construction, and closeout documentation for Tampa Port Authority, Florida Department of Environmental Protection, and U.S. Army Corps of Engineers environmental permits and EPC permit documentation for the fuel system. Assisted the city with the submittal and grant administration for U.S. Fish and Wildlife Service BIGP funding for the transient docks. Project was the first in Florida to receive BIG funding, receiving a total of \$1.1M in the FY01 and FY02 funding cycles.