To meet the City of Auckland's growing needs, CH2M HILL's Water Business Group entered into a joint venture to design and build a new, 20-million-gallon-per-day water treatment plant on New Zealand's longest river, the Waikato.

Historically, Auckland's fresh water has come from protected upland watersheds; although, rapid population growth accompanied by drought has left the city in need of an alternative supply.

"This project builds on our membrane filtration experience in the Asia Pacific Region, following the Joyce Road Water Treatment Plant in New Zealand and the NEWater Factory Demonstration Plant in Singapore," said Jim Lozier, project manager.

The joint venture also includes McConnel Smith & Beca Consultants and Thiess Contractors. The overall design-build contract includes a new river intake, raw water pipeline, treatment plant and 18 miles of finished water transmission main.

Construction of the $55 million plant is currently underway.

Upon completion, CH2M HILL will also provide start-up services for the plant. The plant uses an innovative submerged ultrafiltration technology, called ZeeWeed™, that provides a positive barrier to the passage of pathogens, including Cryptosporidium and Giardia.