

Load Testing



The ECP Model TAF-175 Torque Anchor™ solid square shaft helical pile was installed at each placement to a minimum depth requirement of 45 feet below grade. The pile configurations varied due to soil borings encountering very dense soils at 10 to 15 feet deep on a portion of the site. At these placement locations, the smaller plate configuration was used to allow the pile to reach the target depth before experiencing excessive shaft torsion. The target shaft torsion to provide the service load requirement of 43,500 pounds, plus a factor of safety of 2.0, was 8,700 foot-pounds.

As part of the verification process, two static load tests were performed prior to installing the piles and two load tests during production. These tests were directed and supervised by CTL Thompson Engineering and monitored by the USPS inspector. The test procedure was conducted in close conformance with ASTM D-1143. All of the load tests were successful.

This challenging project was completed in six weeks despite the difficulty in drilling through the very dense soil that was encountered between 10 and 15 feet below grade. The project ran smoothly and was completed on time and within budget.

Construction of the Post Office Addition

Pile Cap Construction

