

Cobo Hall Addition & Renovation

Detroit Regional Convention Facility Authority

Location: Detroit, MI

Contract Value: \$160 million

The Cobo Hall Addition & Renovation required the installation of 6" Diameter 200 Kip Micro-Piles to facilitate the foundation changes & new construction. The Micro-Piles were installed utilizing Duplex-Drilled Grouted Micro-Piles.

Our contract was a direct contract for the Micro-Pile package and it was held by the DRFCA & Administered by the Joint Venture of Turner/Tools Construction.

Micro-Piles were selected due to the low headroom environment inside the building and due to the fact that dense rock was going to be encountered to develop enough capacity for the 200Kip Capacity with a safety factor of 2.0 or a total test load of 400 Kips.

The scope of services was the construction of the new addition to Cobo Hall adjacent to the existing Cobo Hall Building & the addition of a new structure inside of the existing Civic Arena. The site was extremely congested and deliveries had to be scheduled days in advance of actual deliveries. The project required that we work 5 or 6 days a week with 2 crews in order to meet the delivery schedule inside & outside of the building.

Due to the site conditions, weekly meeting with project managers were held throughout the project, & daily activity meeting with the site superintendent and look ahead schedules were required.

The project included approximately 47,000 lineal foot of 6" Diameter Micro-Piles. The drill depths were up to 128' deep and never less than 118'. We performed 1 Compression Pile Load Tests to 400.0 Kips to verify the design load.

The project was started in the Winter of 2011, and is expected to be opened to the public in May/June of 2013. Our services were completed on time and within the original schedule & contract value for our work.

The soil conditions are typically a mixture of fill material at the surface followed by loose clay, and underlain by rock/hardpan material in the borings.

