

# IKEA @ Marketplace Furniture Store

Plymouth Meeting, PA



**Project Description:** A three-story retail furniture store over a basement level parking garage with a footprint of 660 feet by 330 feet was built in Plymouth Meeting, Pennsylvania. This site has 15 to 20 feet of variable fill with cobbles over karst limestone. Foundation options included caissons or mini piles founded in competent limestone or conventional spread footings designed for 6000 psf supported on Geopier elements. The Geopier option was selected because it was less expensive, significantly less risk for cost overruns and would take less than 50 days to install 1,550 geopier elements. The Geopier elements were installed in January and February of 2002 within the allotted schedule. Column loads on this job ranged up to 900 kips.

## THE GEOPIER ADVANTAGE

- Quick installation – All Geopier elements installed in less than 50 days
- Cost – approximately 30% less than other systems
- Onsite modulus test were performed to confirm design assumptions
- Quality – design/build package provided consistent settlement control

**Owner:** IKEA @ Marketplace, Plymouth Meeting, PA

**Construction Manager/GC:** Sordoni Skanska, Parsippany, NJ

**Structural Engineer:** Thorson Baker & Associates, Ridgefield, OH

**Geotechnical Engineer:** Earth Engineering, Inc., Blue Bell, PA