PROJECT OVERVIEW AND CHALLENGES

Bradshaw jacked a 59" diameter steel casing 311 feet under interstate highway I-77 behind a microtunnel boring machine (MTBM). The subsurface conditions consisted of clay and sand below the groundwater table. In order to mobilize to the jacking shaft, about a mile of forest was cleared and the equipment was dragged in on sleds. A slide rail system was used for the jacking shaft with special accommodations for microtunneling in the front and back. Once the casing was completed, Bradshaw installed a 42" ductile iron gravity sewer pipe in the casing and grouted it in place.