

Client: Pleasurewood Hills  
 Site: Wipeout Rollercoaster  
 Location: Pleasurewood Hills, Suffolk

### Project Description

GTL Partnership was employed as Principal Contractor to design and install a foundation solution to enable the re-location of the Wipeout Rollercoaster from America to Suffolk. The brief was to construct the rollercoaster during open season, this coupled with an ambitious programme ensured that this would be a demanding project.



GTL's solution to combine the helical (screw) pile and concrete cap was to prove popular. This approach was able to reduce cost, meet the tight programme and decrease the amount of concrete by 90%, an environmental plus in anyone's book.



In February 2007, the work commenced with the leveling of the site. Over 150 GTL Helical (screw piles) were used. This was the first time this innovative technique had been used in the construction of a roller coaster in the UK.

### Geotechnical Ground Conditions

The soils investigation identified a high water table and running sands and liquid mud as potential geohazards. The 116 ft tall structure posed the additional challenge of extreme live loads.

The ride has been described 'as one of the most exciting rides in the UK - a roller coaster that will set the benchmark as being the tallest, fastest and most extreme ride in East Anglia'.

### Helical Pile Design

The initial scheme put forward by the clients' project team involved 9000m<sup>3</sup> of concrete in a balanced raft solution. In GTL's opinion, this approach would introduce additional logistical problems to an already complicated, ambitious project.

