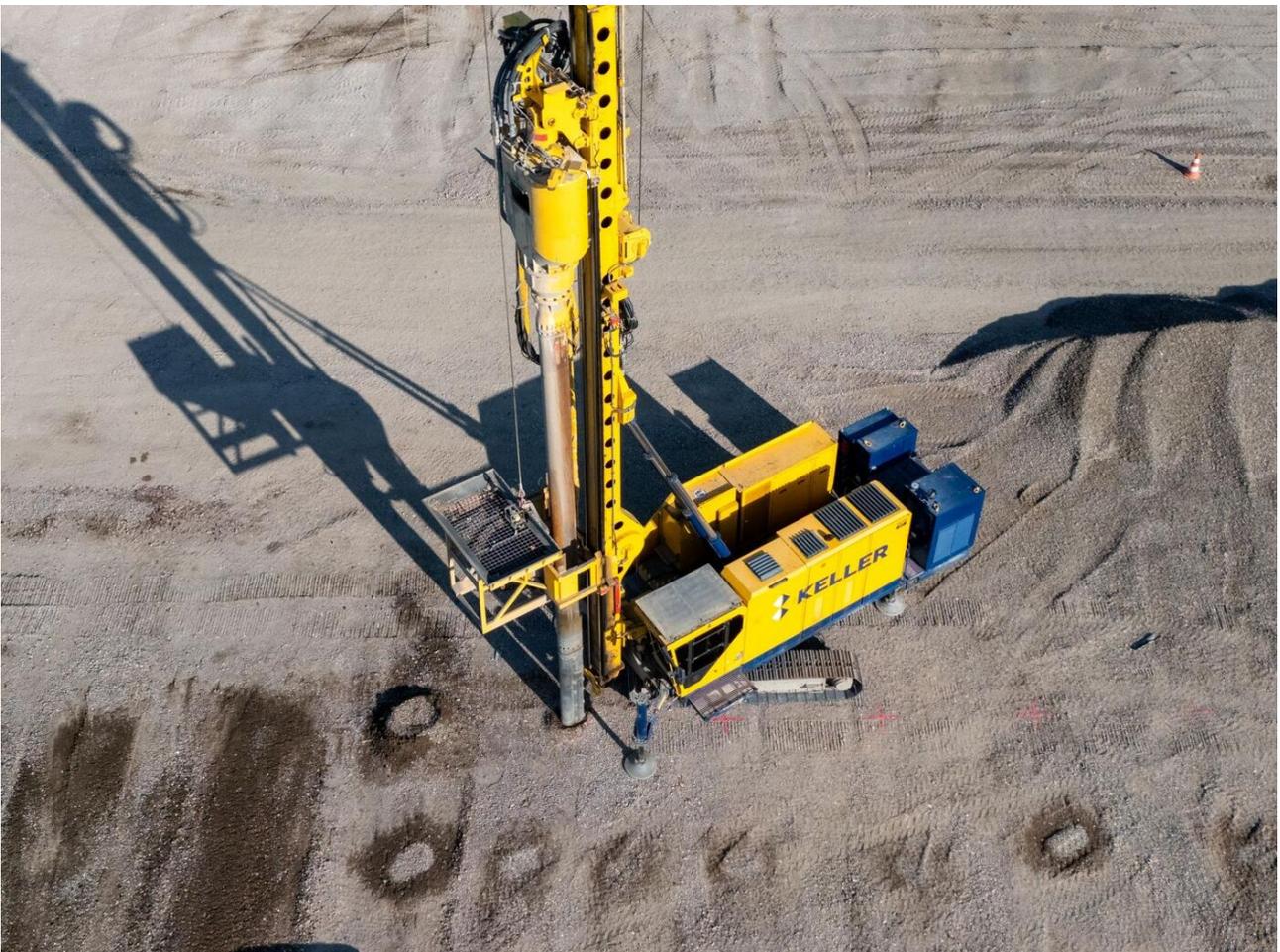


Stone columns and vegetable oil make for one of Keller's lowest ever carbon projects

Weert, Netherlands

Promoting ground improvement techniques over traditional foundation piles - along with a fuel made from waste vegetable oil - has resulted in a significant reduction in carbon emissions on a major project in the Netherlands.



The project

EVO Park is a proposed new logistics park in Weert that promises environmentally friendly features, including solar panels and a sedum roof. But sustainability is also a key factor for the construction, as Marcel Mertens, Branch Manager, explains.

“The most common solution in the Netherlands for projects such as this is concrete piles. But since Keller came into the market, we’ve opened many people’s eyes to more environmentally friendly techniques.”

“For this project, we proposed stone columns, which are among our most sustainable products. They involve creating densely compacted columns of gravel or other natural aggregates, eliminating the need for concrete or grout and significantly reducing cost and the carbon footprint.”

For EVO Park, gravel was sourced from a local supply just 20km away. The first part of the project was completed in April 2025, with the Keller team installing almost 10,000 stone columns. A second phase will start later in 2026 and involve another 2,000 columns.

Fossil-free fuel

The team also used hydrotreated vegetable oil (HVO) in two of its newest rigs. The oil is a fossil-free alternative to diesel that saves up to 90% of total lifecycle emissions.

“Although we’ve trialled HVO on smaller projects, this has been the biggest test so far,” Marcel adds. “We experienced no problems at all and have now committed to using it in all our equipment wherever possible.”

“With increasing demand for sustainability on construction projects, Keller is well placed to help our clients reach ever higher levels of certification.”

Project facts

Owner(s)

Confidential

Keller business unit(s)

Central Europe

Main contractor(s)

Goldbeck Nederland BV

Solutions

Bearing capacity / settlement control

Markets

Commercial

Techniques

Vibro stone columns / Vibro replacement