

Application example

Compacting wires with a large cross section

PLASTIC WELDING

METAL WELDING

CUTTING

CLEANING

SIEVING



Task

A twisted copper wire with a cross section of 160 mm^2 needs to be compacted or welded using ultrasonic technology. One important factor is to make sure the weld has a high degree of compaction while avoiding any damage to the strands at the connection between the compacted points.

Solution

Using high-powered ultrasonic PowerWheel® technology, you can apply high forces to the weld area in a very short time, achieving a secure compaction in even the largest cross sections. The application is realized using a Telso®Terminal TT7 system with a sound protection casing that is accessible from three sides. The welding process is managed using the Telso®Flex control software with touchscreen operation.

Advantages of this configuration

The patented PowerWheel® technology enables the welding of very large copper cables with 160 mm^2 and thicker cross sections. Thanks to the high power output of 14.4 kW, users can achieve a positive, homogeneous compaction result. Furthermore, PowerWheel® technology enables you to reduce weld widths by up to 30% in contrast to conventional technology.



The application was welded using torsional PowerWheel® technology. Above, the Telso®Terminal TT7 with a maximum welding power of 14.4 kW.