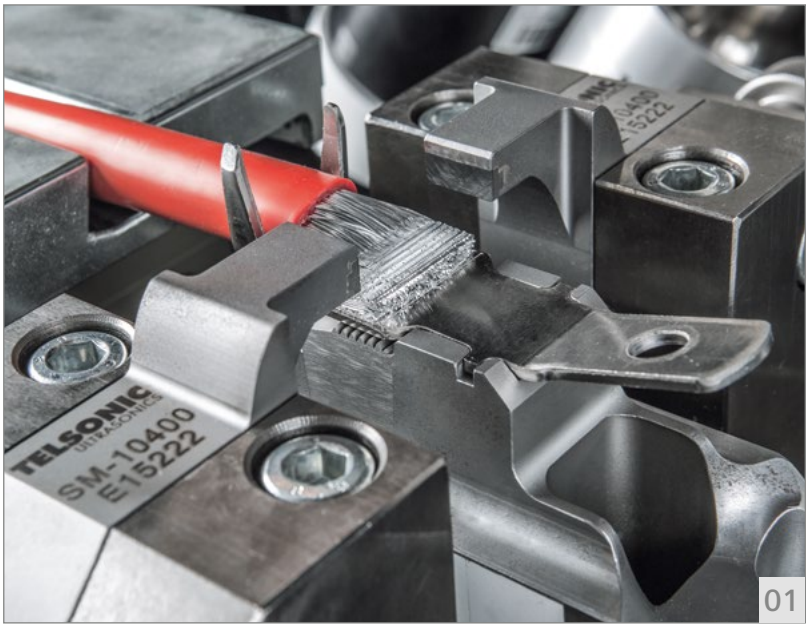
Secure contacts for automotive engineering

Powerful and flexible ultrasonic welding technology

PLASTIC WELDING | METAL WELDING | CUTTING | CLEANING | SCREENING



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Bronschhofen (CH), 06/2018

Special solutions are often required for electrical contacts in the automotive sector. Examples include spark plug connectors, special contacts for items such as lambda probes, exhaust systems and ABS, and the manufacture of holders and sockets for sidelights, indicators and headlamps. Headquartered in Wuppertal, Germany, STOCKO Contact GmbH & Co. KG specialises in this field, designing and manufacturing "tailor-made" contacts and plug connectors for almost any application. Telsonic's patented torsional ultrasonic welding method PowerWheel® is now being used in Wuppertal alongside conventional ultrasonic welding methods, ensuring that Stocko will be able to continue to meet the ever-increasing requirements of car manufacturers in the future. A future-proof joining process for welding non-ferrous metals, PowerWheel® impresses primarily with its power and flexibility.

Power and precision combined

In the torsional PowerWheel® process, the sonotrode (the tool that discharges the ultrasonic vibrations into the component being machined) performs a rocking rolling movement during welding. This ensures that the maximum amplitude is always in the centre of the welding surface and power can be applied precisely, resulting in exceptionally strong welded bonds, short cycle times and narrow compactions. Secure joins can be created even between heavy splices, because the sonotrode moves along the z axis, enabling it to apply high forces. The welding parameters can be easily adapted to the task at hand in the software settings.

01 Inside the ultrasonic welding machine

02 MPX HD high-performance ultrasonic welding machine capable of welding powers up to 4500 N

03 Aluminium cable on a terminal with mechanical strain relief

Further information:
www.stocko-contact.com

TELSONIC
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Technical advice and support

Contact solutions for wires with cross-sections between 10 and 85 mm² are currently a major priority in the automotive sector. While smaller cross-sections are used in many different areas of a car, larger cross-sections are primarily found in the engine compartment cabling system. Stocko is developing and manufacturing customer-specific solutions based on powerful ultrasonic technology. The contact specialists value not only Telsonic's technology but also the advice and support provided by its in-house ultrasonics experts, in particular whenever challenging tasks have to be dealt with.

TELSONIC GmbH, Erlangen, and Ellen-Christine Reiff, Redaktionsbüro Stutensee