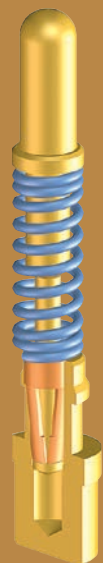
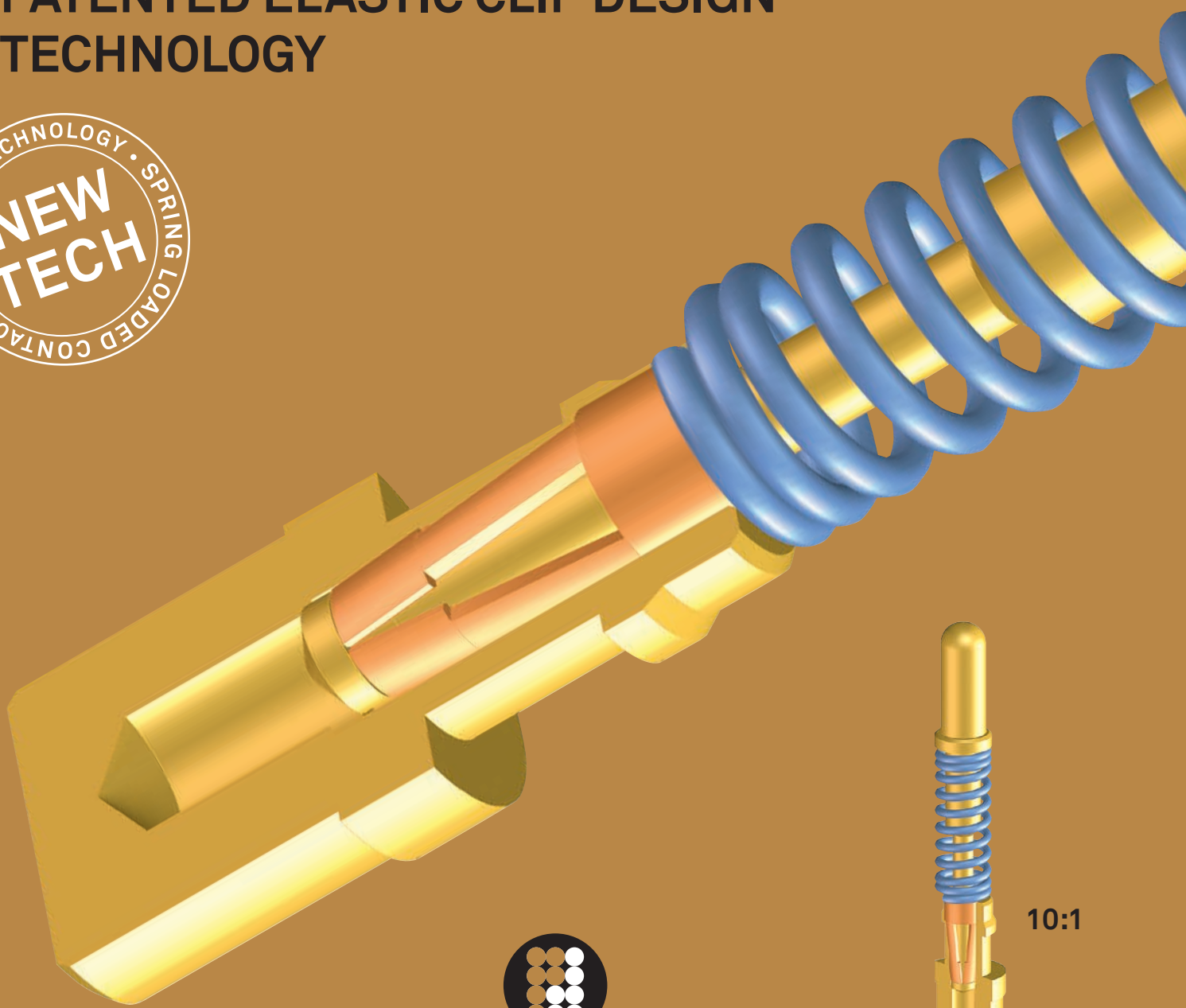


HEAVY DUTY SLC

SPRING LOADED CONTACT
PATENTED ELASTIC CLIP DESIGN
TECHNOLOGY



10:1



preci-dip

swiss world connects





preci-dip

PATENTED ELASTIC CLIP DESIGN TECHNOLOGY

HEAVY DUTY SPRING LOADED CONTACTS FOR DEMANDING APPLICATIONS

Standard spring loaded contacts are made of a barrel, a piston, and a spring. The electrical contact piston to barrel is then made by the pressure in between the piston and the barrel. For heavy duty application with shocks, vibrations, and high number of matings, more robust designs are needed to ensure reliable connectivity. As such elastic joint in between piston and barrel is required to ensure connectivity and sustainable low ohmic resistance.

PRECI-DIP has developed an unique patented technology which ensures reliable connectivity from piston to barrel using an elastic clip. This technology is suitable for various applications such as

- **SMARTPHONE BATTERY CONNECTIONS**
- **MEDICAL DEVICES**
- **AERONAUTICAL CONNECTORS**
- **AUTOMOTIVE APPLICATIONS**

TESTED AND QUALIFIED



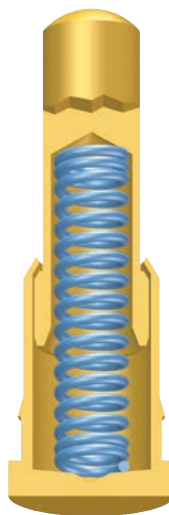
precip-dip

UNIQUE ELASTIC CLIP

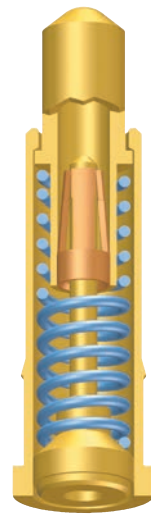
ALL HEAVY DUTY

- 1 BARREL**
- 2 ELASTIC CLIP**
- 3 CONNECTING HOUSING**
- 4 PISTON**

CONTACT RESISTANCE
 $20\text{m}\Omega$



Standard
design



Patented
Elastic Clip design



precip-dip

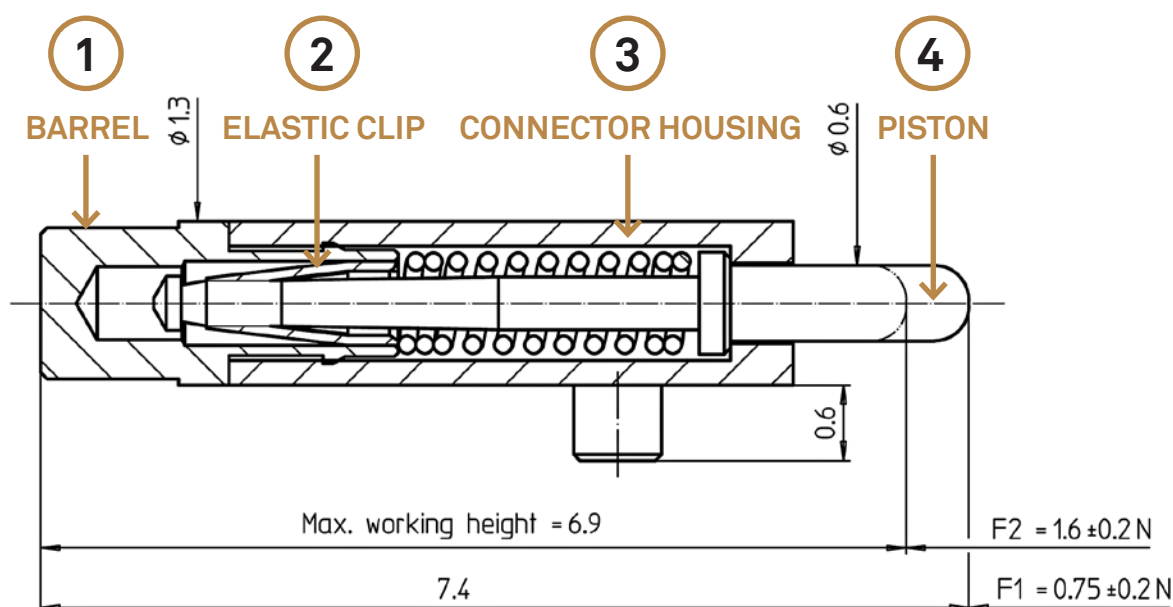
DESIGN

ELASTIC CLIP DESIGN TECHNOLOGY

Patented in-line or coaxial design with integrated multifinger elastic contact (clip) establishing electrical continuity between body and piston. The electrical multipoint connection between the mobile piston and clip guarantees low, stable electrical resistance values without microcuts even when the piston is moving, vibrating or enduring shear force, thus ensuring maximum reliability.

Heavy duty:

- Elastic clip provides high performance in vibration and shock situations
- Friction piston to barrel does not depend of spring force
- Shear force on piston is not transferred to barrel therefore does not wear barrel
- 6A continuous current can be achieved with a 1.5mm outer design
- Contact resistance 20m Ω



ADVANTAGES AND CHARACTERISTICS

ELASTIC CLIPS VS STANDARD DESIGN

STANDARD DESIGN

The contact zone varies with the position of the piston. The pressure between piston and barrel will not be constant. Micro-cuts may occur during shocks or vibration.

PATENTED ELASTIC CLIP DESIGN

The contact zone is made at the elastic clip level and remains constant and reliable. The contact pressure piston to barrel will not fluctuate with movement of the piston. The elastic clip will ensure no micro-cuts occur during shocks or vibration.

PRECIP-DIP HIGH QUALITY CONTACTS



preci-dip

TECHNICAL SPECIFICATIONS

ELASTIC CLIP DESIGN TECHNOLOGY PERFORMANCE

PRECI-DIP offers various designs of 'Elastic clip' technology within a large range according required performances.

REGARDING GEOMETRY:

- Spring loaded contact length can fit a board to board distance down to 3.5mm
- Some designs offer a connector pitch of 1mm
- Contact termination can be SMT, through hole, press-fit

REGARDING CURRENT RATINGS:

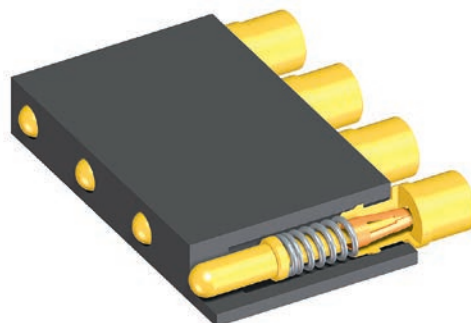
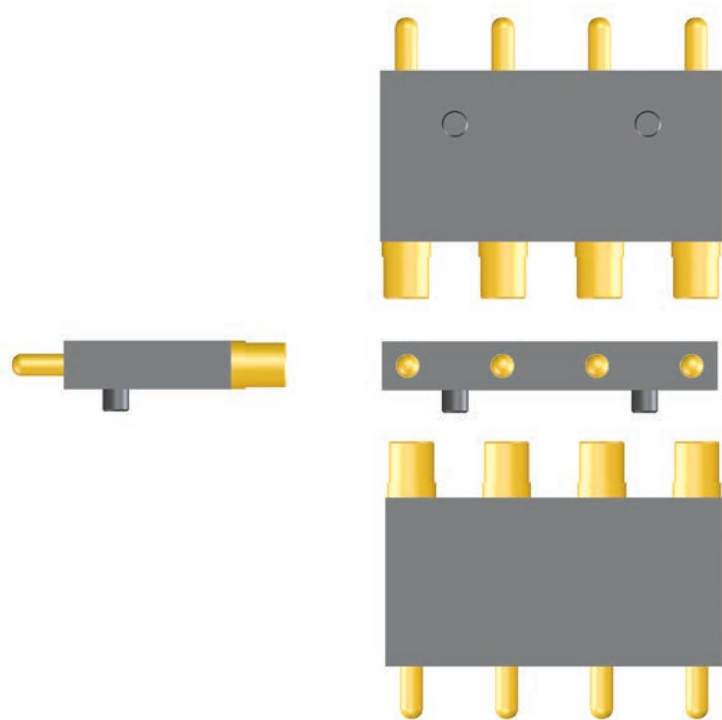
- Spring loaded contacts can reach up to 25 A continuous within a rising temperature lower than 30 °C

APPLICATION FOR A SMARTPHONE BATTERY CONNECTOR:

- 6A, 1.5mm thickness

THE MINIMUM THICKNESS FOR BATTERY CONNECTOR

- 3A, 1.3mm thickness



- Pitch 2.54mm, 2mm or as low as 1.5mm
- Up to 10k cycles





preci-dip

PRECi-DIP INNOVATIVE HIGH QUALITY SPRING LOADED CONTACTS – A REAL ALTERNATIVE SOLUTION TO TRADITIONAL CONTACTS. UNIQUE RELIABILITY BY ITS DESIGN AND ITS UNIQUE MANUFACTURING PROCESS.

Spring loaded contacts are 100% made on PRECI-DIP site in Switzerland using fully automated processes. PRECI-DIP manufactures within the highest quality standards. As such, PRECI-DIP is qualified ISO-TS16949, ISO9100 and ISO 14001.

The manufacturing of spring loaded contacts are fully integrated within PRECI-DIP: On one site, we are manufacturing pistons and barrels with our high speed turning machines, plating them, coiling springs, stamping clips and finally realizing the automatic assembly with 100% quality check.

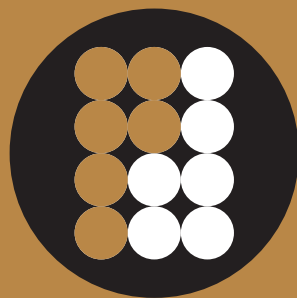
In addition we fully committed to the continuous improvements of spring loaded technology in order to respond to the most challenging customer needs.

PRECi-DIP INTERCONNECT COMPONENTS FROM STANDARD PRODUCTS TO CUSTOM DESIGN

ENJOY THE PRECI-DIP BENEFITS

FIND A WORLD OF SWISS QUALITY
UNDER ONE ROOF

- SCREW-MACHINING
- STAMPING
- SECONDARY OPERATIONS
- SPRING MANUFACTURING
- PLATING
- AUTOMATIC ASSEMBLY



preci-dip