Ultrasonic tumor aspiration: 
LEVICS – for precision specialists
The resection of intracranial and spinal tumors requires an accurate proceeding to preserve the surrounding structures as much as possible. The neurosurgical LEVICS Micro instrument from Söring has been specially developed for this challenge and is therefore characterised by its excellent design. With its working frequency of 35 kHz, it fragments tumors of different consistencies precisely and effectively. Thanks to its integrated aspiration the tumor fragments are immediately removed. Additionally, the instrument impresses with its low weight which was reduced by ten percent compared to its predecessor device. This supports a safe working over long periods of surgery. Above all, the filigree and angled shape of the instrument body ensures an optimum view of the surgical field.

Surgical precision in a highly sensitive environment:
- 10% reduced instrument weight supports long procedures
- angled instrument body allows optimum view of the surgical field
- efficient aspiration ensures a continuous workflow

Excellence in design:
LEVICS Micro instrument

Flexibility thanks to modularity
The LEVICS Micro instrument features three sonotrodes with different lengths and diameters to allow optimised treatment of a range of different lesions. These sonotrodes can be easily mounted and replaced at any time.

1 compared to predecessor series
Click & Start: 
**secure and fast sonotrode assembling**

The LEVICS Micro instrument is ready for use in a minimum of time thanks to its special concept for sonotrode assembling. Using the intuitive torque wrench the sonotrode can be mounted rapidly and easily without any additional tools. A clearly audible click signals that the sonotrode and instrument body are securely connected.

**Easy assembling:**

1. **Ensure the torque wrench is ready to use,** ...
2. **place the torque wrench onto the sonotrode** ...
3. **and turn. C L I C K! Finished!**
   The sonotrode is securely fastened.

**Each component has its place in the LEVICS instrument tray**

The LEVICS instrument tray offers space for each individual product – from the instrument body with a separate instrument cable, to the sonotrodes and the torque wrench. This enables effective sterilisation and ensures the components are tidily arranged and ready at hand in the operating theatre.
At a glance:
LEVICS product overview

LEVICS Micro instrument

<table>
<thead>
<tr>
<th>Article no.</th>
<th>92-501</th>
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<tr>
<td>Length</td>
<td>170 mm</td>
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<tr>
<td>Weight</td>
<td>67 g</td>
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<td>Angle</td>
<td>90°</td>
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<tr>
<td>Handle material</td>
<td>titanium</td>
</tr>
<tr>
<td>Irrigation &amp; aspiration</td>
<td>yes</td>
</tr>
<tr>
<td>Scope of delivery</td>
<td>with separate cable</td>
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<tr>
<td>Reprocessing</td>
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LEVICS instrument tray

<table>
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<tr>
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<th>616S0100</th>
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<td>Reprocessing</td>
<td>reprocessable</td>
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LEVICS torque wrench

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<td>Reprocessing</td>
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Procedure kits for LEVICS Micro instrument

1 x sonotrode, 5 x double tubing, 5 x flue

<table>
<thead>
<tr>
<th>Article no.</th>
<th>616K0040</th>
<th>616K0041</th>
<th>616K0042</th>
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<tr>
<td>LEVICS sonotrode</td>
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<tr>
<td>Working length</td>
<td>96 mm</td>
<td>100 mm</td>
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<tr>
<td>External Ø</td>
<td>Internal Ø</td>
<td>2.0 mm</td>
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Double tubings + flues

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<tbody>
<tr>
<td>Reprocessing</td>
<td>single-use</td>
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</table>

The SONOCA 300 ultrasonic generator

The SONOCA 300 is characterised by its high reliability and ease of use. During start-up it performs an automatic self-test which indicates the user that all functions are available. When the LEVICS Micro instrument is connected to the ultrasonic generator, initial operating parameters are suggested. These settings comprise ultrasonic power as well as aspiration and irrigation. All values can be easily adjusted at any time to allow a prompt and controlled response if conditions change. Due to its multifunctional application, the SONOCA 300 is suitable for use in all specialities focused by Söring.

The advantages:

- offers an integrated irrigation and aspiration function
- provides a quick set-up with automatic self-test
- allows easy adaptation of operating parameters thanks to the intuitive user interface
- supports all Söring ultrasonic instruments
Unique resection of deep-seated tumors:
endoscopic Micro instrument ENP

When removing intra- and paraventricular lesions, a minimally invasive approach may be favoured over open surgery. By providing the “Endoscopic Neurosurgical Pen (ENP)”, Söring offers the world’s only endoscopic ultrasonic aspirator whose exceptionally long sonotrode is guided through the working channel of an endoscope (Model GAAB from KARL STORZ). This allows tumors to be simultaneously fragmented and aspirated through a narrow access path in a patient-friendly procedure. Finally, this technique supports a reduction of surgery time and opens up new possibilities for minimally invasive tumor resection.

Efficient tumor resection in and around the ventricle system

- long sonotrode allows minimally invasive surgery
- also efficient in firmer tumor tissue
- simultaneous fragmentation and aspiration allow shorter operating times

Extended range of treatments in neuroendoscopy

“The endoscopic ultrasonic aspiration with the Micro instrument ENP is a safe and reliable technique for extensive decompression or complete removal of intra- and paraventricular lesions.”

Prof. Giuseppe Cinalli, Head of the Department of Neurosciences and Head of the Division of Pediatric Neurosurgery, Santobono-Pausilipon Children’s Hospital, Naples, Italy

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Trusted performance: over three decades of family-run business in ultrasonic surgery

Headquartered in Quickborn, Germany, Söring GmbH was founded in 1985 by Holger Söring, and has been manufacturing high-end products for ultrasonic surgery ever since. The family-owned company stands at the global cutting edge of ultrasonic technology with its numerous established applications for liver surgery, neurosurgery and spine surgery as well as for wound debridement. At Söring, everything is “Made in Germany”: from development and production to distribution. The wide range of products is always optimised and expanded in close cooperation with leading surgeons to achieve maximal customer satisfaction. Following this understanding, the company offers a comprehensive maintenance and servicing programme.

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USA

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www.soering.com

Specifications, design and accessories of the products are subject to change without notice.
Products might not be available in your country. Please contact the local Söring partner for further information.