

# BactoSonic®

## Ultrasonic special device for gentle removing of biofilm

### Fast microbiological diagnostic method for implant-associated infections

The successful treatment of implant infections depends on an accurate microbiological diagnosis. Microorganisms form biofilms on implant surfaces, what makes them difficult to detect by conventional methods.

BactoSonic® gently removes biofilms from implant surfaces.

After sonication the liquid is cultured on agar plates and can be used for further analysis (e.g. microcalorimetry).

A fast diagnosis of infections is possible.



### Principle of BactoSonic®

The implants are placed in the air-tight transport containers and sonicated in the specially designed ultrasonic device

BactoSonic®. Compared to other ultrasonic baths, BactoSonic® works with a very low ultrasound intensity. The biofilm is removed without killing the bacteria, a quantitative assessment is possible.



### Assessment of biofilm-forming bacteria on implants by BactoSonic®

The sonicated liquid is cultured and the quantity of bacteria can be determined. Compared to standard methods (e.g. biopsies from periprosthetic tissue) up to 10,000 times more bacteria can be detected. Mixed infections and different bacteria morphotypes can better be identified. The sensitivity especially of patients with previous antibiotic therapy is improved.

## BactoSonic 14.2

Code No. 3290

### Ready-to-use set consisting of:

Ultrasonic special device BS 14, with scientifically tested procedure, wire frame for foil test FT 14, TICKOPUR TR 3 (contact liquid - concentrate) - 250 ml

### Transport containers

IB 5, PP, 0,52 l - 2 pcs  
 IB 6, PP, 0,6 l - 2 pcs  
 IB 10, PP, 1,0 l - 1 pcs  
 IB 18, PP, 1,8 l - 1 pcs  
 IB 20, PP, 2,0 l - 1 pcs

### Dimensions mm (x w x h)

145 x 110 x 67  
 dia. 142 x 68  
 278 x 115 x 60  
 208 x 143 x 94  
 135 x 102 x 282

### Container carriers for transport containers

BT 5, PC, for 2 pcs IB 5  
 BT 6, PC, for 2 pcs IB 6  
 BT 10, PC, for 1 pcs IB 10  
 BT 18, PC, for 1 pcs IB 18  
 GH 14, stainless steel, for 3 pcs IB 20

PP = Polypropylen (plasma sterilisable), PC = Polycarbonat (plasma sterilisable)

### Transport containers for ordering separately:

Type	Pkg Qty (pieces)	Code No.
IB 5	5	3280
IB 6	5	3281
IB 10	5	3282
IB 18	5	3283
IB 20	5	3284



### Technical data

Inner tank dimensions, stainless steel: 325 x 300 x 150 mm l x w x d  
 Filling volume for operation: 9,5 Liter (contact liquid)  
 Exterior dimensions: 355 x 325 x 305 mm (l x w x h)  
 Drain: ball valve G 1/2, left side  
 Timer: 1-15 min and ∞  
 Power selection switch: adjustable 20, 40, 60 80 and 100 %

HF output: max. 200 W<sub>eff</sub>\*\*  
 Frequency: 40 kHz  
 Current consumption: 1,0 A  
 Mains connection: 230 V~, 50/60 Hz  
 Weight with accessories: 14,0 kg

\*\*Exceptionally homogeneous sound field with low intensity for a constant and gentle sonification.