

Connecting Solutions for **Occupant Safety Systems.**



Curtain airbag
Side airbag
Knee airbag
Head-side curtain airbag
Pedestrian protection airbag



Connecting Technology

Global provider of connecting solutions.

Automotive expertise.



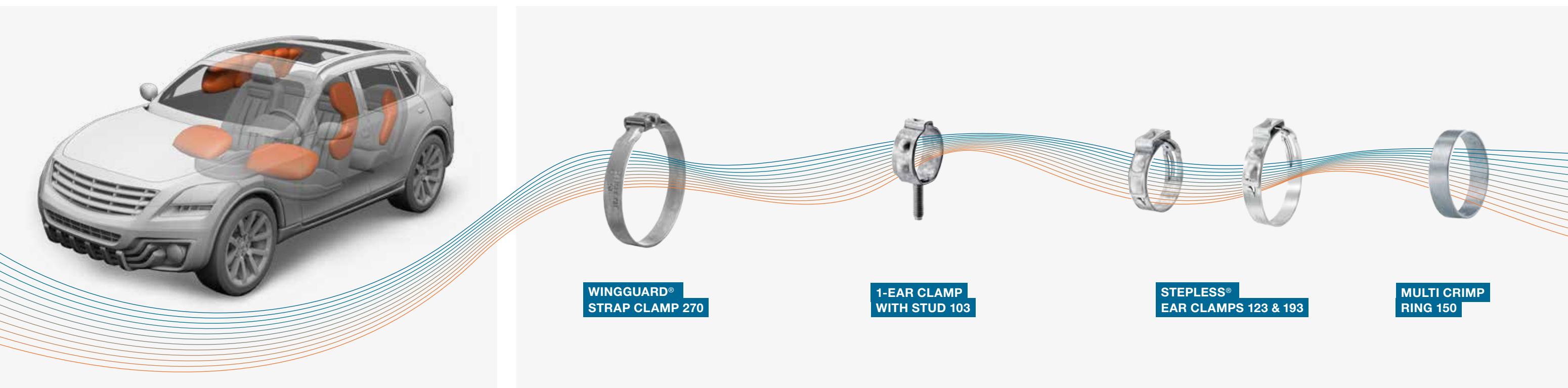
With over 70 years of worldwide experience, we design, we test and we deliver high quality connections daily at Oetiker that are simpler, smarter and stronger than ever before. We help our customers to drive innovation in motion.

Oetiker is a global provider of connecting solutions for vehicles and industrial applications. At Oetiker, we contribute to an endless array of real-world customer needs with innovative, reliable connections.

Oetiker is helping vehicle manufacturers and suppliers all over the globe to build the best connected occupant safety, powertrain, and drivetrain systems, as well as many other mission-critical key applications.

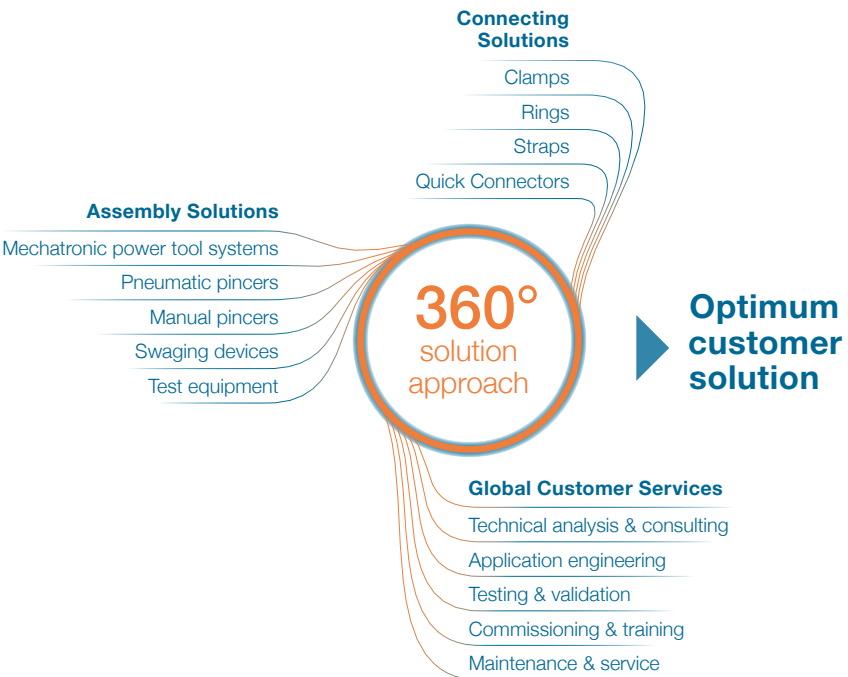
The international group of Oetiker production facilities manufacture at eleven locations on three continents. Always in close proximity to our customers. Always in accordance with unified quality standards far above norm.

Clamps for Occupant Safety Systems.



OCCUPANT SAFETY CURTAIN AIRBAG, SIDE AIRBAG, KNEE AIRBAG, HEAD-SIDE CURTAIN AIRBAG, PEDESTRIAN PROTECTION AIRBAG

Space efficiency, injury prevention and reliable components.
Safe and easy assembly.



WingGuard® Strap Clamp

270



Benefits

Fixation of curtain airbag inflator

- Fabric retention
- Inflator fixation

Safe and easy assembly

- Extended diameter range to fit various dimensions
- Clamp conforms to irregular shapes: easily assembling over brackets or airbag material

Reliable components

- High radial loads for secure connections
- Expansion-resistant to withstand extensive pressure during inflation

Quick and easy installation using the Oetiker FAST 3000

- Quick and easy assembly
- Process monitored installation

Space efficient

- Low profile design for optimal clearance

Superior design

- Optimum protection of airbag material
- Worker-friendly
- Low stress on application during installation

Technical Data

Material

Band: High strength steel,
HX 380 LAD + ZA 255

Housing: Stainless steel,
material no. 1.4301/UNS S30400

Corrosion resistance according to DIN EN ISO 9227

270 ≥ 144 h

Size range	width × thickness
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20 – 50 mm	7.0 × 0.8 mm
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WingGuard®

StepLess® Ear Clamps

123 & 193



Benefits

Fixation of curtain airbag inflator and bracket

- Fabric retention
- Inflator fixation

Leakproof and powerful compression

- 360° StepLess® sealing
- High clamping forces

Available materials

- 123** High strength low alloy material
= cost effective material
- 193** Stainless steel = high corrosion resistance and higher radial loads

Quick and reliable assembly using Oetiker electronically controlled pneumatic pincers

- Highly efficient, verified installation
- Process reliable assembly

Technical Data

Material

123 High strength steel, material no. 1.0934
Coating: zinc-plated, galfan optional

193 Stainless steel,
material no. 1.4301/UNS S30400

Corrosion resistance according to DIN EN ISO 9227

123 Zinc-plated steel band ≥ 96 h

123 Galvanized steel band ≥ 144 h

193 ≥ 1000 h



StepLess®

Standard Series

Size range	width × thickness	ear width
18.0 – 120.5 mm*	7 × 0.6 mm*	10.7 mm
30.0 – 120.5 mm*	7 × 0.6 mm*	13.0 mm
18.0 – 120.5 mm	7 × 0.8 mm	10.7 mm
30.0 – 120.5 mm	7 × 0.8 mm	13.0 mm

Heavy Duty Series

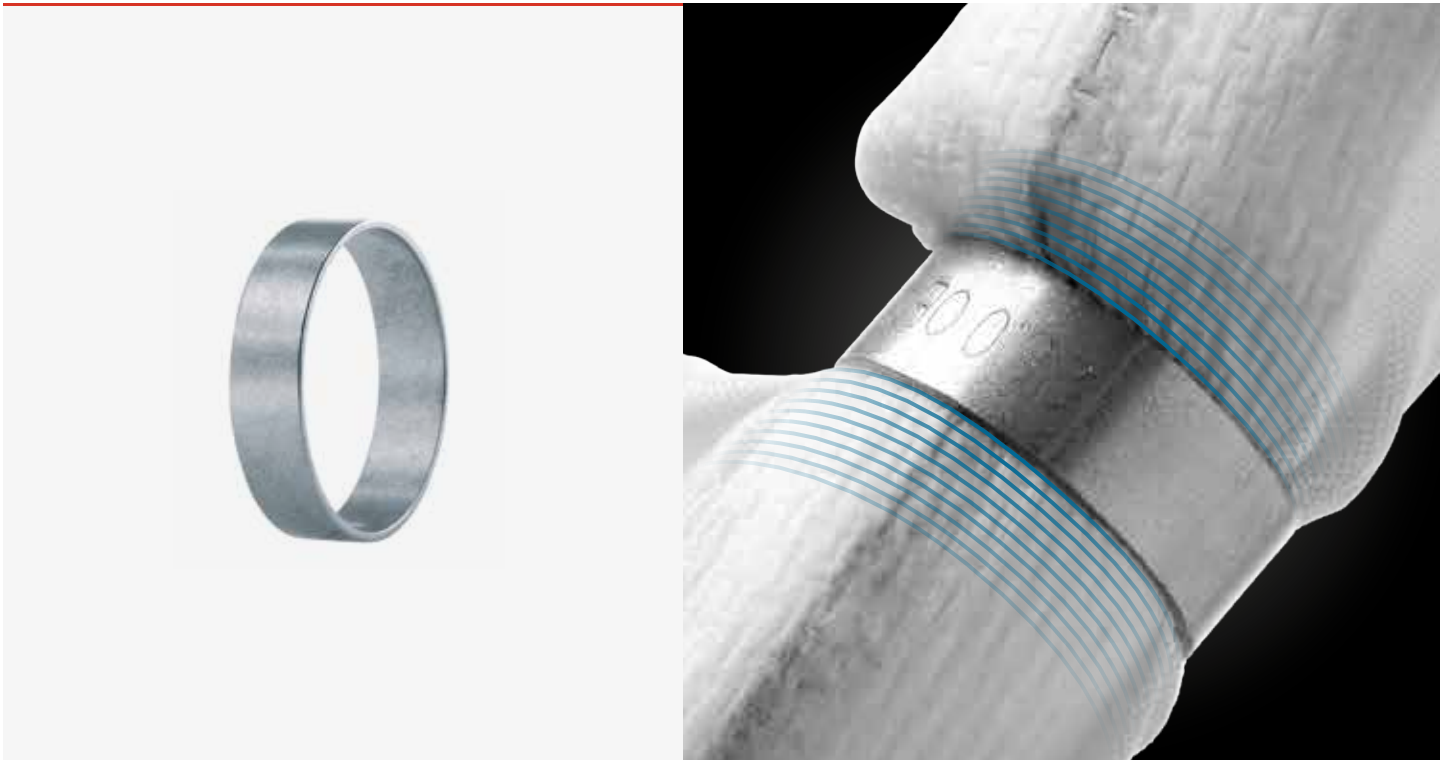
Size range	width × thickness	ear width
24.5 – 120.5 mm	10 × 0.8 mm	10.7 mm
30.0 – 120.5 mm	10 × 0.8 mm	13.0 mm
24.5 – 120.5 mm**	10 × 1.0 mm	10.7 mm
30.0 – 120.5 mm	10 × 1.0 mm	13.0 mm

* stainless steel available only

** stainless steel material size range starts at 30.0 mm

Multi Crimp Ring

150



Benefits

Fixation of curtain airbag on gas guide

- Fabric retention
- Sealing

Ultimate space-saving

- Low installed height

Optimum sealing, no leakage

- Perfectly distributed clamping forces
- Highest radial loads

Quick and easy assembly using Oetiker swaging tool

Efficiently and reliably installed

Technical Data

Material

150 Stainless steel,
material no. 1.4307/UNS S30403

Corrosion resistance according to DIN EN ISO 9227

150 ≥ 800 h

Size range

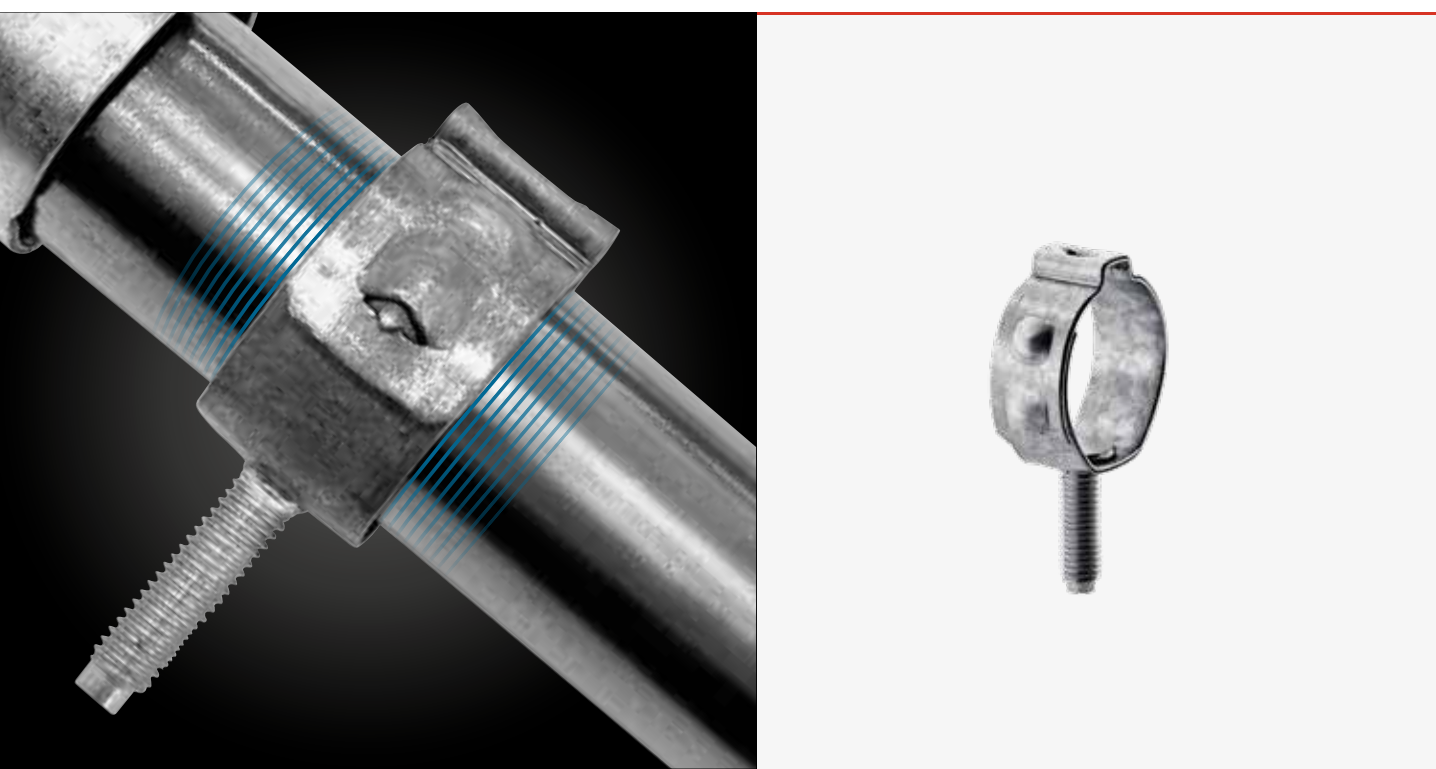
5.0 – 50.0 mm



StepLess®

1-Ear Clamp with stud

103



Benefits

Flexible inflator fixation and mounting of side airbag on seat

- Eliminates need for custom brackets

Flexible design

- Various clamp diameters
- Various stud diameters and lengths
- Optional ear positions for clearance

Quick and reliable assembly using Oetiker electronically controlled pneumatic pincers

- Highly efficient, verified installation
- Process reliable assembly

Technical Data

Material		
103 Galvanized steel band		
Corrosion resistance according to DIN EN ISO 9227		
103 ≥ 72 h		
Size range	width × thickness	stud size
20.6 – 50.0 mm	10.0 × 1.0 mm	M5 and M6
20.6 – 50.0 mm	14.0 × 1.0 mm	M5 and M6

Assembly Tools



Oetiker FAST 3000



Assembles

- WingGuard® Strap Clamp 270

Benefits

- Process monitored installation
- Regional support
- Clear user interface
- Easy programming
- Direct force control
- Assembly line integration



ELK 02

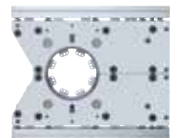
Assembles

- 1-Ear Clamp with stud 103
- StepLess® Ear Clamps 123 & 193

Benefits

- Highly efficient, verified installation
- Process reliable
- Prevention of multiple closures
- Regional support

Swaging Tool



Assembles

- Multi Crimp Ring 150

Benefits

- Optimum component access
- Guaranteed 360° compression



CAL 01

- Electronic Calibration Device
- Provides an interface for data exchange with any Oetiker electronically controlled installation tool
- AC or DC operation
- Convenient carrying case
- Used to calibrate pincers



Scan the QR Code for the video:

Connecting Solutions for
Occupant Safety Systems

Global footprint with local fingerprints. Over 1400 employees, 10 production facilities and 20 sales offices around the world – all dedicated to providing successful connections for customers. Everywhere.

www.oetiker.com

