



YOUR PARTNER FOR METERING  
AND MIXING TECHNOLOGY

**VEHICLE MANUFACTURING**



# WHO WE ARE – AND WHAT WE STAND FOR

Joined materials – metals, glass, plastics and composites can be found everywhere in our world, countless products are made out of them. Bonding technologies have more and more replaced traditional joining processes during recent years, and Reinhardt-Technik has adopted to this trend early.

What started in 1962 with a team of ambitious engineers has grown over half a century to a leading global supplier of dosing and mixing plants with a proven record of innovative solutions in the market place.

Processing liquid performance materials for bonding, sealing, moulding and surface treatment applications combined with system integration and process control are our well recognized core competences.

As a technology leader in the field of adhesive and sealant processing solutions we belong to the J. Wagner GmbH since 2012.

Wagner is a leading manufacturer of surface technology, with more than 1,400 employees globally and headquarters in Markdorf near Lake Constance.

- › **Customer orientation**
- › **Partnership**
- › **Innovative products**
- › **Individual solutions**
- › **Automation**
- › **Reliable applications**
- › **Global service**

# ABOUT THE INDUSTRY

The global environment for commercial transportation vehicle manufacturers has evolved drastically throughout the recent decades.

Growing demand for goods transportation, agricultural and special vehicles as well as public and private transportation has come along with new challenging requirements from customers.

## BUS + COUCH

Bus and Couch operators have been faced with changing requirements, passenger expectations but also legal and environmental regulations.

Lower vehicle emissions as well as passenger and driver safety and comfort have been in focus of developments.

## TRUCK + TRAILER

Truck and Trailer manufacturers have been challenged to provide improved solutions to the transportation market. Carrier and shipping agents demand overall lower transportation costs, which calls for lower weight, higher capacity and improved ergonomic handling of the vehicles.



## RAIL VEHICLES

Rail vehicle manufacturers have been encountered with more competition from airlines, which led to fast evolving design changes to address lower operational costs, passenger safety and comfort.

## RECREATIONAL VEHICLES

Recreational Vehicles owners demand increasing comfort in their motor homes and caravans but also more modern exterior designs are demanded as RVs express the lifestyle of the owner more than ever before.

## AGRICULTURAL VEHICLES

Agricultural vehicles are typically used in very harsh working conditions. Longterm withstand against shocks and vibrations is key for structural joints in such vehicles.

## PROCESSING AND APPLICATION, ADHESIVES AND SEALINGS

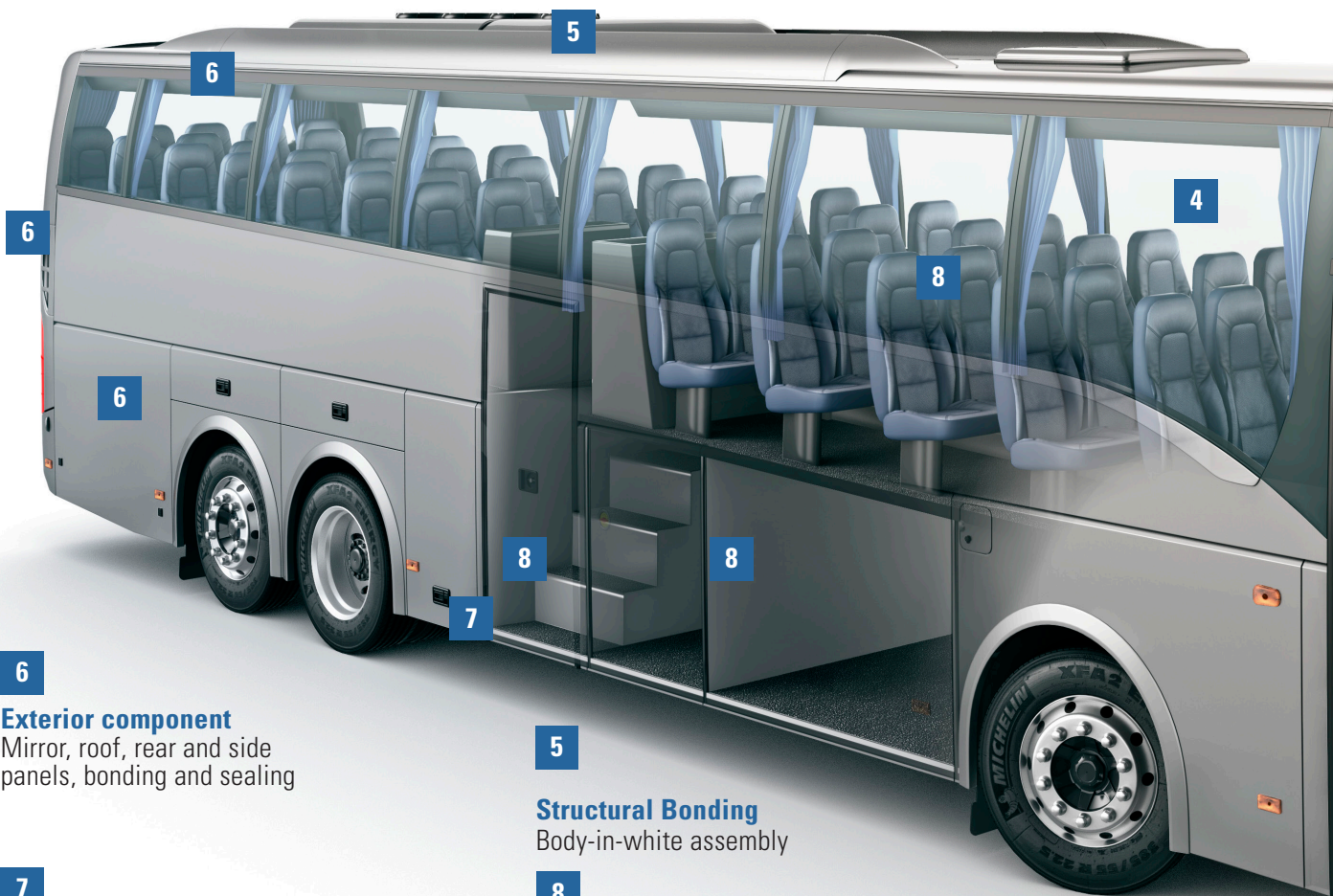
While the vehicle segments differ as such, the requirements for the manufacturers are similar. It is all about new designs, new materials and evolving assembly processes.

The choice of the right adhesives and sealants plays a major role, however, it is not only about the materials.

A key aspect is the processing and application of the different materials.

Learn more about how Reinhardt Technik products and solutions benefit your manufacturing.

# KEY APPLICATIONS



**6**  
**Exterior component**  
Mirror, roof, rear and side panels, bonding and sealing

**5**  
**Structural Bonding**  
Body-in-white assembly

**7**  
**Acoustic dampening**  
Underbody coating

**8**  
**Interior Bonding**  
e.g. luggage compartments, lashing rails

# PRODUCTS

## Visco Star

Powerful, robust and user friendly single component processing plant for 20L or 200L drums.



## Visco Star *plus*

Offers you a benefit plus in processing single component and booster (accelerator).





**1**  
**Manual application**  
 with ergonomic Ultra Mix Plus handgun (cabin window)

**10**  
**Floor Bonding**

**2**  
**Bonding of bumper modules and front panels**



**3**  
**Exterior component**  
 Ready-to-coat surfaces of exterior components with innovative IMC process



**4**  
**Direct Glazing**  
 Manual or automated volumetric adhesive application



**9**  
**Trailer**

- Bonding and sealing of structure
- Sandwich (insulation) panels
- Bonding of lashing rails



## Ecostar evo

Compact and flexible metering and mixing plant for manual application of two component materials.



## Conti Flow Versa

Versatile two component gear metering and mixing plant for highest precision.



# SOLUTION MATRIX

APPLICATION	MATERIALS	SOLUTION
Direct Glazing; Front, Rear, Side and Door systems/Windows	1K Polyethurane 1K Polyethurane with Booster (Accelerator)	<ul style="list-style-type: none"> <li>■ Visco Star 20/200</li> <li>■ Visco Star 20/200 plus</li> <li>■ Vecdos eOne/Vecdos eTwin</li> <li>■ Ultra Mix plus</li> </ul>
Body Structure; Body in White Assembly	1K Polyethurane 2K Polyethurane 2K Epoxy	<ul style="list-style-type: none"> <li>■ Visco Star 20/200</li> <li>■ Ecostar evo</li> <li>■ Conti Flow</li> </ul>
Exterior Component; Bonding and Sealing; Mirrors, Side, Panels, Roofs	1K Polyethurane 1K Polyethurane with Booster (Accelerator) 2K Polyethurane	<ul style="list-style-type: none"> <li>■ Visco Star 20/200</li> <li>■ Visco Star 20/200 plus</li> <li>■ Ecostar evo</li> <li>■ Conti Flow</li> <li>■ Conti Mix 150</li> <li>■ Ultra Mix plus</li> </ul>
Sandwich Panel manufacturing, e.g. Insulation panels for refrigerated trailers or containers	1K Polyethurane 2K Polyethurane	<ul style="list-style-type: none"> <li>■ Conti Mix 150</li> <li>■ Conti Mix 200</li> <li>■ Visco Star 200</li> </ul>
Interior Component Bonding, e.g. Luggage compartments; Lashing rails	1K Polyethurane 1K Polyethurane with Booster (Accelerator) 2K Polyethurane	<ul style="list-style-type: none"> <li>■ Visco Star 20/200</li> <li>■ Visco Star 20/200 plus</li> <li>■ Ecostar evo</li> <li>■ Conti Flow</li> <li>■ Conti Mix 150</li> <li>■ Ultra Mix plus</li> </ul>
Acoustic Dampening, Underbody coating, fire restitant materials	Low viscous dispersions coatings	<ul style="list-style-type: none"> <li>■ Single Flow 200</li> </ul>
Floor Bonding	1K Polyethurane 1K Polyethurane with Booster (Accelerator)	<ul style="list-style-type: none"> <li>■ Visco Star 20/200</li> <li>■ Visco Star 20/200 plus</li> <li>■ Ultra Mix plus</li> </ul>
Roof Bonding	1K Polyethurane 1K Polyethurane with Booster (Accelerator) 2K Polyethurane	<ul style="list-style-type: none"> <li>■ Visco Star 20/200</li> <li>■ Visco Star 20/200 plus</li> <li>■ Ecostar evo</li> <li>■ Ultra Mix plus</li> </ul>
Bumper Modules	2K Polyethurane	
Head Lamp Bonding and Sealing	1K Silicones 2K Silicones	<ul style="list-style-type: none"> <li>■ Conti Flow</li> <li>■ Vecdos eOne/Vecdos eTwin</li> </ul>
Ready-to-coat surfaces in-mould process; Composite Exterior parts	Urethane-acrylate	<ul style="list-style-type: none"> <li>■ IMCoatec</li> </ul>

# BENEFITS

- Innovative solutions help to save material, increase productivity and enhance sustainability
- Robust 1K and 2K processing equipment for reliable operation in demanding production environments
- Easy handling due to operator friendly and ergonomic design
- Optimized design and functionally based on close cooperation with material manufactures
- Standardized product portfolio provides on the spot service and spare parts availability

# FURTHER INNOVATIVE PRODUCTS

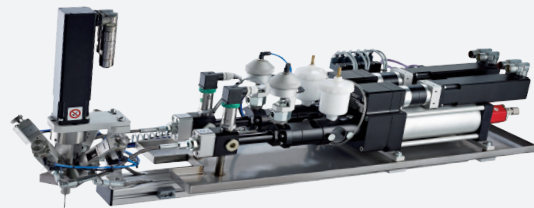
## Ultra Mix *plus*

Innovative handgun for ergonomic application of booster-fed material. Helps to reduce purging cycles and increase productivity.



## Vecdos™ eOne Vecdos™ eTwin

Servo controlled volumetric dosing units for precise and repeatable adhesive and sealant application in automated lines.



# AUTOMATION

The challenges of our customers continuously drive our innovations and technology developments.

New applications call for new solutions.

Beside our standard product lines we provide customized solutions for various bonding and sealing applications - starting from product adoptions up to fully integrated robot assembly cells.



## YOUR GLOBAL PARTNER IN VEHICLE MANUFACTURING

- **Processing and application of single and multi component adhesive and sealants**
- **Ambient and temperature conditioned equipment**
- **Complete systems for manual or fully automatic processes**
- **Innovative process control and verification**

