# EXCELLENCE IN SPRAYING SOLUTIONS

THE OWNER

Always at Your Service - AED



Lubricant Mixing and Supply System



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The lubricant mixing and supply system AED 181-080 suits a wide range of high pressure die casting machines and applications.

It combines high robustness, simply handling and maintenance with the requirements for process control and Industry 4.0.

# **EXCELLENCE IN** SPRAYING SOLUTIONS

## MAIN FEATURES

- Tank made of plastics, resistant against all commonly used release agents
- Tank system pressure less
- Volume 80 litre
- Contactless level control
- Vertical, multi-speed centrifugal pump made of stainless steel, placed outside the tank
- Agitation of lubricant via bypass
- Water connection for rinsing of the system
- Easy accessibility to all components

## BENEFITS

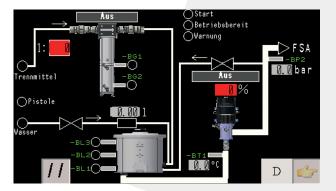
- Adaptable for all die casting machine sizes
- Easy maintenance
- No heating of the lubricant
- Small tank volume to avoid bacterial contamination
- Compact design
- Process control

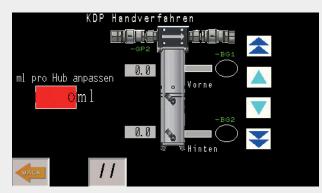
## INDUSTRY 4.0 COMPATIBILITY

- Control Siemens S7-1200 with Pro-face HMI
- IO Link Master Profinet, IO-Link connection to sensors and actuators

- Plug & play for sensors and actuators
- Status indications / information:
  - Setting of dilution ratio (Mixing pump KDP)
  - Setting of output pressure for lubricant
- Input pressure of water
- System status
- Status of sensors and actuators

### INTUITIVE AND SIMPLE PROGRAMMING





# **TECHNICAL DATA**

### Design

Feature	Data				
Tank	Tank made of plastics, resistant against aggressive release agents Rounded edges minimise sedimentation				
Pressure	Pressure less mixing tank				
Supply pump	Vertical, multi-speed centrifugal pump made of stainless steel				
Pressure adjustment	Supply pressure setting option				
Level monitoring	Electronic filling level sensor				
Displays	Visual fault display				
Finish	Tank Control cabinet Mounting frame	plastic white RAL 7035 light grey RAL 5005 signal blue			
Optional					
Warning	Acoustic warning when tank empty				
Hand spray gun	Connection for hand spray gun DAG087/DAG090, with start/stop function				
Dosatron mixing pump	Proportional dosing system operated without electric power. With mechanical adjustment of dilution ratio				
Elados mixing pump	Electrically driven membrane dosing pump. Mechanical adjustment of the dosing stroke, further electric adjustment options to adapt the dilution ratio				
KDP mixing pump	Piston dosing pump with end position monitoring				
Stainless steel version	All components in contact with lubricant made in stainless steel				
Compressed air service unit	Compressed air service unit, incl. filter and oil separator				
Forging version	Connection for supply and return line permits a ring line from and to the spraying device. Suitable for media which sediments quickly				
Technical Data					

#### **Technical Data**

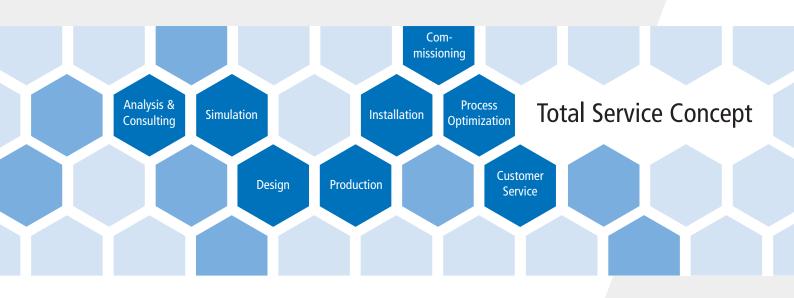
Feature	Data
Tank volume	80 I

### Technical data control unit

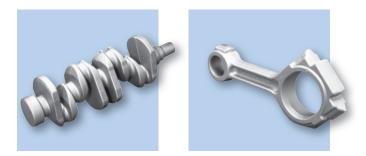
Feature	Data				
Control	S7-1200 with Pro-face HMI		Integrated in AED spray units		
Interface	Potential-free interface to master control (spraying system)		Profinetconnection to spray system		
Connection data					
Feature	Data				
Input water	1 x DIN 2553 G ¾'' D22 NW20, 3 bar				
Input air	1 x DIN 2553 G $^{1\!\!2''}$ D15 NW 13, 6 bar, acc. to ISO 8573-1, dry & filtered 10 $\mu m$				
Outlet lubricant	1 x DIN 2553 G 1 ½" D42 NW38				
Dilution ratio Dosatron	0,5% - 4%				
Dilution ratio Elados	0,3% - 3%				
Dilution ratio KDP	0,5% - 1,5%				
Supply pumps	CM 3-7	CM 5-7		CM 10-4	
Delivery rate (max.)	4.500 l/h at 6 bar	7.500 l/h at 6 bar		15.000 l/h at 6 bar	
Connected load	ca. 2,5 kVA	ca. 3 kVA		ca. 5,5 kVA	
Mains voltage	3 x 380 -480 V PE +/-10 %				
Mains frequency	50-60 Hz				
Ambient temperature	+5°C to 40°C				

# AUTOMATION AND INTEGRATION

AED is spraying automation - but we can do more. When it comes to line automation, AED can also supply and integrate equipment for various automation functions complete systems from one source.







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