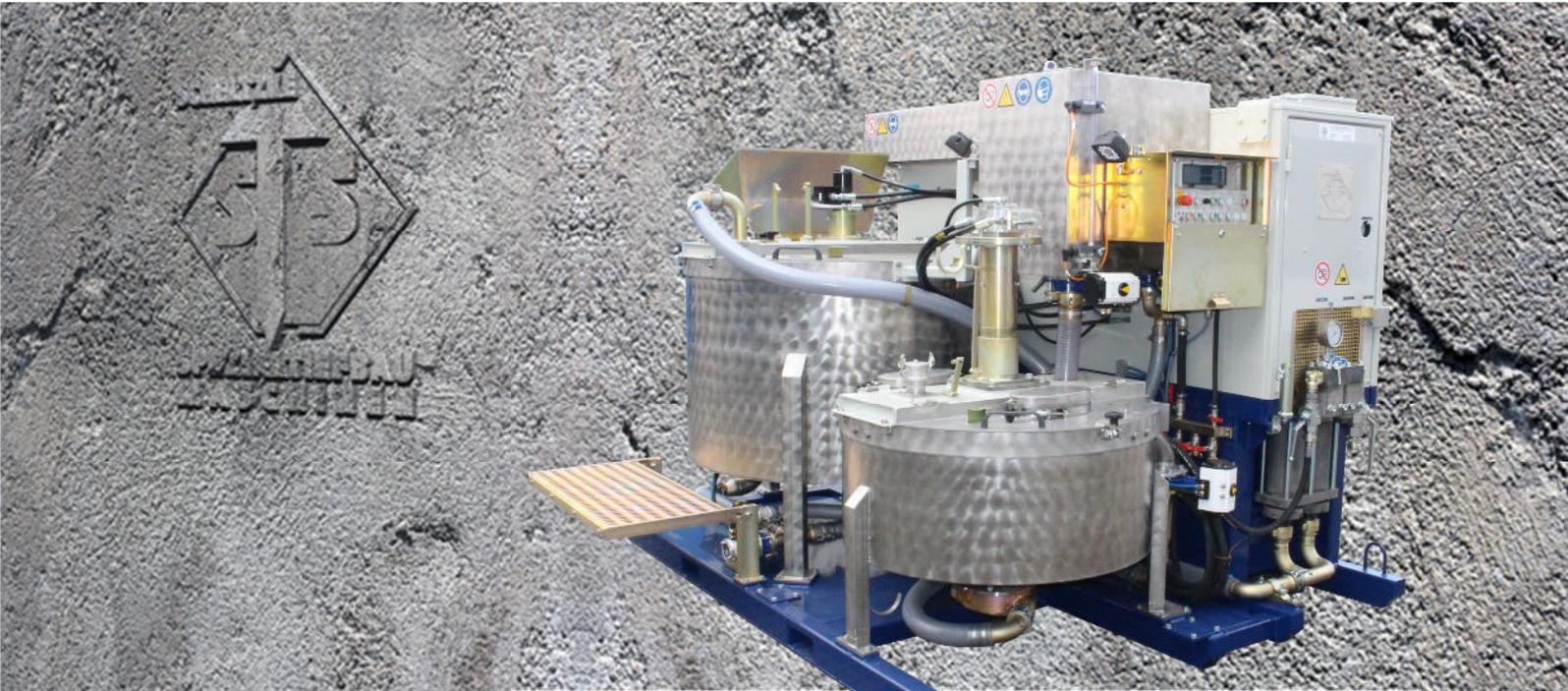


Mix-Pump-Unit semi-automatic

MPS 510-E-F-HA



Technical Data

Drive Electro-hydraulic
 Drive Power 45,0 kW
 Total Power Consumption approx. 57,0 kW

Connections
 Electrical CEE 125 A / 400 V AC, 50 Hz, IP 54
 Water inlet G 2 BSPP AG DN 50 - C-coupling
 G 1 BSPP IG DN 25 - GEKA

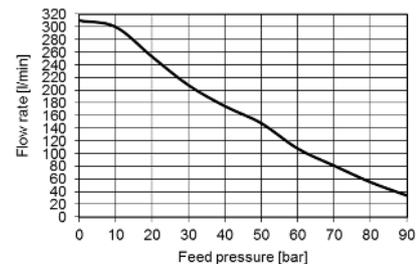
Outlet
 Pressure line G 1 ¼ BSPP IG DN 32 - RD 55
 Circulation line G 1 BSPP IG DN 25 - RD 32

Dimensions (L x W x H) 2.800 x 2.250 x 2.250 (mm)
 Weight approx. 3.600 kg

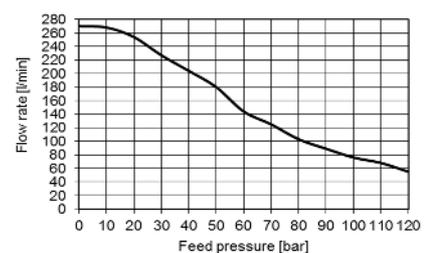
Application Mixing and pumping of cement-, micro-cement, fly ash and bentonite suspensions at fillings, flushings, groutings, piling and vibrating jobs, Soil-Mixing WSM and Cutter-Soil-Mixing CSM

Performance Mixer
 Hand feed up to 8,0 m³/h
 Feed per screw-conveyor up to 13,0 m³/h

Delivery Pump (RA = Ring Area)
 Pressure max. 90 bar¹⁾ [max. 1.305 psi]¹⁾
 Flow rate max. 310 l/min.¹⁾ [max. 82 gal U.S.]¹⁾



Delivery Pump (PA = Piston Area)
 Pressure max. 120 bar¹⁾ [max. 1.740 psi]¹⁾
 Flow rate max. 270 l/min.¹⁾ [max. 71 gal U.S.]¹⁾



Mix-Pump-Unit semi-automatic

MPS 510-E-F-HA



Standard Features

Framework

skid steel frame, partially enclosed and with partition panel, floor and oil pan, central towing device, lashing points for truck load securing, fork lift guides crosswise, machine room sound proofed, lockable doors, finishing 2K-paint RAL 5005 (signal blue) or on customer desire unicoloured

Electric Drive

electric motor 45,0 kW, 1.500 rpm, 400 V AC, 50 Hz, IP 54, automatic phase correction, motor safety switch, control voltage 24 V DC (for valves and remote control), operating hour meter

Hydraulic

oil tank volume 170 l [45 gal U.S.], axial piston pump and gear pumps, oil cooler with thermostat, main and control oil filter, oil filling and ventilation filter, electrical oil filter pollution control, oil level and temperature indicator, manometer for hydraulic and control oil pressure, pressure and flow infinitely variable

Delivery Pump

vertical two-plunger pump Ø 110 mm, flow rate per double stroke V = 4,5 l [1,18 gal U.S.], pump valves (suction- and pressure line) self-acting (ball valves), circulation and pump-down valves manually actuated, flow rate adjustment electro-proportional, automatic grease system for plunger sealing sleeves and manually with plunger oil, protective grid with safety function

Delivery Pressure Measurement

manometer 0-100 bar [1.450 psi] Ø 100 mm completely with stainless steel membrane

Water tank with Water Dosage

made of stainless steel (brushed), water storing and dosing tank V = 380 l [100 gal U.S.], fixed overflow pipe, water connection C-coupling with flushing connection and butterfly valve DN 50 pneumatically controlled, water tank inlet valve DN 50 and water tank outlet valve DN 100 pneumatically controlled, semi-automatic water metering with fluid level indicator

Mixing Tank (Colloid Mixer)

made of stainless steel (brushed), round tank with conical floor, volume 450 l [119 gal U.S.], effective volume 400 l [106 gal U.S.], mixer drive hydraulic motor (rotation speed infinitely variable), two tank covers, each hinged and lockable with screw conveyor inlets and safety end switches, cover for screw conveyor inlet with inspection flap, hopper with bag ripper, circulation and pump down valves DN 80 pneumatically controlled, transport locking screws

Tools in Mixing Tank

3 fast turning mixing tools on one common drive shaft with pump down function, 2 mixing blades Ø 250 mm, 1 pumping wheel Ø 210 mm, drive shaft bearing above mixer fluid level (No stuffing box, so dry running possible w/o any problems!)

Storing Tank

made of stainless steel (brushed), round tank with straight floor, volume 1.500 l [396 gal U.S.], effective volume 1.400 l [369 gal U.S.], agitator drive hydraulic motor (rotation speed infinitely variable), foldable and lockable tank covers with safety end switches and inspection flap, suspension inlet DN 65 with inlet basket, suspension outlet DN 80 with

pneumatically controlled valve and suction basket, cleaning cover sidewise, slowly turning agitator with a floor scraper and stream screen, fluid level control per ultrasonic sensor, safety folding grate

Control Elements Main Switch Cabinet

main switch, control lights POWER SUPPLY, CONTROL VOLTAGE, OIL COOLER OPERATION and MIXER/AGITATOR ON/OFF, warning lights OIL FILTER PUMP, OIL FILTER MIXER/AGITATOR, OIL COOLER FUNCTION and COMPRESSED AIR FAILURE, buttons HYDRAULIC MOTOR ON/OPERATION and HYDRAULIC MOTOR OFF/FAULT, button EMERGENCY-STOP, switch REMOTE CONTROL ON/OFF, switch DRAINING SUSP./WATER / ALL VALVES, switch LIGHT ON/OFF for inside rod lamp and switch LIGHT ON/OFF for outside working lamps, rotary knob for max. DELIVERY PRESSURE adjustment, flow rate counter l/min. and l/total with zero setting, auto-preset flow rate l/total, valve for switching off / adjusting the mixer speed, valve for switching off / adjusting the agitator speed, **Connection Options:** socket REMOTE CONTROL 14-pin with EMERGENCY-STOP bridge plug, sockets SCREW CONVEYOR 32 A and VIBRATOR 16 A, free sockets 400 V / 16 A, free socket 230 V / 16 A

Operating Elements Control Panel

button EMERGENCY-STOP, button MIXER/AGITATOR ON/OFF, buttons PUMP ON SUSPENSION, PUMP ON WATER and PUMP OFF, button AUTOMATIC START/STOP, buttons FILL WATER TANK and EMPTY WATER TANK, buttons MIXER CIRCULATION and EMPTY MIXER, button SCREW CONVEYOR ON/OFF, button RESET/COMPRESSED AIR FAILURE, potentiometer for FLOW RATE, batch and preselection counter for mixtures

Accessories (included)

documentation, special tools for operation and maintenance, cable remote control 15 m and cable reel 100 m, radio remote control, circulation hose, high pressure cleaner 4,0 kW, 950 rpm, 200 bar [3.045 psi] (industrial device, fixed installed) with water inlet filter, air compressor (industrial device, fixed installed), corded LED rod lamp inside, LED work lamps for mixing and storing tank outside

Accessories (optional)

spare part kits, grouting hoses, suction hoses, fittings, grouting grippers

Supplementary Devices

storing tanks for solid suspensions, dosing devices, screw-conveyors, control devices, electronic data acquisition and recording, regulating and measuring systems RMS with computer evaluation per USB and injection journal, flow meter with delivery pressure measuring, electronic delivery pressure devices (pressure transmitter) at injection place, devices for radio data transmission

Further devices, special equipments and accessories on request!