



CHARACTERISTICS

- All-inclusive solution
- Control of lubrication cycle
- Air/Oil flow regulation for each point

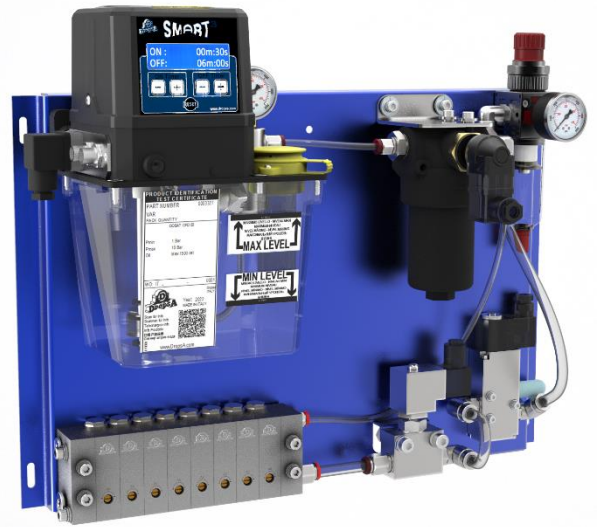
APPLICATIONS

- Machine tools
- Chain
- Bearings
- Gears
- Slideways
- Bushings

AIR-OIL PANEL FOR SPINDLES

DROPSA AIR-OIL PANEL FOR SPINDLES is a new application designed to expand upon DropsA's product capabilities. This application utilizes an excellent and flexible pump such as the **SMART 3 OIL PUMP**, with mixing manifold elements and **6700 SERIES** volumetric metering cartridges.

DROPSA's AIR-OIL PANEL FOR SPINDLES can be used for the **MACHINE TOOL INDUSTRY**, especially **spindle heads** with high-speed applications, **bearings**, and gear **boxes**. The unit can also be used in a wide range of applications where centralized lubrication is required. **Utilizing air-oil lubricant** reduces the environmental impact (compared to oil or grease lubrication) while increasing machine performance.



PRODUCT DETAILS

DropsA SMART 3 PUMP,
available in 2 liter or 3 liter version,
AUTOMATIC or MANUAL configuration.

Features:

- Motor: 24V DC - 55W
110V AC - 50/60Hz
230V AC - 50/60Hz
- Flowrate 180cc/min @2800rpm
220cc/min @3500rpm
- Automatic control available
(Setting cycles and timing, alarm or control the system)

AOB – AIR/OIL INJECTION DISTRIBUTOR BLOCKS

Adjustable air mixing manifold, with oil cartridge valves. Available in 6 different sizes:

- 1) 0.005 cc
- 2) 0.01 cc
- 3) 0.02 cc
- 4) 0.03 cc
- 5) 0.12 cc.
- 6) 0.50 cc

Due to DropsA's interlocking technology, flexibility of the system is available, and the unit can be configured with up to 8 air-oil elements.

OIL FILTER 3μ

available as an OPTION.

Electrical clogging indicator (externally controlled) can be also installed on the filter.

AIR FILTER REGULATOR

available as an OPTION.

- High performance filter with rolling diaphragm, low load losses.
- Lockable safety knob
- Pressure range: 0-8bar
- Inlet size: G1/4"

SOLENOID VALVE FOR AIR

available as an OPTION.

- 3/2 way
- electro-pneumatic coupling
- 1/4" NC monostable
- Min pressure 2.5 bar

Available with COIL:

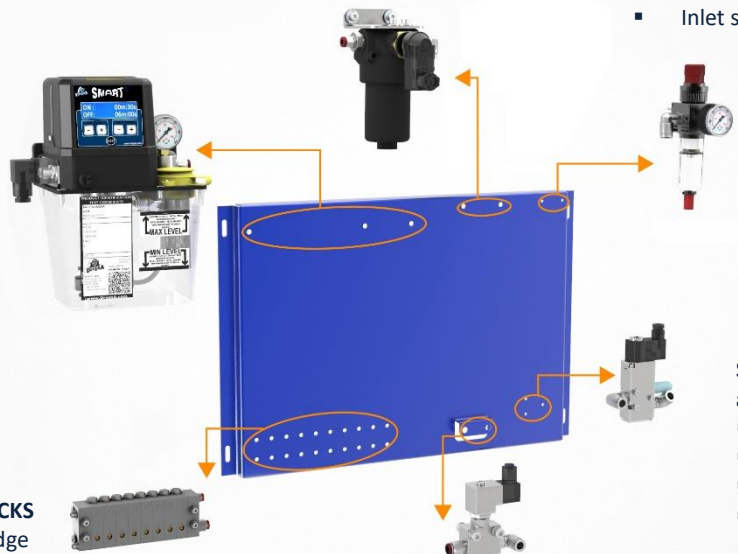
- 24V DC
- 110V AC
- 220V AC 50/60Hz

PRESSURE SWITCH for AIR

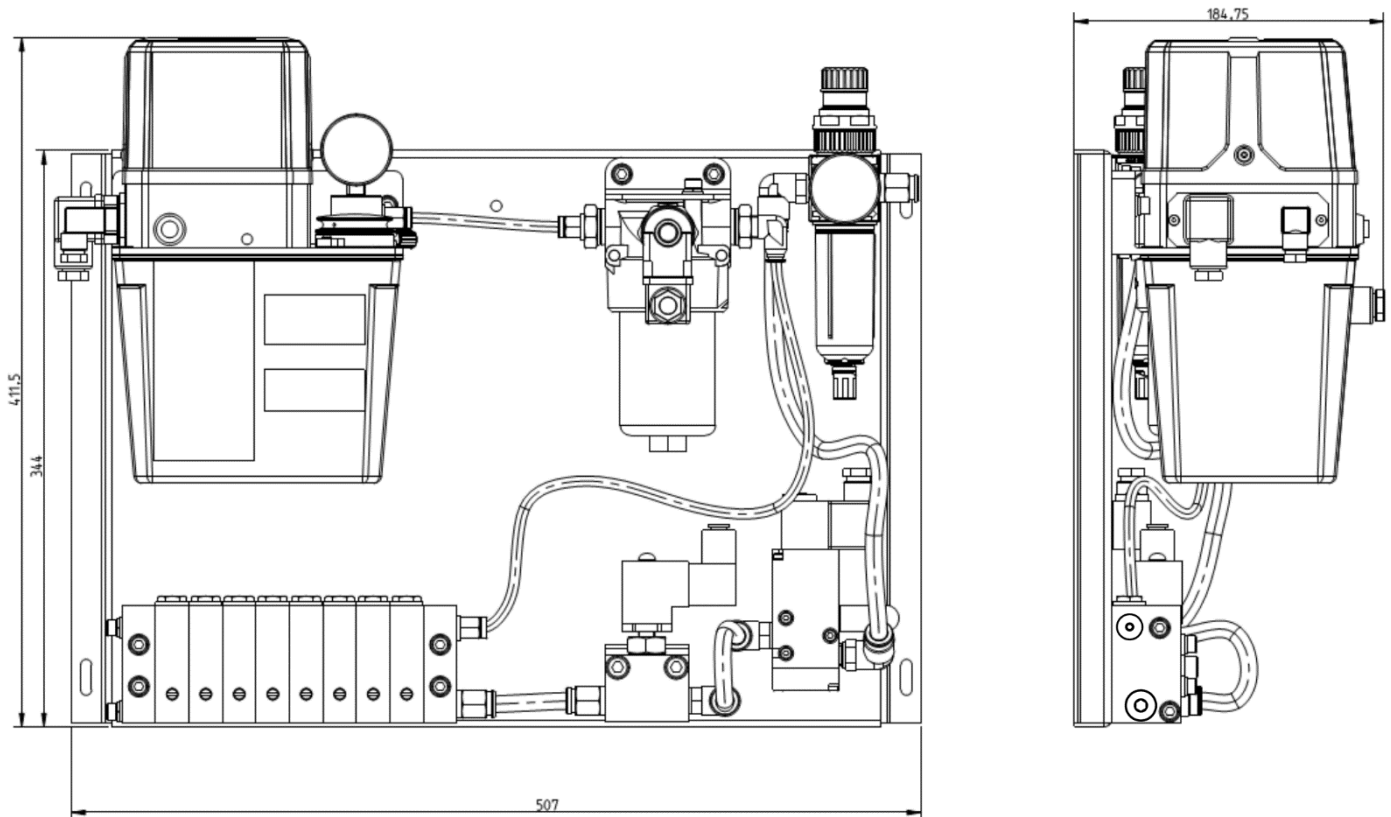
available as an OPTION.

Adjustable setting micro-switch diaphragm pressure switch.

Operative range: 0.5-10 bar



DIMENSIONS



Compared to a standard VIP4 system, this unit is an all-inclusive solution with control options (using the **SMART3 automatic controller**), air regulation, filtration, oil filtration, air pressure, and flow control.

The **NEW** mixing system use **6700 series metering cartridges** which are installed in mixing elements with air regulation. At each point the mixture can be adjusted increasing or decreasing the amount of air.



ORDERING INFORMATION

OIL PUMP				
CODE	PUMP CODE	TYPE	MOTOR	TANK
01	4010000	manual	24V DC	2 liters
02	4010100	manual	110V AC	2 liters
03	4010200	manual	220V AC	2 liters
04	4010300	manual	24V DC	3 liters
05	4010400	manual	110V AC	3 liters
06	4010500	manual	220V AC	3 liters
07	4011018	automatic	24V DC	2 liters
08	4011118	automatic	110V AC	2 liters
09	4011218	automatic	220V AC	2 liters
10	4011318	automatic	24V DC	3 liters
11	4011418	automatic	110V AC	3 liters
12	4011518	automatic	220V AC	3 liters
13	4019100	special	415V AC	3 litres

MIXING ELEMENTS	
CODE	OUTLET
0	PLUG
1	0.005 cc
2	0.010 cc
3	0.020 cc
4	0.030 cc
5	0.12 cc
6	0.50 cc

Air-Oil mixing element composition:

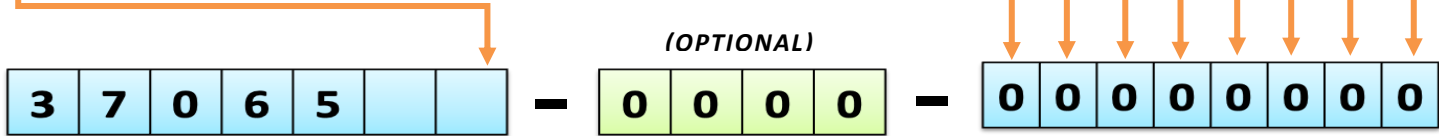
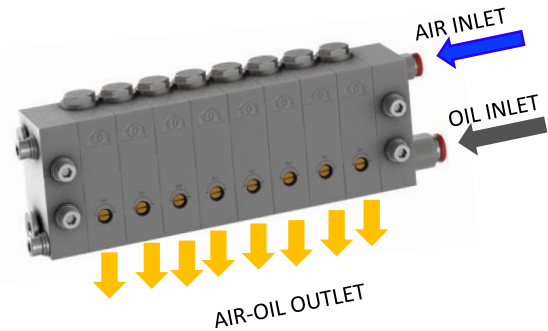
THE FIRST ELEMENT IS LOCATED CLOSEST TO THE OIL/AIR INLETS.

If the request is for 2 elements the composition will be, for example:

3706501-0113-45000000

Smart 3 manual pump, 2 liter tank, 24v DC, without oil filter, with pressure switch, solenoid valve, and filter for the air line.

The two elements are 0.030cc and 0.12cc outlets. Other elements not present or plugged (to be specified in the order request).



OIL FILTER	
CODE	DESCRIPTION
0	Oil Filter NOT INSTALLED
1	Oil Filter 3μ

(For electrical clogging indicator please to put a note in the order)

PRESSOSTATO	
CODICE	DESCRIZIONE
0	Air Pressure Switch NOT INSTALLED
1	Air Pressure Switch

SOLENOID VALVE	
CODE	DESCRIPTION
0	Air Solenoid Valve NOT INSTALLED
1	Air Solenoid Valve 24V DC
2	Air Solenoid Valve 110V AC
3	Air Solenoid Valve 220V AC

AIR FILTER	
CODE	DESCRIPTION
0	Air Filter Regulator NOT INSTALLED
1	Air Filter Regulator



ADDITIONAL COMPONENTS

MIXING VALVES OUTLET:

FITTING TYPE	PIPE DIAMETER	CODE
PUSH-IN 1/8BSP	Ø6	3084578
PUSH IN (AIR LINE INLET) – 1/4 BSP	Ø10	3084702
TERMINAL WITH CONE – 1/8 BSP	Ø6	0092080
TERMINAL WITH RING – 1/8 BSP	Ø6	0091951



OIL IN AIR SENSOR:

OIL IN AIR SENSOR is an optical sensor that detects the oil inside the air, and it is mainly used for MINIMAL lubrication air-oil application.

This sensor is placed directly on the air-oil outlet line monitoring the correct presence of lubricant in the air stream, ensuring the proper operation of the system.



PIPE DIAMETER	CODE
OIL IN AIR SENSOR	1655765

PIPES:

FITTING TYPE	PIPE DIAMETER	CODE
NYLON PIPE	Ø6	5717203
NYLON PIPE AIR LINE	Ø10	5717205



CLIPS (1 FIXING POINT):

PIPE DIAMETER	CODE
Ø6	0111201
Ø10	0111301



CLIPS (1 FIXING POINT):

PIPE SIZE	CODE
Ø4 – 4 TUBES	0111154
Ø4 – 6 TUBES	0111156
Ø4 – 8 TUBES	0111158

