

OIL VAPOR SENSOR

S120















Intelligent sensor system

helps you to identify impurities



S120 FEATURES





TOUCH SCREEN For easy operation





The S120 oil vapor sensor monitors the oil content of compressed air and gases permanently or for spot checks when used as portable unit in conjunction with S551. For best accuracy and long term stability, the S120 sensor applies an automatic calibration. Sensor contaminations and sensor life time are monitored and indicated to the user. An 'over range' detection removes the sampling air from the sensor to protect it against contamination.

The simple installation and outstanding performance makes the S120 the ideal choice when oil vapor content needs to be measured and monitored.

S120 BENEFITS

- Can be used for permanent or in portable applications
- Measures down to 0.003 mg/m³
- Easy connection through sampling hose and quick connect
- Output signals: 4 ... 20 mA
 - RS-485, Modbus/RTU
 - Relay switch (NO)
- PID sensor for highest accuracy
- Service and Alarm indication through LED
- Connectable to SUTO displays and data loggers as well as third parties displays and control units
- Integrated 5" touch screen and data logger (option)

Power

Alarm

Service SensorService Filter

LEDs indicate if pre-set alarms are reached, or if filters and sensors need to be serviced. The service indications start blinking 4 weeks before expiring and turn on permanently when a service is immediately required.

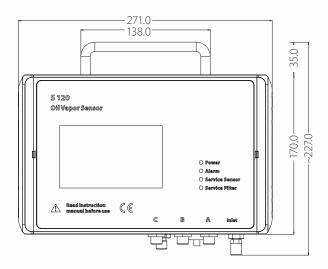
S120 TECHNICAL DATA

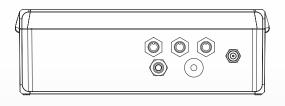
| General Specifications | |
|------------------------|---|
| Measuring medium | Compressed air and gases free of corrosive, aggressive, caustic and flammable constituents |
| Measuring range | 0.003 10.00 mg/m³ (based on 1000 hPa (a), 20°C, 0% relative humidity) |
| Resolution | 0.001 mg/m ³ |
| Sensor type | PID (photoionization detector) |
| Detection limit | 0.003 mg/m ³ |
| Accuracy | 5% of reading ±0.003 mg/m ³ |
| Operating pressure | 3 15 barg (higher pressure on request) |
| Gas humidity | < 40% rel. humidity, no condensation |
| Sample flow rate | < 2 l/min, measuring gas is released to ambient |
| Gas connection | 6 mm quick connect |
| Electrical connection | M12 connector |
| Sensor life time | 6000 operating hours. Will be indicated. Sensor exchange by service |
| Gas temperature | -20 +50°C (at inlet) |
| Ambient conditions | -20 +50°C |
| Transport temperature | -30 +70°C |
| Output signal | 4 20 mA (0 10 mg/m³) RS-485, Modbus/RTU Relay: NO, 60 VDC / 1A |
| Power supply | 24 VDC ± 5%, 10 W |
| Display & data logger | 5" touch screen, 100 million values (option) |
| Application | Downstream of activated carbon filters Downstream of oil-free compressors Wherever upstream drying and filtration is applied |
| Casing/dimensions | PC, Al alloy, 271 X 205 X 91 mm |
| Classification | IP65 |
| EMC | According to IEC 61326-1 |
| Settings | Various sensor settings can be performed through SUTO display units or through the related service software |
| Weight | 2400 g |
| Sample rate | 1 s |

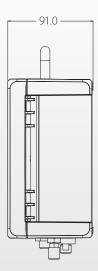
S120 APPLICATIONS

- Medical air
- Pharmaceuticals
- Breathable air for rescue workers and divers
- Food and beverage
- Semiconductor fabs
- Conveyance of hygroscopic food
- High tech processes

S120 DIMENSIONS







S120 ORDERING



Please use the following table to assist in placing your order with our sales staff.

| S120 OIL VAPOR SENSOR | |
|-----------------------|---|
| Order No. | Description |
| S604 1201 | S120, oil vapor sensor, 0.003 10 mg/m³, 4 20 mA output, RS-485, alarm output, 24 VDC supply, incl. power supply |
| S604 1202 | S120-P, oil vapor sensor, 0.003 10 mg/m³, 4 20 mA output, RS-485, alarm output, connectable to S551, transport case, incl. power supply |
| S604 1203 | S120, oil vapor sensor, 5" touch screen, 0.003 10 mg/m³, 4 20 mA output, RS-485, alarm output, 24 VDC supply, incl. power supply |
| P604 1205 | S120-P, oil vapor sensor, 5" touch screen, 0.003 10 mg/m³, 4 20 mA output, RS-485, alarm, 24 VDC supply, incl. transport case, power supply |
| R200 0120 | General service and re-calibration: - General inspection of the unit - Replacement of tubes and fittings - Cleaning of lamp and sensor - Assembly and test of unit - Calibration of oil sensor S120 |
| A554 1203 | Zero test filter for S120, 15 barg, with quick connection at both ends. |

