

SUCO 0532 ELECTRONIC PRESSURE SWITCH

053225204B004

NPN output (Low Side), NO, 0-250 Bar, NPT 1/8, Bayonet ISO 15170-A1-4.1



- One Switching Output
- Stainless Steel & Titanium Wetted Parts
- Silicon-On-Sapphire Technology
- Factory Set



PRODUCT DESCRIPTION

The SUCO 0532 electronic pressure switch is a high-performance, factory-set device featuring a compact hex-22 stainless steel housing with titanium-wetted parts and welded design, eliminating elastomer seals. It utilises advanced Silicon-on-Sapphire (SoS) sensor technology, ensuring exceptional accuracy ($\pm 0.5\%$ FS) and long-term stability ($\pm 0.1\%$ FS/year), and delivers reliable overpressure protection up to $4\times$ the rated range. Available with a single NPN (low-side) normally-open transistor output capable of handling up to 0.5 A, it supports pressure ranges from 0–10 bar up to 0–600 bar. The 0532 offers a wide choice of process ports and electrical connections, and includes factory-set switching point and hysteresis, along with a fast response time of under 4 ms.

The 0532 is ideal for high-integrity industrial and mobile hydraulic applications, such as in construction equipment, off-road vehicles, and pneumatic systems, where compactness, precision, and reliability are crucial. Its robust SoS sensor and welded housing offer high resilience to vibration, transient pressures, and wash-down conditions, making it suitable for severe environmental exposure. The NPN output with normally open configuration and field-programmed hysteresis allows seamless integration into PLC and relay-controlled systems for safety interlocks, pressure monitoring, and automated shutdown scenarios. The switch's fast response and low moving-part design reduce wear and improve lifespan, making the SUCO 0532 a dependable solution in OEM systems requiring compact, rugged, and high-precision pressure switching.

TECHNICAL DATA

GENERAL DATA

Adjustment range max	250 bar
Adjustment range min	0 bar
Process connection	1/8 NPT
Function	Normally open
Output	NPN
Burst pressure	2000 bar
Pressure max	1000 bar

TEMPERATURE & MATERIALS DATA

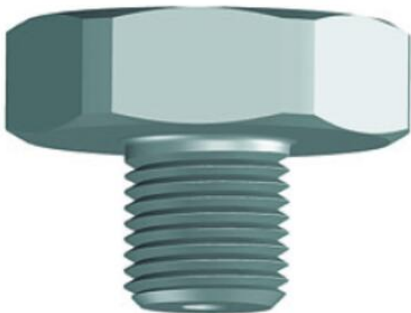
Temperature of media from	-40 °C
Temperature of media to	125 °C
Temperature ambient from	-40 °C
Temperature ambient to	100 °C
Material of body	Stainless steel 1.4305
Material of wetted parts	Stainless steel 1.4305, Titanium

ADDITIONAL DATA

Supply voltage dc max	32 V DC
Supply voltage dc min	9.6 V DC
Pressure rise	≤ 5,000 bar/s
Switching time	< 2 ms
Switching point adjustment range	2 ... 100 % of the nominal pressure range Full Scale (FS), programmable at factory
Weight	80 g

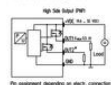
SAFETY & APPROVALS

IP class	IP67, IP6K9K
Hysteresis	2..99.8% of nominal pressure range (full scale), programmable at factory
Shock resistance	500m / s²; 11 ms half sine wave; DIN EN 60068-2-27
Vibration resistance	20g; 4..2000 Hz sine wave, DIN EN 60068-2-6
EMC	EMC 2014/30/EU, EN 61000-6-2:2005, EN 61000-6-3:2007
Accuracy	±0.5 % of adjustment range (Full scale) at room temperature
Long term stability	±0.1 % of adjustment range (full scale) per year
Mechanical life expectancy	10,000,000 switching cycles at rise rates to 5,000 bar/s nominal pressure
Repeatability	±0.1 % full scale

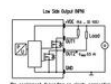


[illegible]

Connection diagrams



*OUT2 only for 054x



*S/P2 only for USA

Technical modifications and errors excepted.

EN 175301-803-A	M 12 - DIN A 45326-2-018 A	ISO 15710-A1-1	AMP Superseal
Pin Assignment 1 Unv 2 Grd 3 Unv 4 Grd 5 Unv 6 Grd 7 Unv 8 Grd 9 Unv 10 Grd 11 Unv 12 Grd 13 Unv 14 Grd 15 Unv 16 Grd 17 Unv 18 Grd 19 Unv 20 Grd 21 Unv 22 Grd 23 Unv 24 Grd 25 Unv 26 Grd 27 Unv 28 Grd 29 Unv 30 Grd 31 Unv 32 Grd 33 Unv 34 Grd 35 Unv 36 Grd 37 Unv 38 Grd 39 Unv 40 Grd 41 Unv 42 Grd 43 Unv 44 Grd 45 Unv 46 Grd 47 Unv 48 Grd 49 Unv 50 Grd 51 Unv 52 Grd 53 Unv 54 Grd 55 Unv 56 Grd 57 Unv 58 Grd 59 Unv 60 Grd 61 Unv 62 Grd 63 Unv 64 Grd 65 Unv 66 Grd 67 Unv 68 Grd 69 Unv 70 Grd 71 Unv 72 Grd 73 Unv 74 Grd 75 Unv 76 Grd 77 Unv 78 Grd 79 Unv 80 Grd 81 Unv 82 Grd 83 Unv 84 Grd 85 Unv 86 Grd 87 Unv 88 Grd 89 Unv 90 Grd 91 Unv 92 Grd 93 Unv 94 Grd 95 Unv 96 Grd 97 Unv 98 Grd 99 Unv 100 Grd	Pin Assignment 1 Unv 2 Unv 3 Grd 4 Grd 5 Unv 6 Unv 7 Grd 8 Grd 9 Unv 10 Unv 11 Grd 12 Grd 13 Unv 14 Unv 15 Grd 16 Grd 17 Unv 18 Unv 19 Grd 20 Grd 21 Unv 22 Unv 23 Grd 24 Grd 25 Unv 26 Unv 27 Grd 28 Grd 29 Unv 30 Unv 31 Grd 32 Grd 33 Unv 34 Unv 35 Grd 36 Grd 37 Unv 38 Unv 39 Grd 40 Grd 41 Unv 42 Unv 43 Grd 44 Grd 45 Unv 46 Unv 47 Grd 48 Grd 49 Unv 50 Unv 51 Grd 52 Grd 53 Unv 54 Unv 55 Grd 56 Grd 57 Unv 58 Unv 59 Grd 60 Grd 61 Unv 62 Unv 63 Grd 64 Grd 65 Unv 66 Unv 67 Grd 68 Grd 69 Unv 70 Unv 71 Grd 72 Grd 73 Unv 74 Unv 75 Grd 76 Grd 77 Unv 78 Unv 79 Grd 80 Grd 81 Unv 82 Unv 83 Grd 84 Grd 85 Unv 86 Unv 87 Grd 88 Grd 89 Unv 90 Unv 91 Grd 92 Grd 93 Unv 94 Unv 95 Grd 96 Grd 97 Unv 98 Unv 99 Grd 100 Grd	Pin Assignment 1 Unv 2 Unv 3 Grd 4 Grd 5 Unv 6 Unv 7 Grd 8 Grd 9 Unv 10 Unv 11 Grd 12 Grd 13 Unv 14 Unv 15 Grd 16 Grd 17 Unv 18 Unv 19 Grd 20 Grd 21 Unv 22 Unv 23 Grd 24 Grd 25 Unv 26 Unv 27 Grd 28 Grd 29 Unv 30 Unv 31 Grd 32 Grd 33 Unv 34 Unv 35 Grd 36 Grd 37 Unv 38 Unv 39 Grd 40 Grd 41 Unv 42 Unv 43 Grd 44 Grd 45 Unv 46 Unv 47 Grd 48 Grd 49 Unv 50 Unv 51 Grd 52 Grd 53 Unv 54 Unv 55 Grd 56 Grd 57 Unv 58 Unv 59 Grd 60 Grd 61 Unv 62 Unv 63 Grd 64 Grd 65 Unv 66 Unv 67 Grd 68 Grd 69 Unv 70 Unv 71 Grd 72 Grd 73 Unv 74 Unv 75 Grd 76 Grd 77 Unv 78 Unv 79 Grd 80 Grd 81 Unv 82 Unv 83 Grd 84 Grd 85 Unv 86 Unv 87 Grd 88 Grd 89 Unv 90 Unv 91 Grd 92 Grd 93 Unv 94 Unv 95 Grd 96 Grd 97 Unv 98 Unv 99 Grd 100 Grd	Pin Assignment 1 Unv 2 Unv 3 Grd 4 Grd 5 Unv 6 Unv 7 Grd 8 Grd 9 Unv 10 Unv 11 Grd 12 Grd 13 Unv 14 Unv 15 Grd 16 Grd 17 Unv 18 Unv 19 Grd 20 Grd 21 Unv 22 Unv 23 Grd 24 Grd 25 Unv 26 Unv 27 Grd 28 Grd 29 Unv 30 Unv 31 Grd 32 Grd 33 Unv 34 Unv 35 Grd 36 Grd 37 Unv 38 Unv 39 Grd 40 Grd 41 Unv 42 Unv 43 Grd 44 Grd 45 Unv 46 Unv 47 Grd 48 Grd 49 Unv 50 Unv 51 Grd 52 Grd 53 Unv 54 Unv 55 Grd 56 Grd 57 Unv 58 Unv 59 Grd 60 Grd 61 Unv 62 Unv 63 Grd 64 Grd 65 Unv 66 Unv 67 Grd 68 Grd 69 Unv 70 Unv 71 Grd 72 Grd 73 Unv 74 Unv 75 Grd 76 Grd 77 Unv 78 Unv 79 Grd 80 Grd 81 Unv 82 Unv 83 Grd 84 Grd 85 Unv 86 Unv 87 Grd 8