

Line Strong 3DZ Heavy duty switches

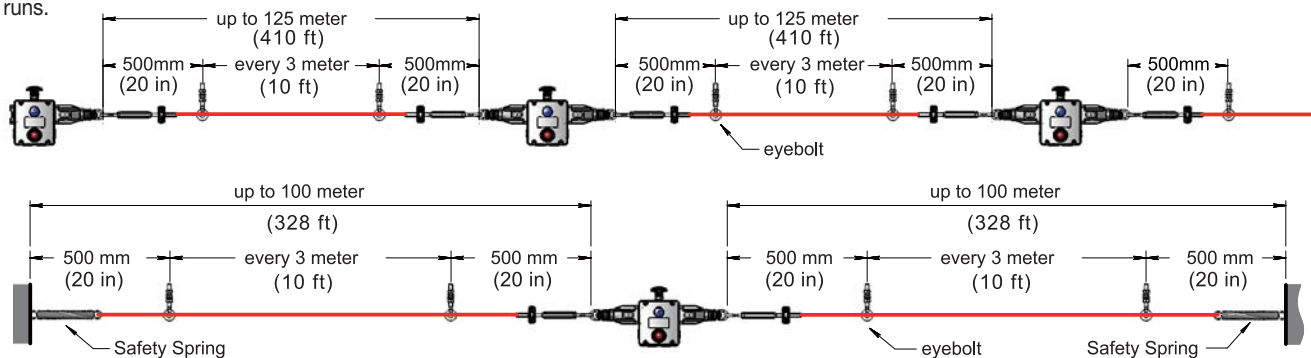
Protection up to 250 meters



The Line Strong 3DZ is a robust Heavy Duty Safety Rope Pull switch designed to protect long conveyor lengths up to 250m. The Stainless Steel 316 housings are designed specifically to withstand the tough environments found in the Food and Pharmaceutical industries. They will survive chemical and detergent washdown by providing all stainless steel parts and robust IP67 and IP69K sealing by using integral bellows and gaskets.

A bi-color LED ensures switch status can be seen easily from a distance. They have 4NC 2NO contacts to ensure flexibility with all modern control applications.

Shorter rope spans up to 200m can be achieved by using just one switch, therefore making a cost effective solution and also reducing electrical wiring runs.

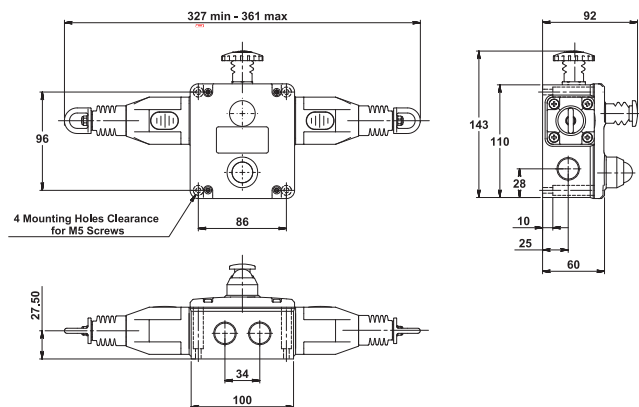


It is recommended when using a Safety Spring that a maximum of one corner pulley is used.

Standards: IEC 947-5-1 IEC947-5-5 EN954-1 EN62061
UL508 ISO13850 ISO13849-1

Safety Classification and Reliability Data:

Mechanical Reliability B10d	1.5 x 10 ⁶ operations at 100mA load
EN 954-1	up to Category 4 with Safety Relay
ISO 13849-1	up to PLe depending upon system architecture
EN 62061	up to SIL3 depending upon system architecture
Safety Data - Annual Usage PFHd	8 cycles per hour / 24 hours per day / 365 days
	< 1.0 x 10 ⁻⁷
Proof Test Interval (Life) MTTFd	21 years
	214 years
Enclosure / Cover	Stainless Steel 316
External Parts	Stainless Steel
IP Rating	IP69K (NEMA PW12) IP67 (NEMA 6)
Rope Spans	Dual Head 250m.
Rope Tension device	Tensioner / Gripper - Quick Fixing
Rope Type:	4.0 mm Outside Dia. Steel inner - PVC sheath
Mounting	4 x M5
Mounting position	Any
Conduit entries	4 x M20 or 4 x 1/2" NPT by part number
Torque settings	Mounting M5 4.0 Nm Lid T20 Torx M4 1.5 Nm Terminals 1.0 Nm
Ambient Temperature	-25C +80 C. (Cleaning 100C.)
Vibration resistance	10-500Hz 0.35mm
Shock resistance	15g 11ms
Tension Force (typical mid setting)	130N.
Typical Operating Force (Rope pulled)	< 125N. < 300mm Deflection
Weight	2000 g.
Contact type	IEC 947-5-1 Double break Type Zb Snap Action up to 4NC (positive break) 2NO (Auxiliary)
Contact Material	Silver
Termination	Clamp up to 2.5 sq. mm conductors
Rating	Utilisation Category : AC15 A300
Operational Rating	240V. 3A.
Thermal Current (Ith)	10A.
Rated Insulation Voltage (Ui)	500V.
Withstand Voltage (Uimp)	2500V.
Short Circuit Overload Protection	Fuse Externally 10A. (FF)



All Dimensions in mm

Line Strong 3DZ

2TLA050204R0322	LineStrong3DZ, 4NC/4NO, M20 ESTOP/LED SS 24VDC
2TLA050204R1322	LineStrong3DZ, 4NC/4NO, NPT ESTOP/LED SS 24VDC
2TLA050204R0323	LineStrong3DZ, 4NC/4NO, M20 ESTOP/LED SS 110VAC
2TLA050204R1323	LineStrong3DZ, 4NC/4NO, NPT ESTOP/LED SS 110VAC
2TLA050204R0324	LineStrong3DZ, 4NC/4NO, M20 ESTOP/LED SS 230VAC
2TLA050204R1324	LineStrong3DZ, 4NC/4NO, NPT ESTOP/LED SS 230VAC
2TLA050204R0222	LineStrong3DZ, 4NC/4NO, M20 LED, SS 24VDC
2TLA050204R1222	LineStrong3DZ, 4NC/4NO, NPT LED, SS 24VDC
2TLA050204R0223	LineStrong3DZ, 4NC/4NO, M20 LED, SS 110VAC
2TLA050204R1223	LineStrong3DZ, 4NC/4NO, NPT LED, SS 110VAC
2TLA050204R0224	LineStrong3DZ, 4NC/4NO, M20 LED, SS 230VAC
2TLA050204R1224	LineStrong3DZ, 4NC/4NO, NPT LED, SS 230VAC
2TLA050204R0120	LineStrong3DZ, 4NC/4NO, M20, ESTOP, SS
2TLA050204R1120	LineStrong3DZ, 4NC/4NO, NPT ESTOP, SS
2TLA050204R0020	LineStrong3DZ, 4NC/4NO, M20, SS
2TLA050204R1020	LineStrong3DZ, 4NC/4NO, NPT, SS

For all ABB Jokab Safety Rope Switches, the normally closed (NC) circuits are closed when the system is tensioned correctly and the switch has been reset.