



### 2CPSA2A1



2CPS Series, Cable Pull Safety Switch, Cable, Maintained Both Sides, 2NC/2NO Direct Opening (Switch 2, Left: 1NC/1NO; Switch 2, Right: 1NC/1NO), 1/2 NPT, Gold-plated Contacts

*Actual product appearance may vary.*

#### Features

- Positive opening operation of normally closed contacts
- Choice of 2NC/2NO or 3NC/1NO contact configurations
- Maximum cable length in a single direction is 76 m (250 ft) for a combined length of 152 m (500 ft) in dual directions
- Choice of three actuator configurations
- Removable contact block version available
- Large wiring cavity with straight-through wiring
- 24 Vdc or 120 Vac bright, multi-cluster LED status indicator light available
- Gold-plated contacts are standard
- Die-cast zinc housing
- Optional hardware packs available

#### Potential Applications

- Long conveyor systems found in warehouses and distribution centers
- Conveyor systems having a high amount of vibration
- Conveyor systems that experience wide temperature swings
- Long conveyor systems where easy through wiring, or highly visible trip status is required
- Perimeter guarding where hosedown conditions are present

#### Description

The 2CPS Cable Pull Safety Switch provides readily accessible emergency stop over a long, linear distance. It is a cost-effective means of providing this emergency stop signal compared to multiple emergency stop push buttons. (Cable Pull Safety Switches are not, however, to be used as a means of personnel safeguarding. They may be used to prevent further injury or damage to equipment when used for emergency stop signaling.)

The 2CPS Series Cable Pull Safety Switch is designed to provide emergency stop protection for exposed conveyor lines. The internal mechanism latches on both slackened cable (push) and pulled cable. This capability enhances productivity by eliminating nuisance stops due to variations in temperature, stretch of cable over time, and other application variables.

A line in the midpoint of the cable tension window indicates proper cable tension, providing easy and intuitive set-up. The direct acting switch contacts are held closed when the actuating cable is under proper tension and the reset knob is set to RUN. When the actuating cable is pulled, slackened or broken, a cam positively opens the NC (Normally Closed) switch contacts. The snap action, trip operation causes the switch contacts to change state and mechanically latch almost simultaneously when the cable is pulled, slackened or broken. The NC switch contacts remain open until the 2CPS is reset by properly tensioning the cable and

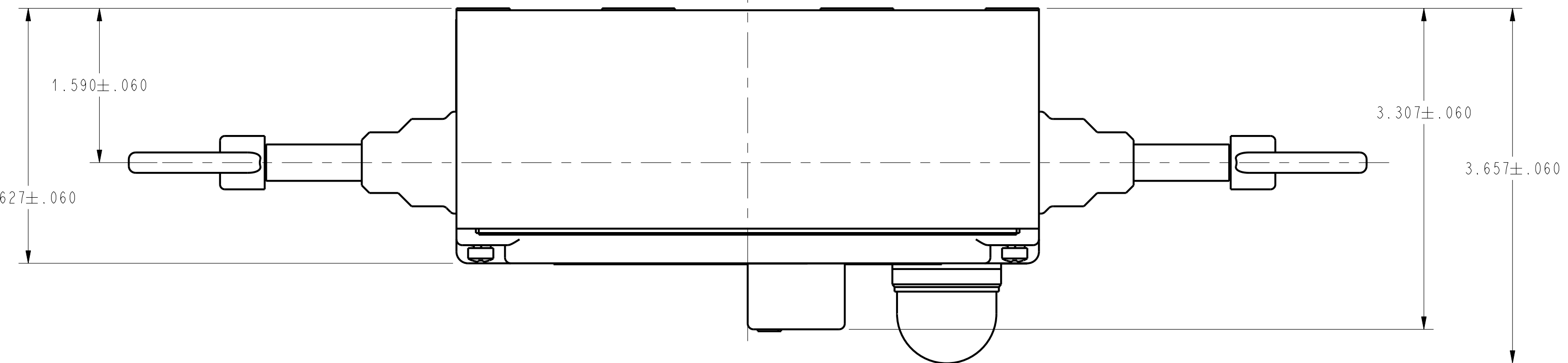
manually rotating the reset knob.

When the direct acting switch contacts open, the auxiliary contacts also actuate (open contacts close and closed contacts open). The auxiliary contacts are electrically isolated from the direct acting switch contacts. These NO (Normally Open) contacts may be used for monitoring or signaling.

The 2CPS complies with: Low Voltage Directive 73/23/EEC, as amended by directive 93/68/EEC; Machinery Directive 98/37/EEC only as the directives relate to the components being used in a safety function; IEC/EN60947-1; IEC/EN60947-5-1; IEC/EN60947-5-5.

Product Specifications	
Product Type	Cable Pull Safety Switch
Actuator	Cable, Maintained Both Sides
Switch Type	2NC/2NO Direct Opening (Switch 1, Left: 1NC/1NO; Switch 2, Right: 1NC/1NO)
Contact Material	Gold-plated
Termination Type	1/2 NPT
Ampere Rating	10 uA to 50 mA Low Energy
Voltage	250 Vac and 60 Vdc Maximum
Housing Material	Zinc Die-Cast
Series Name	2CPS
Shock	15 G
Vibration	10 Hz - 500 Hz, 5 G
Sealing	IP67, NEMA/UL 1, 4, 12, 13
Approvals	UL, CSA, CE
CSA File #	LR57326
UL File #	E37138, E157416
Agency Approvals and Standards	EN60947-1, EN-60947-5-1, EN60947-5-5
Mechanical Life	1 Million
Operating Temperature Range	-40 °C to 85 °C [-40 °F to 185 °F]
Availability	Global
UNSPSC Code	302119
UNSPSC Commodity	302119 Switches and controls and relays
Contact Block	Removable with Heavy Duty Wiring Receptacles
Indicator	None
Note 1	Low Voltage Directive 73/23/EEC, as amended by directive 93/68/EEC. Machinery Directive 98/37/EEC only as the directives relate to the components being used in a safety function.

# 2CPS



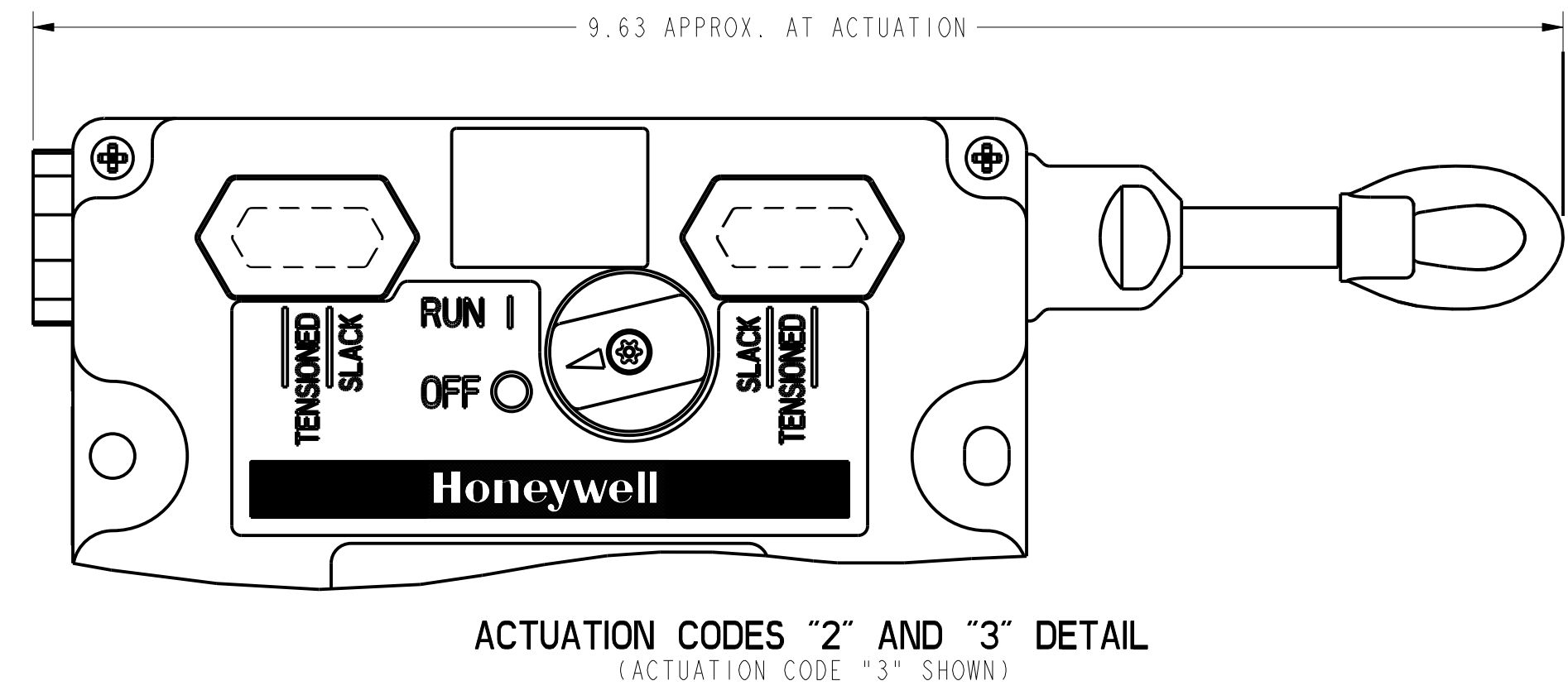
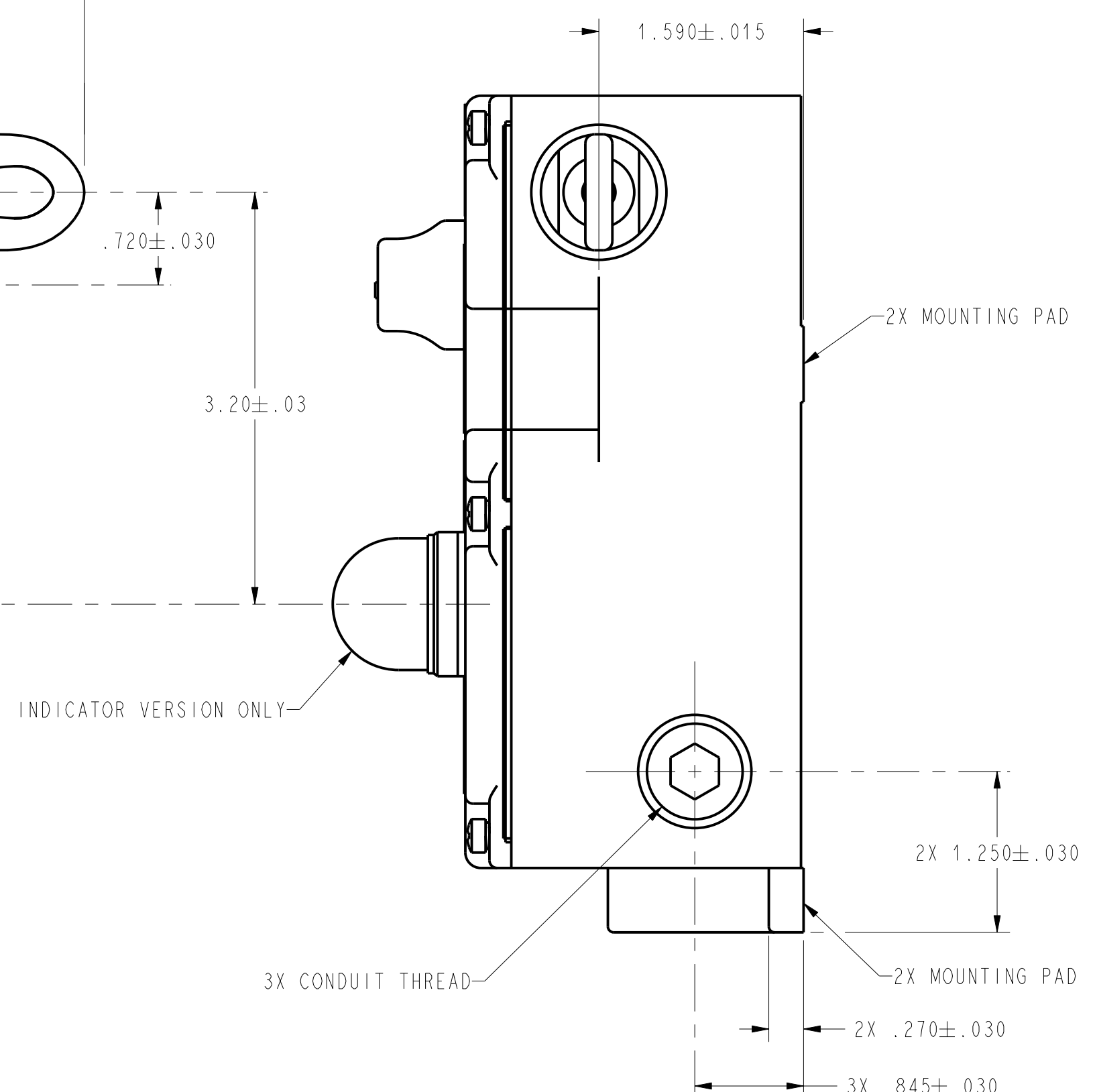
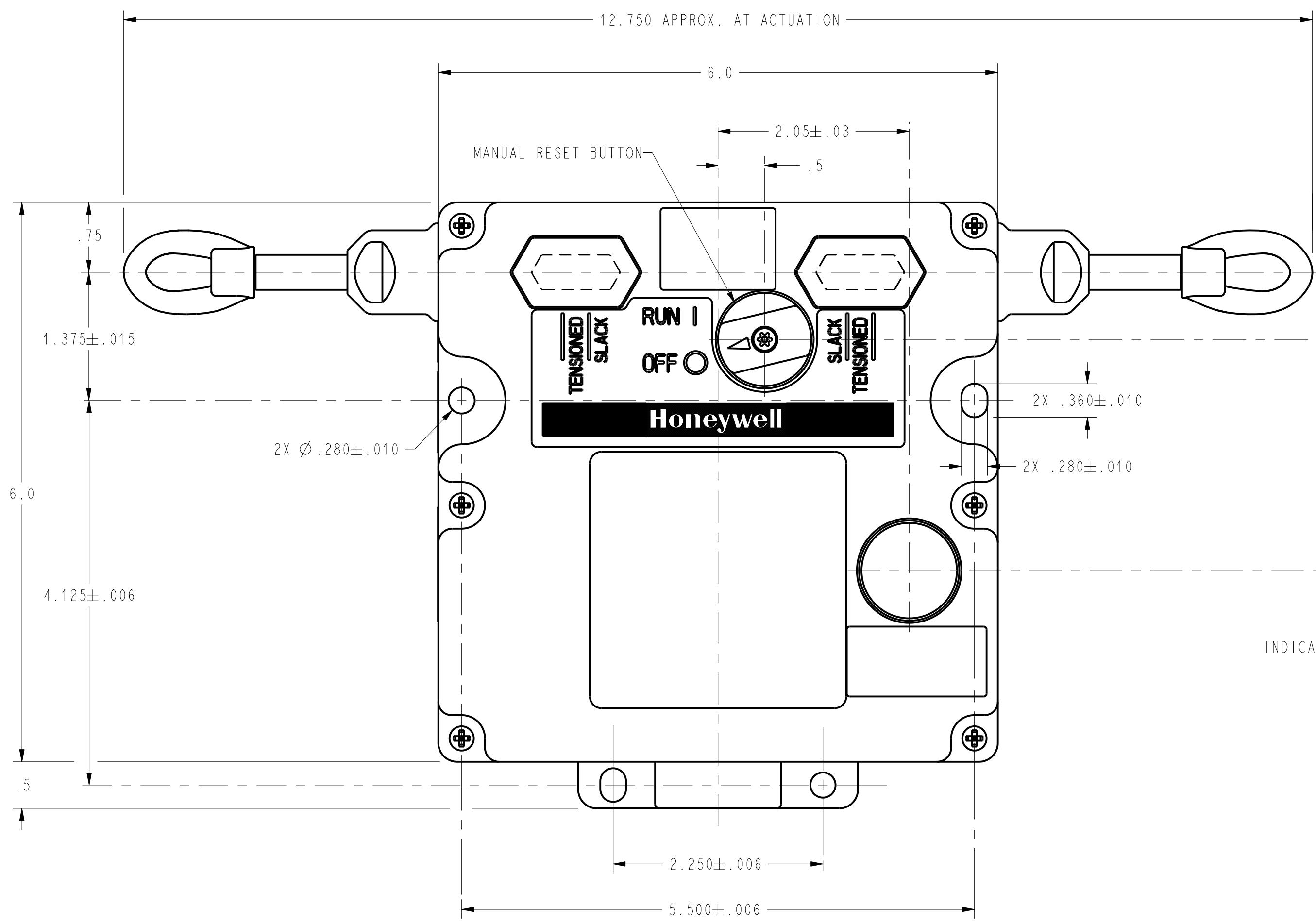
BODY CODE	
A	1/2" NPT
B	PG13,5
C	20mm
D	PF 1/2

CONTACT BLOCK MOUNTING CODE	
1	STANDARD, CONTACT BLOCKS MOUNTED TO HOUSING
2	REMOVABLE CONTACT BLOCKS W/RECEPTACLES

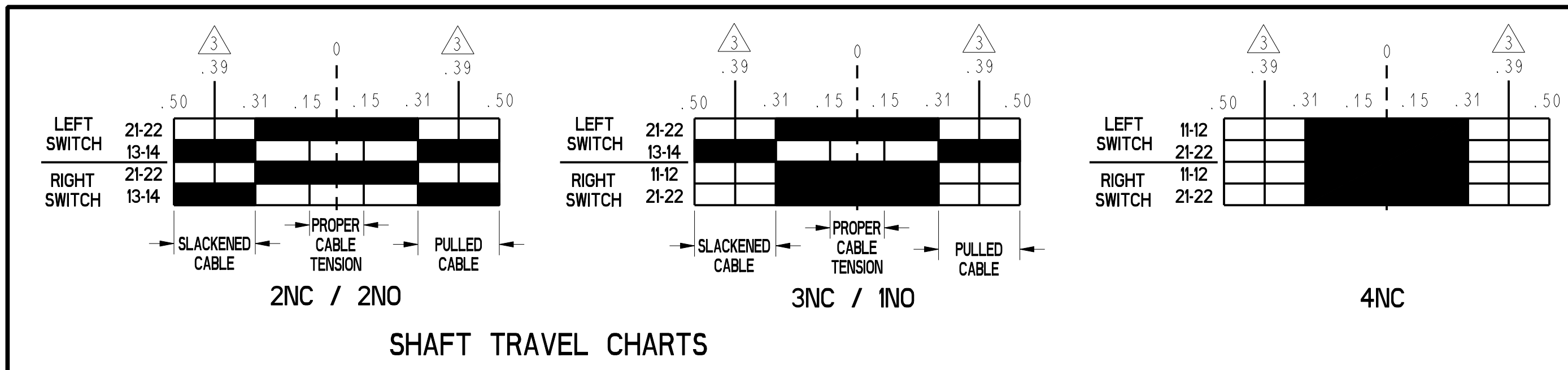
BASIC SWITCH CODE	
A	2NO - 2NC DIRECT ACTING (SWITCH 1: 1NO - 1NC) (SWITCH 2: 1NO - 1NC)
B	1NO - 3NC DIRECT ACTING (SWITCH 1: 1NO - 1NC) (SWITCH 2: 2NC)
D	4NC DIRECT ACTING (SWITCH 1: 2NC) (SWITCH 2: 2NC)

ACTUATION CODE	
1	MAINTAINED BOTH SIDES
2	MAINTAINED LEFT SIDE, NO ACTUATION RIGHT SIDE
3	MAINTAINED RIGHT SIDE, NO ACTUATION LEFT SIDE

INDICATOR-PILOT LIGHT CODE	
A	24V LED CLUSTER
B	120V LED CLUSTER



- NOTES
- HARDWARE PACKET CONSISTING OF TWO CONDUIT THREAD PLUGS AND ONE "J" HOOK TURNBUCKLE FOR EACH ACTUATOR IS INCLUDED WITH PRODUCT NOMENCLATURE IS PROVIDED FOR IDENTIFICATION OF EXISTING LISTINGS. NOT ALL COMBINATIONS ARE POSSIBLE
  - POSITIVE OPENING TO IEC/EN60947-5-1
  - FORCE TO MAINTAIN ACTUATION SHAFT AT PROPER TENSION: 25 LBS  
ACTUATION SHAFT OPERATE FORCE: 40 LBS



ELECTRICAL RATING				ENVIRONMENTAL		APPROVALS	
AC		DC		IP 67 NEMA 1, 4, 12 & 13		UL CE	
A300 Ue	AC15 Ie	O300 Ue	DC13 Ie	TEMP RANGE: -40°C TO 85°C -40°F TO 185°F		IEC/EN60947-5-5	
(VOLTS) 120 240	(AMPS) 6 3	(VOLTS) 24 125 250	(AMPS) 2.8 .55 .27	STORAGE: -40°C TO 85°C -40°F TO 185°F		BG	
Ith = 10A				SHOCK: 15G PER IEC 68-2-27 VIBRATION: 5G PER IEC 68-2-6			

UNLESS OTHERWISE SPECIFIED TOLERANCES ARE:	ASSEMBLY	DRAWN	GJW	22MAY01
NO PLACE .X ±.040 ±.1	ONE PLACE .XX ±.030 ±.04	TWO PLACE .XXX ±.015 ±.015	THREE PLACE .XXX ±.005 ±.005	ANGLES ±.1
RAW MATERIAL-COMMERCIAL STANDARD	THIRD ANGLE PROJECTION	THIS DRAWING COVERS A PROPRIETARY ITEM AND IS THE PROPERTY OF HONEYWELL. THIS DRAWING IS NOT TO BE COPIED OR USED WITHOUT THE PERMISSION OF HONEYWELL.	SAV	22MAY01
DIMENSIONS ARE TO BE MET BEFORE PROTECTIVE COATINGS ARE APPLIED.		Honeywell		
TITLE		SWITCH, ASSEMBLY		
SIZE	DWG TYPE	DRAWING NAME	REV	
D	I	2CPS SERIES CHART 1	20	
SCALE	FULL	WEIGHT	SHEET	1 OF 1