

# Pendant Push Button Controls

For the Control of

- Cranes
- Hoists
- Material Handling Equipment
- Lift Tables
- Transfer Cars



# HOB series Indirect Controls

## Features

- Wide variety for easy customization.
- High impact ABS enclosures.
- One and two speed operators.
- Neoprene booting buttons.
- Easy force & positive detent switches/buttons.
- - 15°C to +70°C ( - 5°F to +160°F)operation.
- CE Approved.
- Contacts Rated 5A at 120VAC.
- 100g Shock resistance.
- Indoor or Outdoor use, fix between bushing collar and control cable by a clamps for water-proof (Ip65) if outdoor use.

### Bushing Collar

3 sizes for cable diameters(9.5mm to 21mm).

### Cable Bushings

Available in 2 sizes  
(9.5mm to 21mm).

### Enclosure

Ergonomic design, visible safety yellow. shock and vibration resistant, rugged ABS 2 through 12 button. Regular or deep style. Two piece enclosure simplifies field wiring.

### Button legends

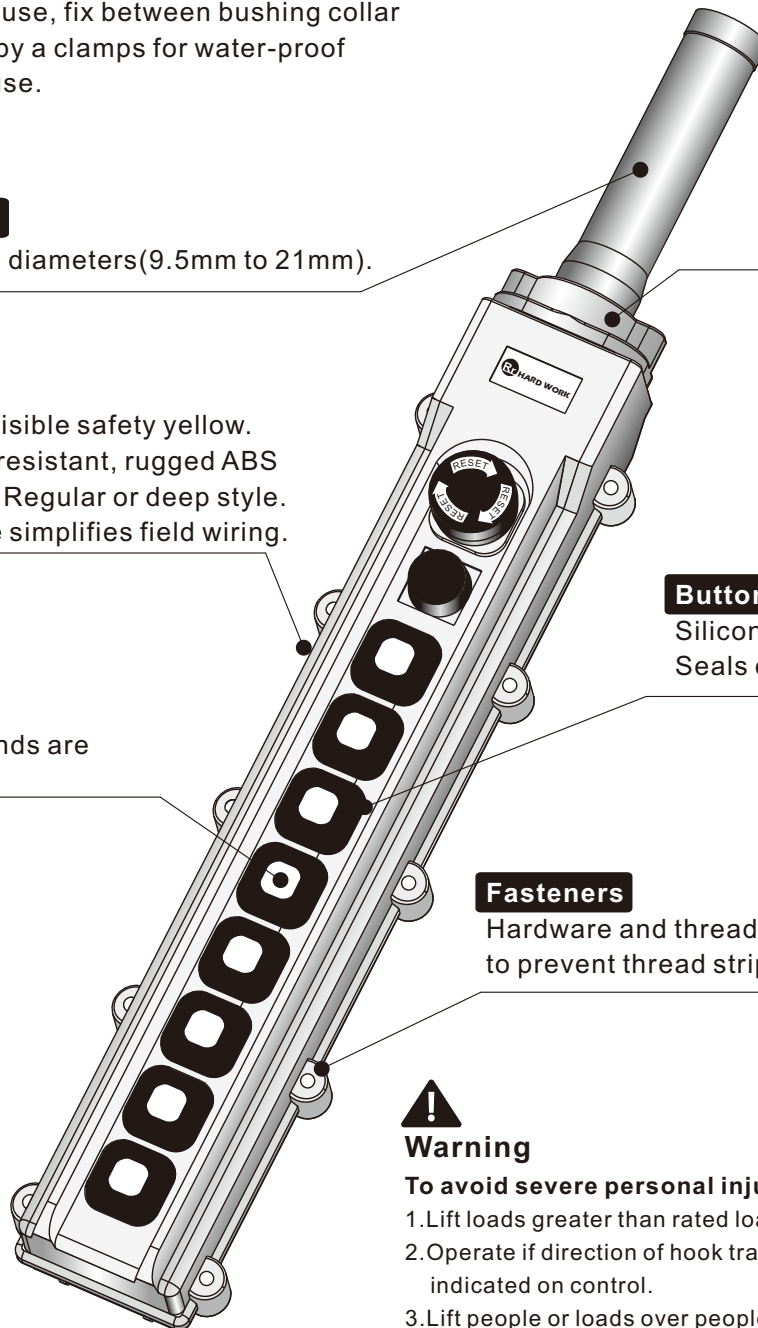
Standard button legends are included.

### Buttons

Silicon Rubber booting buttons. Seals out dirt and moisture.

### Fasteners

Hardware and threaded inserts in housing to prevent thread stripping.

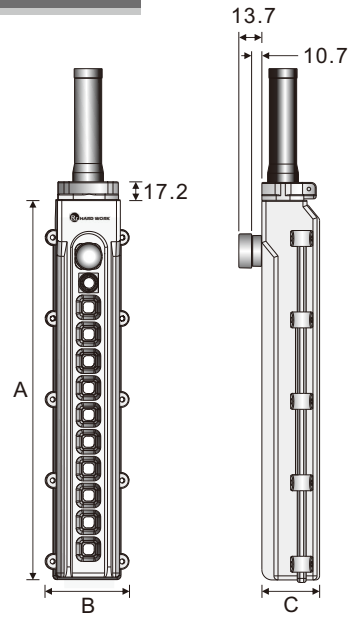


### Warning

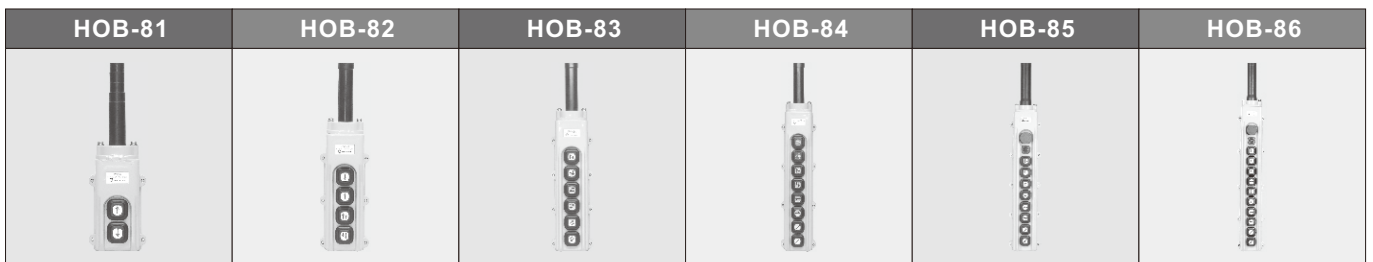
**To avoid severe personal injury or death do not :**

1. Lift loads greater than rated load capacity of hoist.
2. Operate if direction of hook travel does not agree with that indicated on control.
3. Lift people or loads over people
4. Operate unless load is centered in hook and latch is closed.
5. Operate unless hook travel limit devices function-test without loads each shift.
6. Operate with worn, twisted, kinked, or other damaged chain or wire rope.
7. Operate when hoist is not centered over load.
8. Operate hoist if chain or wire rope is not seted properly in sprockets, drum, or sheave.
9. Operate damaged or malfunctioning hoist.

# Enclosure Dimensions



Model	No. of Positions	A	B	C
HOB-81	2	123	76	53
HOB-82	4	182	76	53
HOB-83	6	242	76	53
HOB-84	8	301	76	53
HOB-85	10	369	83.5	56
HOB-86	12	425	83.5	58.5



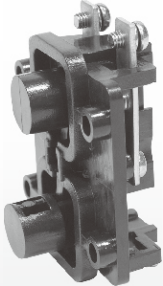
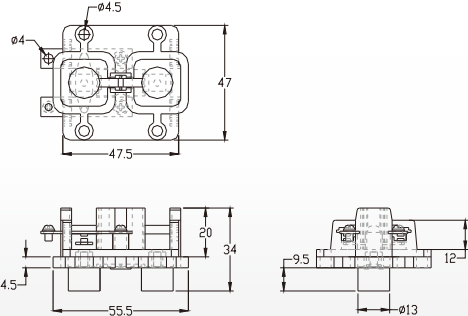
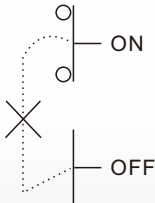
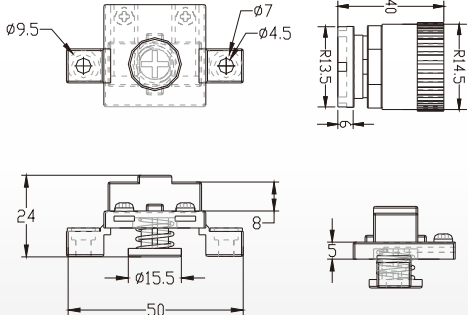


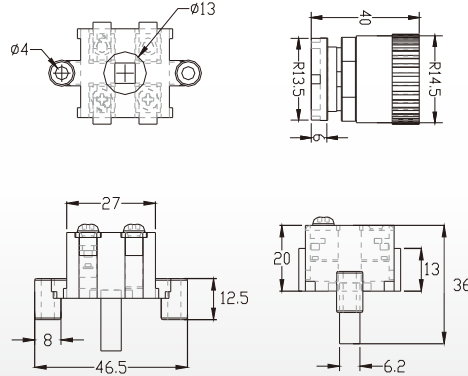
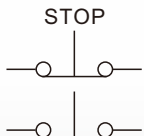
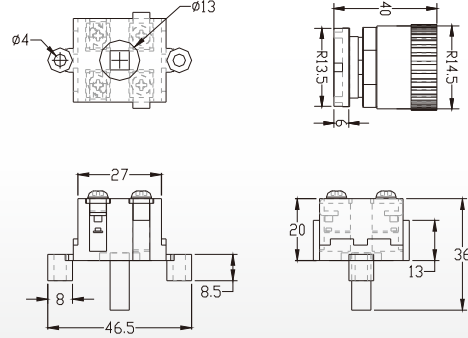
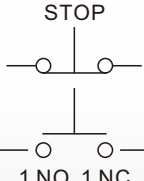
# Cable Bushing Size



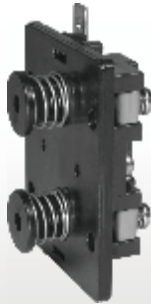
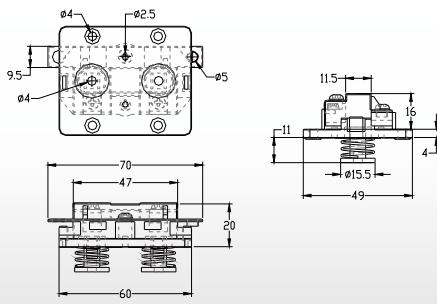
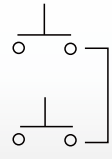

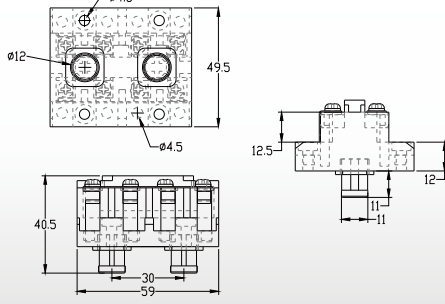
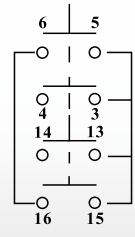

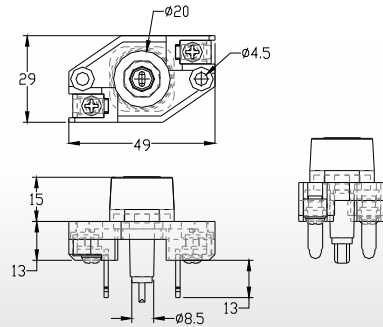
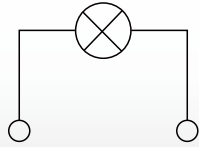

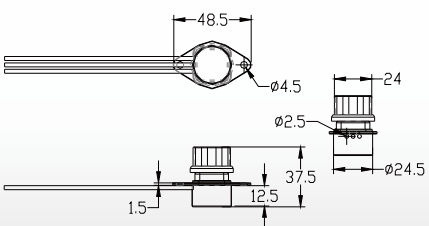
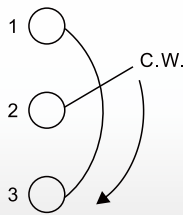

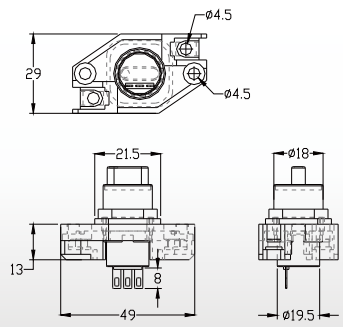
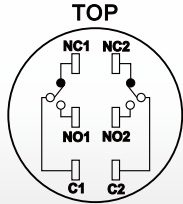
## Crane Cable with Steel wire

Stranded Conductor	No. of Core	Insulation Thickness	Insulation Diameter	Jacket Thickness	Overall Diameter
mm <sup>2</sup>		mm	mm	mm	mm
1.25	3c	0.8	3.0	1.5	9.5
	4c	0.8	3.0	1.5	11.0
	5c	0.8	3.0	2.0	12.0
	6c	0.8	3.0	2.0	12.5
	8c	0.8	3.0	2.0	15.5
	10c	0.8	3.0	2.0	17.1
	14c	0.8	3.0	2.0	18.4
	16c	0.8	3.0	2.0	19.1
	24c	0.8	3.0	2.0	19.3

# Replacements

Part N O.	Appearance	View	Drawing	Operation
<b>HOB-A</b>				<p>Maintained ON/OFF</p>
<b>HOB-B(1b)</b>				<p>Emergency Stop (1NC)</p>
<b>HOB-B(2b)</b>				<p>Emergency Stop (2NC)</p>
<b>HOB-B(1a1b)</b>				<p>Emergency Stop (1NO1NC)</p>

# Replacements

Part No.	Appearance	View	Drawing	Operation
<b>HOB-C</b>				Indirect Single Speed
<b>HOB-D</b>				Indirect Double Speed (2NO/2NO)  Option: 2NO/2NC
<b>HOB-E</b>				Light Indicator (Red or Green) 12VDC 24VDC 110VAC 220VAC
<b>HOB-F</b>				Variable Position Resistor 5KΩ
<b>HOB-G</b>				Selector Switch (2-way)

# Replacements

Part No.	Appearance	View	Drawing	Operation
<b>HOB-H</b>				Key Lock Switch (2-way)
<b>HOB-I</b>				Blanking Plug
<b>HOB-J</b>				Selector Switch (3-way)
<b>HOB-K</b>				Toggled ON/OFF
<b>HOB-R</b>				Start Switch

# HOB series – Direct Controls

Designed for direct control of single phase electric motors. Since motor current is controlled directly by the pendant switch, extra reversing contactors or costly controls are not required.


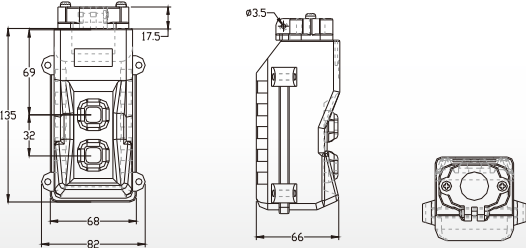

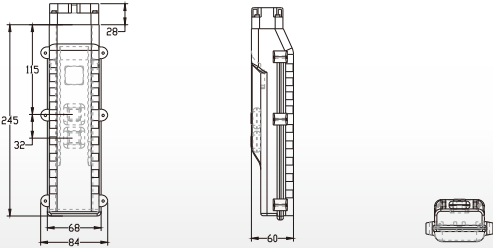

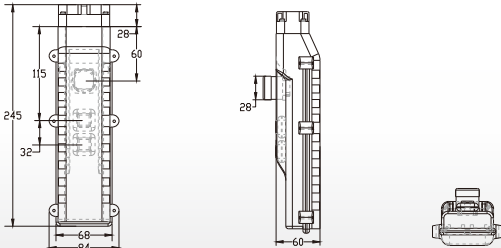

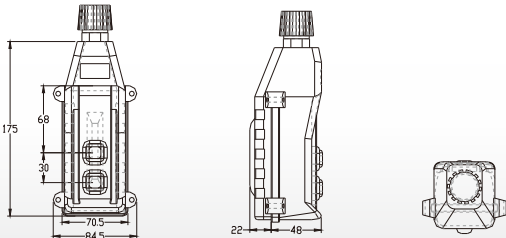

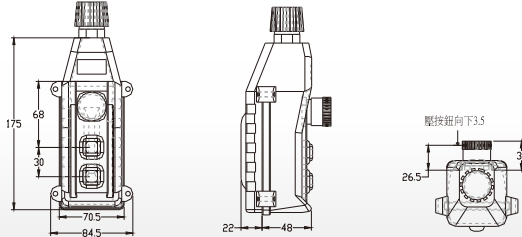

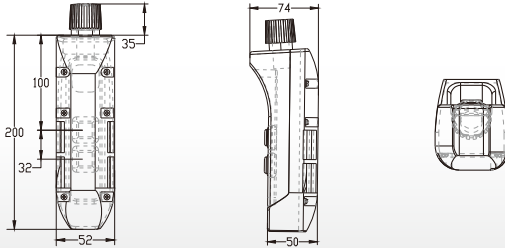

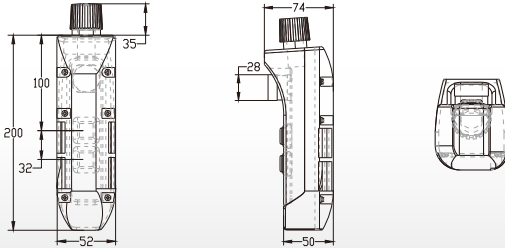
## Features

- Durable high quality ABS pendant switch housing.
- Highly visible safety orange color.
- NEMA 4/12 water-proof enclosure.
- Split case design for easy installation and wiring.
- Flenible cable boot selection to match size of cable prevents entry of debris.
- Slim compact size suited for one hand operation, insulated for operator safety.
- Direct control ratings for 1HP max. @120VAC.
- Two button switch with a wide range of legend markings
- Silicone rubber booted buttons seals out dirt and moisture.



Item	Specification
Power Source	1 $\phi$ 100/110V / 1 $\phi$ 200/220V
Voltage Rating	AC 250V
Current Rating	15A
Insulation Resistance	Above 100M $\Omega$ (DC500)
Voltage Endurance	AC 2500V, 1mintue

# HOB series Direct Controls – single phase

Model	Appearance	View	Operation
HOB-213			Two buttons with single speed
HOB-160S			Two tubes/two buttons with single speed
HOB-160SB			EMS/Two tubes/two buttons with single speed
HOB-613			Two buttons with single speed
HOB-613B			EMS/Two buttons with single speed
HOB-913			Two buttons with single speed
HOB-913B			EMS/Two buttons with single speed



# HOB series Direct Controls – three-phase

Model	Appearance	View	Operation
HOB-271			Two buttons with single speed
HOB-272			Four buttons with single speed
HOB-273			Six buttons with single speed

## Replacements

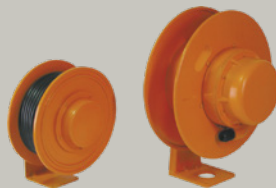
Part No.	Appearance	View	Drawing	Remark
HOB-213-C direct single speed/single phase				apply to HOB-213 HOB-613 HOB-613B
HOB-271-C direct single speed/three- phase				apply to HOB-271 HOB-272 HOB-273
HOB-913-C direct single speed/single phase				apply to HOB-160S HOB-160SB HOB-613 HOB-613B HOB-913 HOB-913B

# A Specialist in Safe/Reliable Power and Data Transfer Systems for Moving Equipment

Insulated Conductor Rails



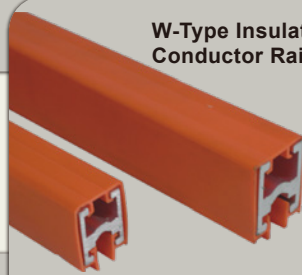
Spring Cable Reels



Flat Cable Festoon Systems



W-Type Insulated Conductor Rails



Energy Chain Systems



Push Button Pendant



Agent :