# Introducing our new line of 30mm Pilot Devices

Our broad range of 30mm (Command 52/BlackMax) Pilot Devices have long been relied on by America's leading Industrial manufacturers, OEMs, and end-users. Special attention has to be paid to the interaction between man and machine. Siemens has a wide range of pilot lights, pushbuttons units, E-STOPs, custom enclosures, and selector switches. With Siemens commanding and signaling devices, you can be confident in being able to handle every situation.

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#### **30mm Pilot Devices Product Overview**

With Siemens innovative technology and design for rapid installation, our complete range of oil tight Pilot Devices provides a solution that will be aesthetically and functionally impressive. The extensive portfolio is modular, well-proven in practice, and is 100% fit for industrial environments. Whether the application requires Chrome or BlackMax, incandescent or LED, standard duty or hazardous location, or plastic or glass – Siemens has done the work for you.

#### **New Siemens Products!**

- 3 Position: Push-Maintained, Pull-Momentary!
- 2 Position: Push-Maintained, Twist-to-Release!<sup>1</sup>
- Integrated LED Modules Our recommended 30mm illumination option!

#### **Features and Benefits**

- New Modular Design Allowing for quick delivery, multiple distributor options, and a full product line for the end-user. Lighting modules, operators, and lens can be ordered fully assembled or independently depending on your applications.
- Latest in Illumination Technology Delivering traditional incandescent lights, energy saving LEDs, and energy saving extra bright cluster LEDs.

- New Ribbed Concentric Lens Providing improved lighting distribution and aesthetic appeal.
- Less Mounting Space Making Siemens new 30mms smaller than ever.
- More In-Stock Product Meeting our customers needs by carrying a vast array of 30mm Pilot Device catalog IDs at our distribution centers.
- BlackMax corrosion resistant line withstanding the harshest environments.
- Silver contacts with gold flashing Improving contact reliability of all our contact blocks.
- > Positively driven contacts
- NEMA Type 1, 3, 3R, 4, 4X, 12, 13
- Automotive standards compliant

#### **Product Selection Options**

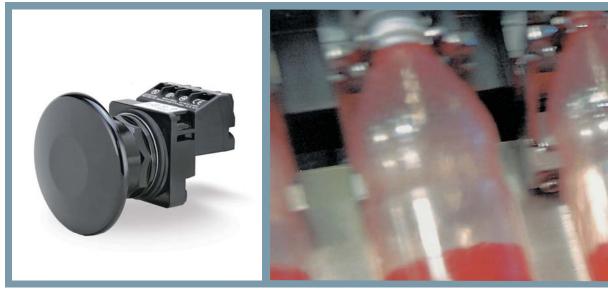
- Stock Product Tables Choose a standard pilot device from the lists of stocked product.
- Product Configurations Build a pilot device for your exact needs with our simple product configurators.

Make your choice for each selection category to generate your catalog number. Optional selection categories are denoted with gray boxes.

Selection	1	2	3	4	5	6	7
Catalog Number	52	Ρ	L	5	D	2	XY

<sup>&</sup>lt;sup>1</sup> Cat. No. 52BP, 52BR, 52PP, and 52PR, 2 Position, Twist-To-Release & 2 Position, Push Pull Maintained operators provided with red operating heads and 52BJK contact blocks meet the requirements of EN 60947-5-5 for Electrical Emergency Stop Device With Mechanical Latching Function (e-stop).

## Non-Illuminated Push-Pull Units



#### **Ordering Guide: Non-Illuminated Push-Pull Units**

#### Example:

#### 52PP2W2A

- Push-Pull Pushbutton, 30mm
- Chrome
- 2-Pos. Maintained
- Red, Non-Illuminated
- 1 3/4" Plastic
- 1NO-1NC

#### 52BP3A2

- Push-Pull Pushbutton,
- 30mm - BlackMax
- 3-Pos, Momentary
- Red, Non-Illuminated
- 1 3/4" Metal

Selection 5 6 1 2 3 4 Catalog Number 52 Ρ Ρ 2 W 2 A

Selection (1) Class 52 30mm (Oil Tight Products)

A Small Metal - 1 3/4"

W Small Plastic - 1 3/4"

V Large Plastic - 2 1/2"

X Less operating head

Selection (5)

Style

(2) Finish P Chrome B BlackMax -NEMA 4X

(6)

Color

Metal

2 Red

Plastic

1 Black 2 Red

3 Green

4 Yellow

5 Blue 6 Grey 8 Orange

3 Green C Chrome

7

Use the selection information below to build your non-illuminated push-pull unit catalog number. Please contact your Siemens account manager for further ordering details.

> (3) Product Type P Non-Illuminated Push-Pull

(4) Function 2 2 Pos: Maintained<sup>1</sup>

- **3** 3 Pos: Momentary
- 7 3 Pos: Maintained in, Momentary out

(7) **Optional Contact Blocks** 2 Pos Options A 1 NO - 1 NC (1-52BJK)

**3 Pos Options** U 1 NC - 1 NC extra late break<sup>2</sup> (1-52BAJ, 1-52BAU)

Additional contact block arrangements are available upon request. See contact block table on page 32 for a complete list of contact block offerings.

No Operating Head

Z Less head

<sup>1</sup> Cat. No. 52BP and 52PP, 2 Position, Push Pull Maintained operators provided with red operating heads and 52BJK contact blocks meet the requirements of EN 60947-5-5 for Electrical Emergency Stop Device With Mechanical Latching Function (e-stop).

- <sup>2</sup> Blocks cannot be interchanged (stop-start circuit pull to start, push to stop).



## Stock Product and Cross Reference

The following section is a cross-reference of our pre-2009 generation and new generation of non-illuminated push-pull units.

The listed non-illuminated push-pull units are just a selection of stocked product. Please consult your Siemens account manager for a complete cross-reference and list of stocked product. CHROME Non-Illuminated Push-Pull Pushbuttons, 30mm<sup>1</sup>

New	Old				
Catalog ID	Catalog ID	Pos/Func	Color	Head Type	Contacts
52PP2W1	52PA2W1	2-Pos, MND	Black	1 3/4" Plastic	
52PP2A2	52PA2A2	2-Pos, MND	Red	1 3/4" Metal	
52PP2A2A	52PA2A2A	2-Pos, MND	Red	1 3/4" Metal	1NO-1NC
52PP2W2	52PA2W2	2-Pos, MND	Red	1 3/4" Plastic	
52PP2W2A	52PA2W2A	2-Pos, MND	Red	1 3/4" Plastic	1NO-1NC
52PP2V2	52PA2V2	2-Pos, MND	Red	2 1/2" Plastic	
52PP2V2A	52PA2V2A	2-Pos, MND	Red	2 1/2" Plastic	1NO-1NC
52PP2W3	52PA2W3	2-Pos, MND	Green	1 3/4" Plastic	
52PP2AC	52PA2AC	2-Pos, MND	Chrome	1 3/4" Metal	
52PP3A2	52PA3A2	3-Pos, MMT	Red	1 3/4" Metal	
52PP3A2U	52PA3A2U	3-Pos, MMT	Red	1 3/4" Metal	1NCXLB-1NC
52PP3W2	52PA3W2	3-Pos, MMT	Red	1 3/4" Plastic	
52PP3V2	52PA3V2	3-Pos, MMT	Red	2 1/2" Plastic	
52PP7A2	NA	3-Pos, MND-In, MMT-Out	Red	1 3/4" Metal	
52PP7W2	NA	3-Pos, MND-In, MMT-Out	Red	1 3/4" Plastic	
52PP7V2	NA	3-Pos, MND-In, MMT-Out	Red	2 1/2" Plastic	

#### BLACKMAX Non-Illuminated Push-Pull Pushbuttons, 30mm<sup>1</sup>

New Catalog ID	Old Catalog ID	Pos/Func	Color	Head Type	Contacts
52PP2A2	52PA2A2	2-Pos, MND	Red	1 3/4" Metal	
52BP2A2	52PX2A2	2-Pos, MND	Red	1 3/4" Metal	
52BP2A2A	52PX2A2A	2-Pos, MND	Red	1 3/4" Metal	1NO-1NC
52BP2W2	52PX2W2	2-Pos, MND	Red	1 3/4" Plastic	
552BP2W2A	52PX2W2A	2-Pos, MND	Red	1 3/4" Plastic	1NO-1NC
52BP2VS	52PX2V2	2-Pos, MND	Red	2 1/2" Plastic	
52BP3W1U	52PX3W1U	3-Pos, MMT	Black	1 3/4" Plastic	1NCXLB-1NC
52BP3A2	52PX3A2	3 Pos, MMT	Red	1 3/4" Metal	
52BP3W2	52PX3W2	3 Pos, MMT	Red	1 3/4" Plastic	
52BP3V2	52PX3V2	3-Pos, MMT	Red	2 1/2" Plastic	
52BP7A2	NA	3-Pos, MND-In, MMT-Out	Red	1 3/4" Metal	
52BP7W2	NA	3-Pos, MND-In, MMT-Out	Red	1 3/4" Plastic	
52BP7V2	NA	3-Pos, MND-In, MMT-Out	Red	2 1/2" Plastic	

 <sup>1</sup> Cat. No. 52BP and 52PP, 2 Position, Push Pull Maintained operators provided with red operating heads and 52BJK contact blocks meet the requirements of EN 60947-5-5 for Electrical Emergency Stop Device With Mechanical Latching Function (e-stop).
<sup>2</sup> Blocks cannot be interchanged (stop-start circuit - pull to start, push to stop).

## **General Information**

## UL and CSA

- UL 508 Industrial Control Equipment
- CSA 22.2 No. 14-05. Industrial Control Equipment

#### CE Mark

• EN 60947-5-1 Ed. 2.2 (Low-voltage switchgear and control gear – Part 5-1: Control Circuit Devices and Switching Elements – Electromechanical Control Circuit Devices) NEMA Types 1, 3, 4, 4X, 12 and 13

IP 10, 11, 14, 52, 54, 56, 57, 67 (front), 20 (back)

#### IEC 60529

NEMA ICS 5 Annex F-2002 High Pressure Power Wash



## FAQs

## 1. What are the new products and features available for the 30mm pilot devices?

- a Previous Generation Improvements:
  - I Modular Lighting Modules Enabling easy replacement and ability to order as a kit
  - II Ribbed Concentric Lens Increasing light distribution on the Pilot Lights and Push-to-Test units
  - III Components and features Enhancing and updating to support our customers with even better designs and aesthetics
- b New Products
  - I Integrated LED Modules
  - II Twist-to-Release
  - III 3-Position Push-to-Maintained
  - IV IEC 6094755 Rated E-Stops for European Market (includes red 2-position push-pull and twist-to-release units)

## 2. Can I mix new product with the old?

a - The main constraint from a product mix perspective is using one generation per grouping. For example, don't mix different generations of Pilot Lights.

### 3. Are the components interchangeable between generations?

a - For the most part, the answer is no. Components and accessories should be used for a specific generation.

#### 4. How do I select products for the 30mm Pilot Devices? What cross-reference tools are available?

- a Selecting New Generation Products
  - I 30mm Pilot Devices Brochure (this document)
  - II 2010 Industrial Controls Catalog Section 10
  - III Sielect Online Catalog (http://sielect.sea.siemens.com)
- b Old Generation Products
  - I 2006 Industrial Controls Catalog Section 10
  - II Accessories can be found in the 2010 Industrial Controls Catalog Section 10
- c Cross-Reference Tools
  - I Sielect Online Catalog (http://sielect.sea.siemens.com) has downloads for cross-reference tools (excel based).
  - II 30mm Pilot Devices Brochure (this document) contains cross-reference tables of stocked product.
  - III Pushbutton and Pilot Devices Internet Site has downloads for cross-reference tools (excel based).

## 5. What are BlackMax products?

a - BlackMax/NEMA4X provides a corrosion resistant epoxy fluorocarbon coating. Examples of the protection include: hydraulic fluid, methyl ethyl ketone, H-D lube oil, and trichloroethlene.

## 6. What is the difference between glass and plastic lens?

a - Plastic lens provide an attractive ribbed/grooved design. Glass lens provide lenses that are noticeably sleek and are made of a robust durable glass. Glass lens are very aesthetically sharp.

## 7. What is an LED Module? What is the key benefit?

a - The integrated LED modules are a single unit combining all the features of a LED bulb and lighting module into one. These will have extended life and are the most resistant to vibration.

#### 8. Why are stock products listed in the guide with such emphasis?

a - Choosing a stock product will generally give the quickest delivery for our Pilot Devices. Therefore, we are making every effort to provide what's available at our Distribution Center.

## **Push Buttons & Signaling Devices** 30mm Water, Oil Tight & Corrosion Resistant - Class 52

### **Non-Illuminated Push Pull**

#### Selection Guide

## 2 & 3 Position Push-Pull Mushroom Head Devices - Non-Illuminated



Mushroom Head Metal Ø 1 3/4"



Mushroom Head Plastic Ø 2 1/2"



Mushroom Head Plastic Ø 1 3/4"

Part Number	52	a	P b		d	e	<b>f</b> ³	
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а	Code	Finish
~	Р	Chrome-Command 52
	В	Epoxy Coated-Black Max
b	Code	Туре
	Р	Push Pull
С	Code	Function
	2	2 positions - maintained <sup>1</sup>
	3	3 positions - momentary in - momentary out
	7	3 positions - maintained in - momentary out

d	Code	Style
	А	Small metal 1-3/4" (44.5 mm)
	W	Small plastic 1-3/4" (44.5 mm)
	V	Large plastic 2-1/2" (63.5 mm)

е	Code	Col	or
		Plastic	Metal
	1	Black	_
	2	Red <sup>1</sup>	Red <sup>1</sup>
	3	Green	Green
	4	Yellow	_
	5	Blue	_
	6	Gray	—
	8	Orange	_
	С		Chrome
		No Operat	ing Head
	Z	No he	ead

1 EMERGENCY-STOP control devices according to IEC 60947-5-5 when provided with red operating head and positively driven NC contact blocks. Positive opening contacts according to IEC 60947-5-1, Appendix K.

2 Blocks cannot be interchanged (stop-start circuit - pull to start, push to stop).

3 For operator without contact blocks leave position f blank.

3	Code	Contact Blocks
		2 Position
	А	1 NO + 1 NC <sup>1</sup>
	В	2 NO + 2 NC <sup>1</sup>
	С	3 NO + 3 NC <sup>1</sup>
	D	4 NO + 4 NC <sup>1</sup>
	E	1 NC (LB)
	F	2 NO
	G	2 NC <sup>1</sup>
	Н	1 NO (EM)
	J	1 NC <sup>1</sup>
	К	1 NO
	Q	1 NO - 1 NC (ELB)
		3 Position
	U	1 NO - 1 NC extra late break <sup>2</sup>