

# Knob-type Selector Switch A22S/W

## Install in 22-dia. or 25-dia. Panel Cutout

- Easy mounting and removal of Switch Unit.
- Increase wiring efficiency with three-row mounting of Switch Blocks.
- Finger protection mechanism on Switch Unit provided as a standard feature.
- Use 25-dia. ring to install in 25-dia. panel cutouts.
- Mounted using either open-type (fork-type) or closed-type (round-type) crimp terminals.
- IP65 oil resistance (non-lighted models)  
IP65 (lighted models)
- EN60947-5-1
- UL and cUL approved (File No. E41515).

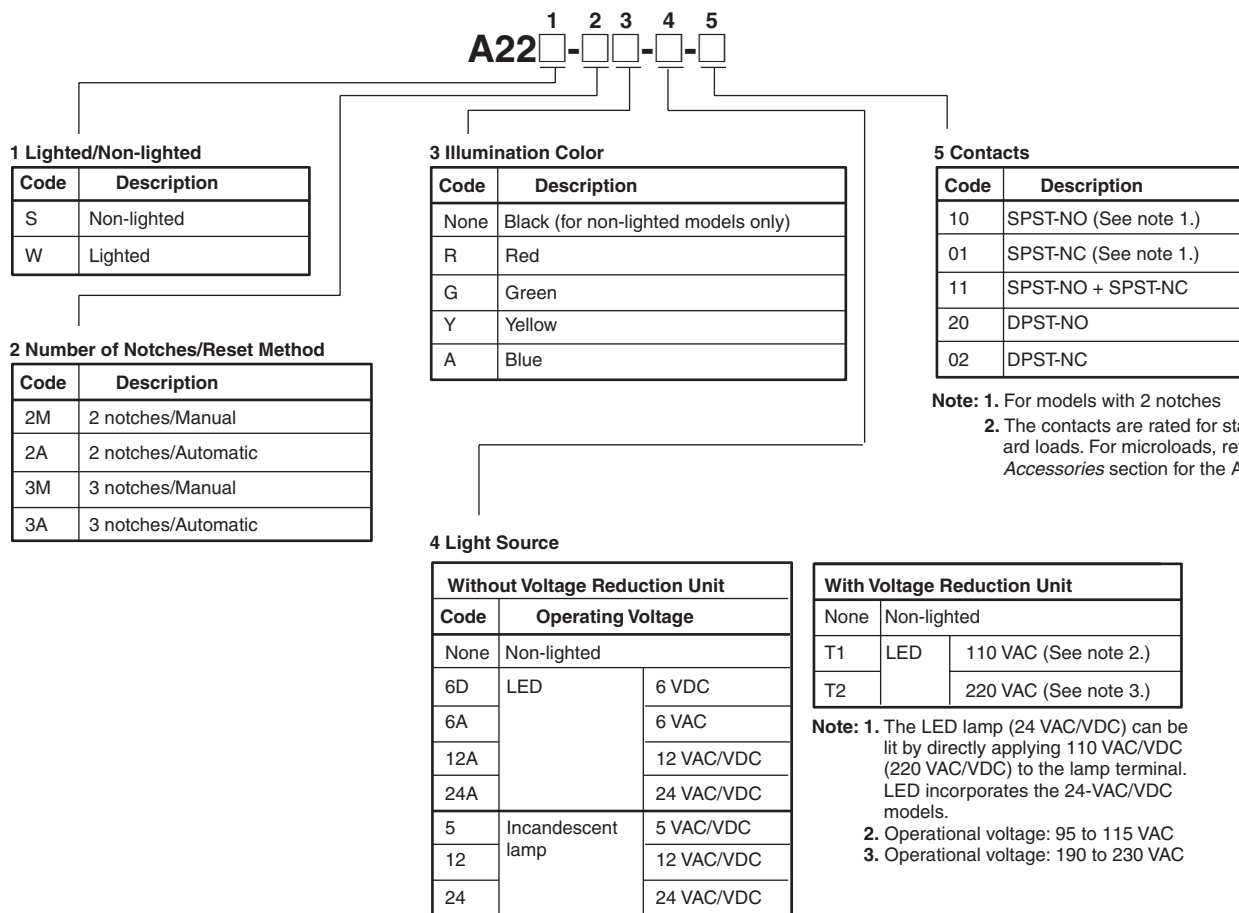


## Model Number Structure

### Model Number Legend

#### Completely Assembled

Shipped as a set which includes the Selector, Lamp (lighted models only), and Switch.



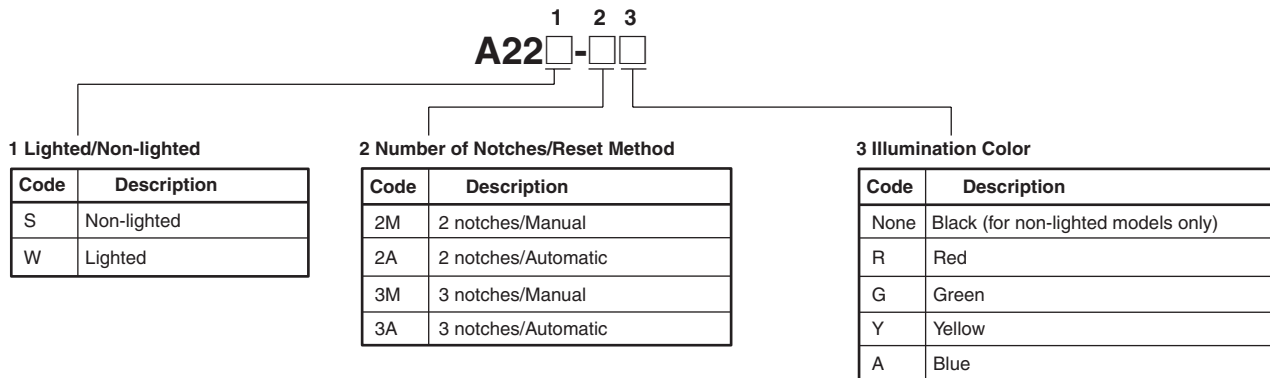
**Note: 1.** For models with 2 notches  
**2.** The contacts are rated for stand-ard loads. For microloads, refer to *Accessories* section for the A22.

**Note: 1.** The LED lamp (24 VAC/VDC) can be lit by directly applying 110 VAC/VDC (220 VAC/VDC) to the lamp terminal. LED incorporates the 24-VAC/VDC models.  
**2.** Operational voltage: 95 to 115 VAC  
**3.** Operational voltage: 190 to 230 VAC

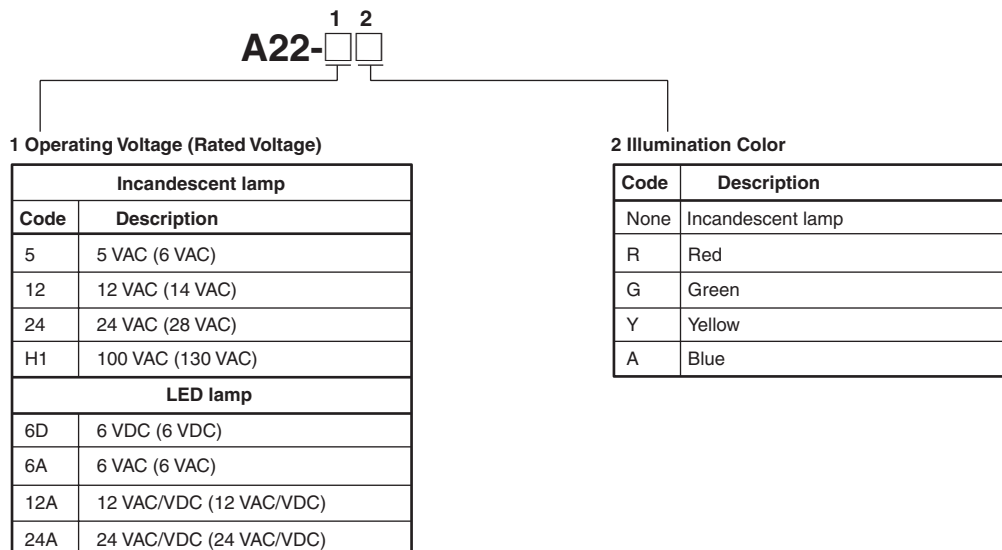
## Subassembled

The Selector, Lamp, or Switch can be ordered separately. Use them in combination for models that are not available as assembled Units. These can also be used as inventory for maintenance parts.

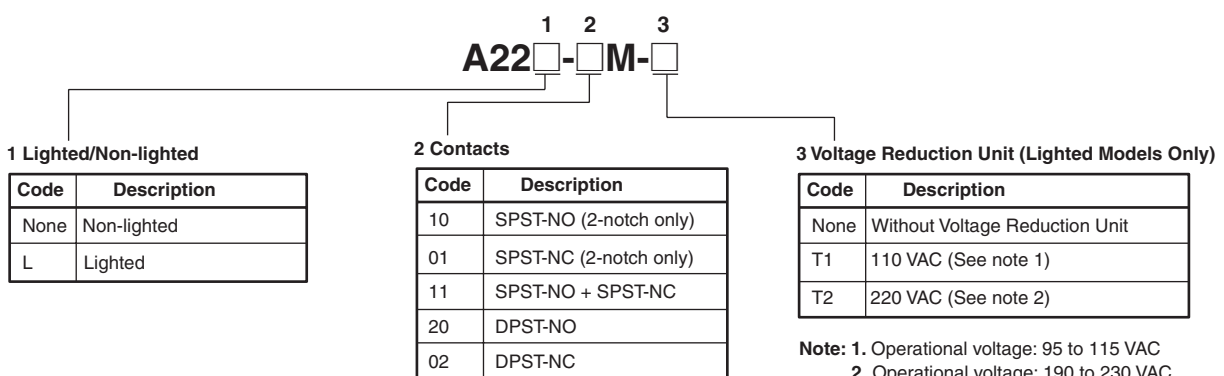
### 1. Selector



### 2. Lamp



### 3. Switch (General-purpose Load)

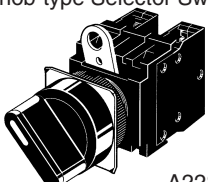






# Ordering Information

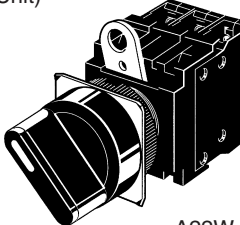



## ■ List of Models

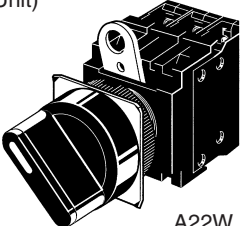

### Ordering as a Set

#### Non-lighted

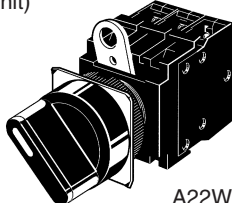




Appearance	Number of notches	Resetting method	Output	Model	Color of Selector
Knob-type Selector Switch  A22S	2 notches	Manual 	SPST-NO	A22S-2M-10	Black
			SPST-NC	A22S-2M-01	
			SPST-NO + SPST-NC	A22S-2M-11	
			DPST-NO	A22S-2M-20	
			DPST-NC	A22S-2M-02	
		Automatic 	SPST-NO	A22S-2A-10	
			SPST-NC	A22S-2A-01	
			SPST-NO + SPST-NC	A22S-2A-11	
	3 notches	Manual 	SPST-NO + SPST-NC	A22S-3M-11	
			DPST-NO	A22S-3M-20	
			DPST-NC	A22S-3M-02	
		Automatic 	SPST-NO + SPST-NC	A22S-3A-11	
			DPST-NO	A22S-3A-20	
			DPST-NC	A22S-3A-02	

Lighted (Without Voltage Reduction Unit)

Appearance	Number of notches	Resetting method	Output	Operating voltage	Model	Illumination color
Knob-type Selector Switch LED lighting (without Voltage Reduction Unit)  A22W	2 notches	Manual 	SPST-NO	6 VDC	A22W-2M□-6D-10	Insert one of the following letters into the box □. R (red) Y (yellow) G (green) A (blue)
				6 VAC	A22W-2M□-6A-10	
				12 VAC/VDC	A22W-2M□-12A-10	
				24 VAC/VDC	A22W-2M□-24A-10	
			SPST-NC	6 VDC	A22W-2M□-6D-01	
				6 VAC	A22W-2M□-6A-01	
				12 VAC/VDC	A22W-2M□-12A-01	
				24 VAC/VDC	A22W-2M□-24A-01	
			SPST-NO + SPST-NC	6 VDC	A22W-2M□-6D-11	
				6 VAC	A22W-2M□-6A-11	
				12 VAC/VDC	A22W-2M□-12A-11	
				24 VAC/VDC	A22W-2M□-24A-11	
	DPST-NO	6 VDC	A22W-2M□-6D-20			
		6 VAC	A22W-2M□-6A-20			
		12 VAC/VDC	A22W-2M□-12A-20			
		24 VAC/VDC	A22W-2M□-24A-20			
	DPST-NC	6 VDC	A22W-2M□-6D-02			
		6 VAC	A22W-2M□-6A-02			
		12 VAC/VDC	A22W-2M□-12A-02			
		24 VAC/VDC	A22W-2M□-24A-02			
	Automatic 	2 notches	Automatic	SPST-NO	6 VDC	A22W-2A□-6D-10
					6 VAC	A22W-2A□-6A-10
					12 VAC/VDC	A22W-2A□-12A-10
					24 VAC/VDC	A22W-2A□-24A-10
SPST-NC				6 VDC	A22W-2A□-6D-01	
				6 VAC	A22W-2A□-6A-01	
				12 VAC/VDC	A22W-2A□-12A-01	
				24 VAC/VDC	A22W-2A□-24A-01	
SPST-NO + SPST-NC				6 VDC	A22W-2A□-6D-11	
				6 VAC	A22W-2A□-6A-11	
				12 VAC/VDC	A22W-2A□-12A-11	
				24 VAC/VDC	A22W-2A□-24A-11	
DPST-NO	6 VDC	A22W-2A□-6D-20				
	6 VAC	A22W-2A□-6A-20				
	12 VAC/VDC	A22W-2A□-12A-20				
	24 VAC/VDC	A22W-2A□-24A-20				
DPST-NC	6 VDC	A22W-2A□-6D-02				
	6 VAC	A22W-2A□-6A-02				
	12 VAC/VDC	A22W-2A□-12A-02				
	24 VAC/VDC	A22W-2A□-24A-02				
3 notches	Manual 	Manual	SPST-NO + SPST-NC	6 VDC	A22W-3M□-6D-11	
				6 VAC	A22W-3M□-6A-11	
				12 VAC/VDC	A22W-3M□-12A-11	
				24 VAC/VDC	A22W-3M□-24A-11	
			DPST-NO	6 VDC	A22W-3M□-6D-20	
				6 VAC	A22W-3M□-6A-20	
				12 VAC/VDC	A22W-3M□-12A-20	
				24 VAC/VDC	A22W-3M□-24A-20	
			DPST-NC	6 VDC	A22W-3M□-6D-02	
				6 VAC	A22W-3M□-6A-02	
				12 VAC/VDC	A22W-3M□-12A-02	
				24 VAC/VDC	A22W-3M□-24A-02	

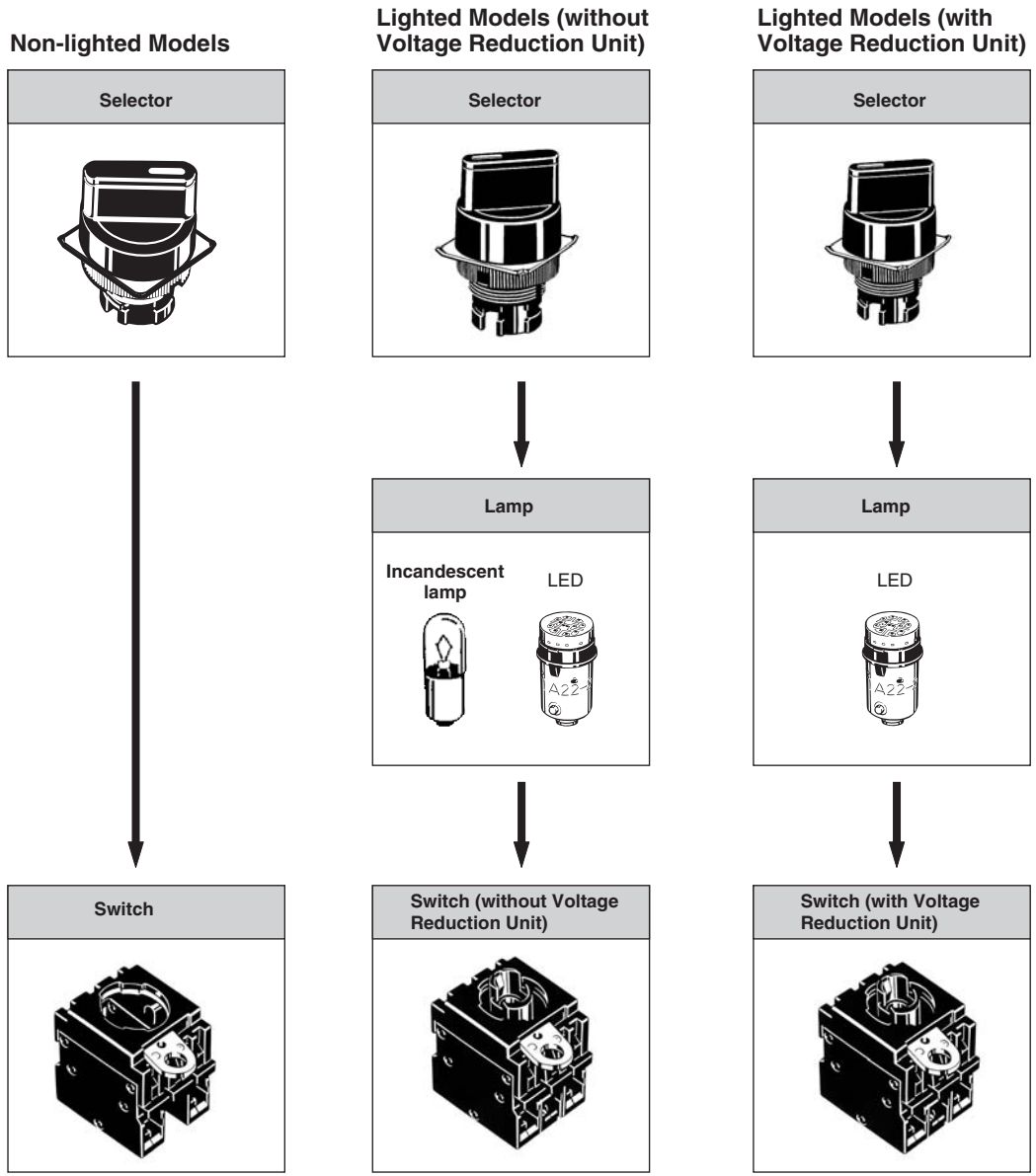
Appearance	Number of notches	Resetting method	Output	Operating voltage	Model	Illumination color
Knob-type Selector Switch LED lighting (without Voltage Reduction Unit)  A22W	3 notches	Automatic 	SPST-NO + SPST-NC	6 VDC	A22W-3A□-6D-11	Insert one of the following letters into the box □. R (red) Y (yellow) G (green) A (blue)
				6 VAC	A22W-3A□-6A-11	
				12 VAC/VDC	A22W-3A□-12A-11	
				24 VAC/VDC	A22W-3A□-24A-11	
			DPST-NO	6 VDC	A22W-3A□-6D-20	
				6 VAC	A22W-3A□-6A-20	
				12 VAC/VDC	A22W-3A□-12A-20	
				24 VAC/VDC	A22W-3A□-24A-20	
			DPST-NC	6 VDC	A22W-3A□-6D-02	
				6 VAC	A22W-3A□-6A-02	
				12 VAC/VDC	A22W-3A□-12A-02	
				24 VAC/VDC	A22W-3A□-24A-02	

**Lighted (With Voltage Reduction Unit)**

Appearance	Number of notches	Resetting method	Output	Operating voltage	Model	Selector symbol (color)		
Knob-type Selector Switch LED voltage-reduction lighting (with Voltage Reduction Unit)  A22W	2 notches	Manual 	SPST-NO	110 VAC	A22W-2M□-T1-10	Insert one of the following letters into the box □. R (red) Y (yellow) G (green) A (blue)		
				220 VAC	A22W-2M□-T2-10			
			SPST-NC	110 VAC	A22W-2M□-T1-01			
				220 VAC	A22W-2M□-T2-01			
			SPST-NO + SPST-NC	110 VAC	A22W-2M□-T1-11			
				220 VAC	A22W-2M□-T2-11			
			DPST-NO	110 VAC	A22W-2M□-T1-20			
				220 VAC	A22W-2M□-T2-20			
			DPST-NC	110 VAC	A22W-2M□-T1-02			
				220 VAC	A22W-2M□-T2-02			
			3 notches	Automatic 	SPST-NO		110 VAC	A22W-2A□-T1-10
							220 VAC	A22W-2A□-T2-10
	SPST-NC	110 VAC			A22W-2A□-T1-01			
		220 VAC			A22W-2A□-T2-01			
	SPST-NO + SPST-NC	110 VAC			A22W-2A□-T1-11			
		220 VAC			A22W-2A□-T2-11			
	DPST-NO	110 VAC			A22W-2A□-T1-20			
		220 VAC			A22W-2A□-T2-20			
	DPST-NC	110 VAC			A22W-2A□-T1-02			
		220 VAC			A22W-2A□-T2-02			
	3 notches	Manual 			SPST-NO + SPST-NC	110 VAC	A22W-3M□-T1-11	
						220 VAC	A22W-3M□-T2-11	
			DPST-NO	110 VAC	A22W-3M□-T1-20			
				220 VAC	A22W-3M□-T2-20			
DPST-NC			110 VAC	A22W-3M□-T1-02				
			220 VAC	A22W-3M□-T2-02				
3 notches			Automatic 	SPST-NO + SPST-NC	110 VAC	A22W-3A□-T1-11		
					220 VAC	A22W-3A□-T2-11		
	DPST-NO	110 VAC		A22W-3A□-T1-20				
		220 VAC		A22W-3A□-T2-20				
DPST-NC	110 VAC	A22W-3A□-T1-02						
	220 VAC	A22W-3A□-T2-02						








**Note:** When ordering, specify the symbol that indicates color of the Selector in the □ of the model number.








**Ordering Individually**










**Selectors**

**Non-lighted (Color: Only Black is Available)**

Notches	Reset method	Standard lever IP65 (oil-resistant)
		
2 notches	Manual 	A22S-2M
	Automatic 	A22S-2A
3 notches	Manual 	A22S-3M
	Automatic 	A22S-3A
	Left automatic 	A22S-3AM
	Right automatic 	A22S-3MA

Notches	Reset method	Standard lever IP65 (oil-resistant)
		
2 notches	Manual 	A22S-C2M
	Automatic 	A22S-C2A
3 notches	Manual 	A22S-C3M
	Automatic 	A22S-C3A
	Left automatic 	A22S-C3AM
	Right automatic 	A22S-C3MA


**Lighted**

Notches	Reset method	Selector color	Standard lever IP65 
2 notches	Manual 	Red	A22W-2MR
		Green	A22W-2MG
		Yellow	A22W-2MY
		Blue	A22W-2MA
	Automatic 	Red	A22W-2AR
		Green	A22W-2AG
		Yellow	A22W-2AY
		Blue	A22W-2AA
3 notches	Manual 	Red	A22W-3MR
		Green	A22W-3MG
		Yellow	A22W-3MY
		Blue	A22W-3MA
	Automatic 	Red	A22W-3AR
		Green	A22W-3AG
		Yellow	A22W-3AY
		Blue	A22W-3AA
	Left automatic 	Red	A22W-3AMR
		Green	A22W-3AMG
		Yellow	A22W-3AMY
		Blue	A22W-3AMA
	Right automatic 	Red	A22W-3MAR
		Green	A22W-3MAG
		Yellow	A22W-3MAY
		Blue	A22W-3MAA

**Note:** Either incandescent lamps or LED lamps can be used with the above models.


## Lamps

### LED Lamp

Appearance	Operating voltage		6 V	12 V	24 V	24 V Super-bright
	AC/DC	LED light	Model			
	DC	Red	A22-6DR	---	---	---
		Green	A22-6DG	---	---	---
		Yellow (See note 2.)	A22-6DY	---	---	---
		Blue	A22-6DA	---	---	---
	AC	Red	A22-6AR	---	---	---
		Green	A22-6AG	---	---	---
		Yellow (See note 2.)	A22-6AY	---	---	---
		Blue	A22-6AA	---	---	---
	AC and DC	Red	---	A22-12AR	A22-24AR	A22-24ASR
		Green	---	A22-12AG	A22-24AG	A22-24ASG
		Yellow (See note 2.)	---	A22-12AY	A22-24AY	A22-24ASY
		Blue	---	A22-12AA	A22-24AA	A22-24ASA

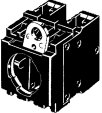
**Note:** 1. For voltage-reduction lighting, use the A22-24A□.  
 2. Used when the Selector color is yellow or white.

### Incandescent Lamp


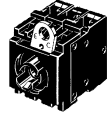
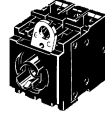
Operating voltage	5 VAC/VDC	12 VAC/VDC	24 VAC/VDC	100 VAC/VDC
	A22-5	A22-12	A22-24	A22-H1

## Switches (General-purpose Load)

### Non-lighted

Switch operation	Contacts	Model
		
Automatic	SPST-NO	A22-10M
	SPST-NC	A22-01M
	SPST-NO + SPST-NC	A22-11M
	DPST-NO	A22-20M
	DPST-NC	A22-02M

### Lighted

Switch operation	Contacts	Voltage-reduction circuit		
		Without Voltage Reduction Unit	With Voltage Reduction Unit	
			110 VAC	220 VAC
				
Automatic	SPST-NO	A22L-10M	A22L-10M-T1	A22L-10M-T2
	SPST-NC	A22L-01M	A22L-01M-T1	A22L-01M-T2
	SPST-NO + SPST-NC	A22L-11M	A22L-11M-T1	A22L-11M-T2
	DPST-NO	A22L-20M	A22L-20M-T1	A22L-20M-T2
	DPST-NC	A22L-02M	A22L-02M-T1	A22L-02M-T2

**Note:** For voltage-reduction lighting, use the A22-24A□.



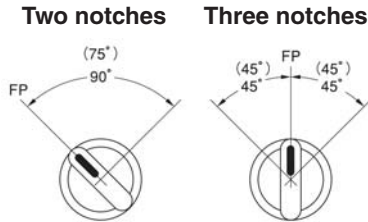
## ■ Accessories (Order Separately)

The A22S/W uses the same accessories as the A22. Refer to the relevant information in the section for the A22.

## Specifications

With the exception of the following items, the specifications are the same as for the A22. Refer to the relevant information in the *Specifications* section for the A22.

### ■ Operation Angle



**Note:** 1. The angle used for automatic reset is shown in parentheses.  
2. FP: Free Position

### ■ Contacts

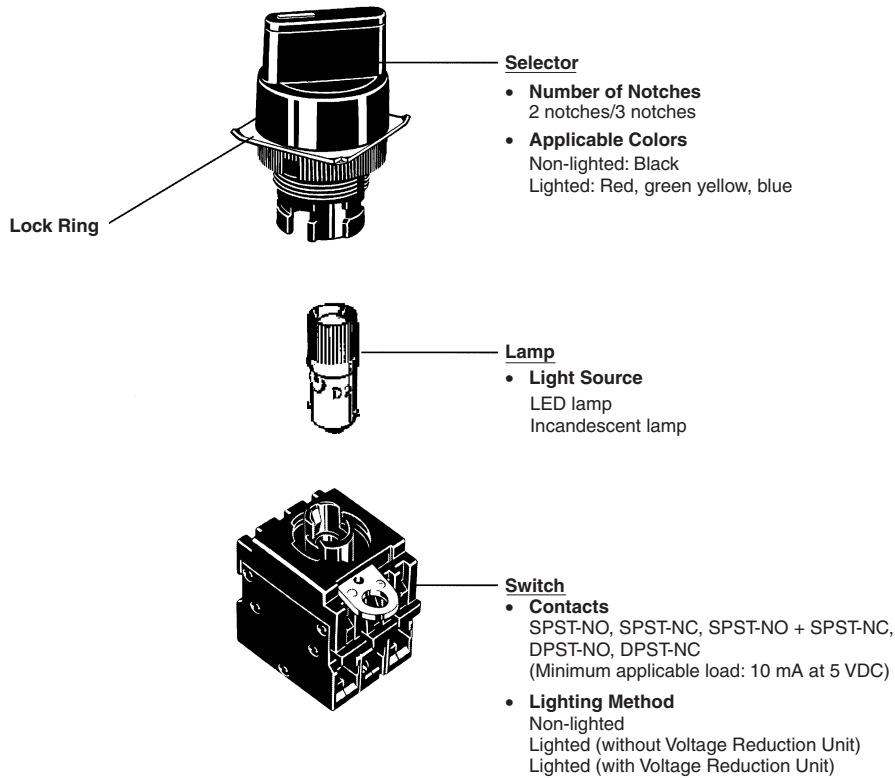
#### 2-notch Type

Knob position	SPST-NO	SPST-NC	SPST-NO + SPST-NC	DPST-NO	DPST-NC

#### 3-notch Type

Knob position	SPST-NO + SPST-NC	DPST-NO	DPST-NC

# Nomenclature

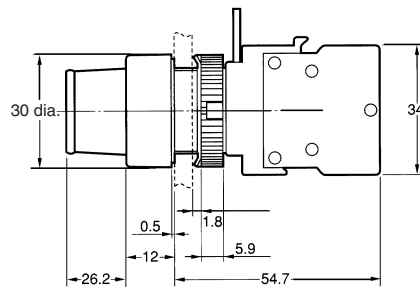
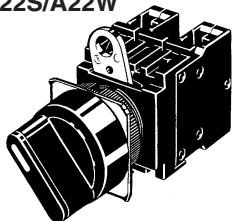


# Dimensions

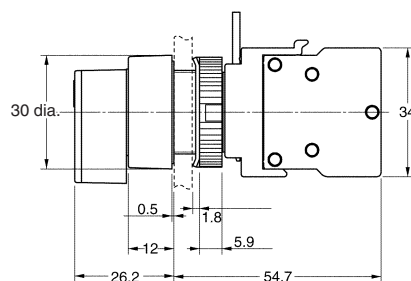
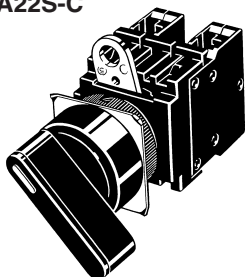
Note: All units are in millimeters unless otherwise indicated.

## ■ Knob-type Selector Switch (Lighted/Non-lighted)

A22S/A22W



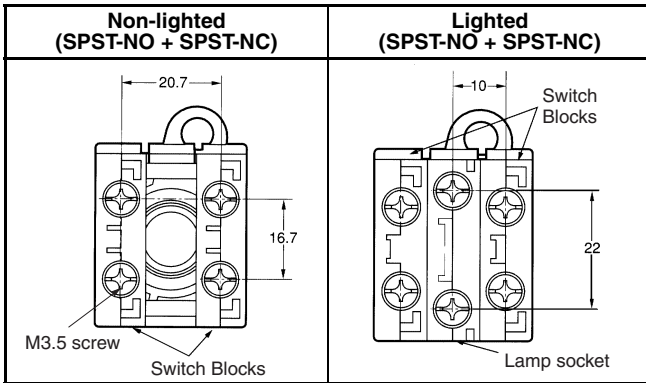
A22S-C



## ■ Accessories (Common to A22, A22S/W, A22K, M22, and A22E)

The A22S/W uses the same accessories as the A22. Refer to the relevant information in the corresponding section for the A22.

## ■ Terminal Arrangement (Bottom View)

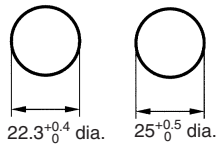


## ■ Terminal Connection

Type	Connection diagram
Non-lighted	<p><b>Bottom view</b></p>
Lighted without Voltage Reduction Unit	<p><b>Bottom view</b></p>
Lighted with Voltage Reduction Unit	<p><b>Bottom view</b></p>

**Note:** The above terminal connection diagrams are examples for SPST-NO + SPST-NC.

## ■ Panel Cutouts (Top View)



- Note:**
1. When applying coating such as paint to the panel, the dimensions should be those after the application of coating. Lock Ring is provided as a standard item.
  2. Recommended panel thickness: 1 to 5 mm.
  3. Use an A22Z-R25 Ring when mounting to a panel with 25-mm holes.

## Installation

The A22S/W uses the same installation method as the A22. Refer to the relevant information in the *Installation* section for the A22.

## Precautions

The precautions for the A22S/W are the same as those for the A22. Refer to the relevant information in the *Precautions* section for the A22 and the *Technical Information for Pushbutton Switches* (Cat. No. A143).

ALL DIMENSIONS SHOWN ARE IN MILLIMETERS.

To convert millimeters into inches, multiply by 0.03937. To convert grams into ounces, multiply by 0.03527.