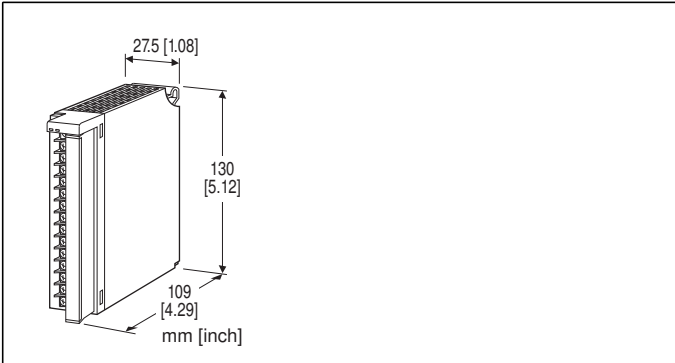


## Remote I/O R3 Series

### DC VOLTAGE INPUT MODULE

(8 points, isolated, wide span voltage)



### MODEL: R3-SV8B[1][2]

#### ORDERING INFORMATION

- Code number: R3-SV8B[1][2]
- Specify a code from below for each of [1] and [2].  
(e.g. R3-SV8BW/Q)
- Specify the specification for option code /Q  
(e.g. /C01/SET)

#### NO. OF CHANNELS

8B: 8 points, wide span voltage

#### [1] COMMUNICATION MODE

S: Single  
W: Dual

#### [2] OPTIONS

blank: none  
/Q: With options (specify the specification)

#### SPECIFICATIONS OF OPTION: Q (multiple selections)

COATING (For the detail, refer to our web site.)  
/C01: Silicone coating  
/C02: Polyurethane coating  
/C03: Rubber coating  
EX-FACTORY SETTING  
/SET: Preset according to the Ordering Information Sheet  
(No. ESU-8414)

#### CAUTION

■UNUSED INPUT CHANNELS  
Set the unused channels to open. Otherwise, set them as "Unused" with PC Configurator software: R3CON.

#### GENERAL SPECIFICATIONS

##### Connection

**Internal bus:** Via the Installation Base (model: R3-BSx)  
**Input:** M3 separable screw terminal (torque 0.5 N·m)  
**Internal power:** Via the Installation Base (model: R3-BSx)

**Screw terminal:** Nickel-plated steel

**Isolation:** Input 1 to input 2 to input 3 to input 4 to input 5 to input 6 to input 7 to input 8 to internal bus or internal power  
**Input range:** Selectable with the side DIP SW (per 4 channels)

**Conversion rate:** Selectable with the side DIP SW

**RUN indicator:** Bi-color (red/green) LED;  
Red when the bus A operates normally;  
Green when the bus B operates normally;  
Amber when both buses operate normally.

**ERR indicator:** Bi-color (red/green) LED;  
Red with input circuit abnormality (AD converter response failure);  
Green in normal operating conditions.

Green in normal operating conditions.

#### INPUT SPECIFICATIONS

■Input: -30 - +30 V, -15 - +15 V, 0 - 30 V,  
0 - 15 V DC  
Input resistance: 1 MΩ min.

#### INSTALLATION

**Operating temperature:** -10 to +55°C (14 to 131°F)  
**Operating humidity:** 30 to 90 %RH (non-condensing)  
**Atmosphere:** No corrosive gas or heavy dust  
**Mounting:** Installation Base (model: R3-BSx)  
**Weight:** 250 g (0.55 lb)

#### PERFORMANCE

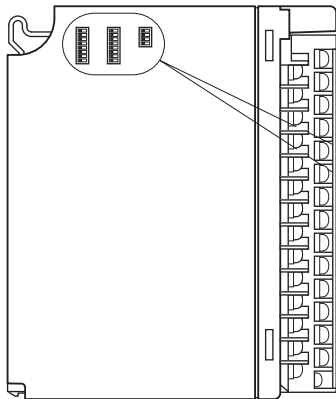
**Conversion accuracy:** Refer to the table at the end of this section.  
**Conversion rate:** 160 / 80 / 40 / 20 msec. selectable  
**Data range:** 0 - 10000 of the input range  
**Data allocation:** 8  
**Current consumption:** 100 mA  
**Temp. coefficient:** ±0.015 %/°C (±0.008 %/°F)  
**Insulation resistance:** ≥ 100 MΩ with 500 V DC  
**Dielectric strength:** 1000 V AC @ 1 minute (input 1 to input 2 to input 3 to input 4 to input 5 to input 6 to input 7 to input 8 to internal bus or internal power)  
2000 V AC @ 1 minute (power input to FG; isolated on the power supply module)

##### Conversion accuracy

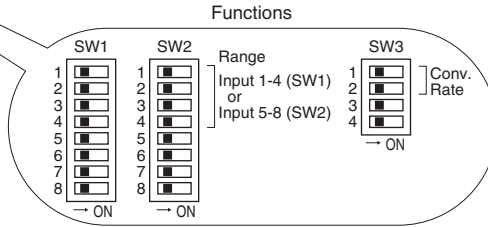
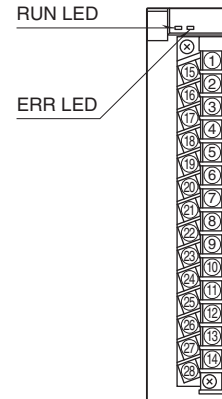
RANGE \ RATE	160 msec.	80 msec.	40 msec.	20 msec.
All ranges	±0.1%	±0.2%	±0.4%	±0.8%

## EXTERNAL VIEW

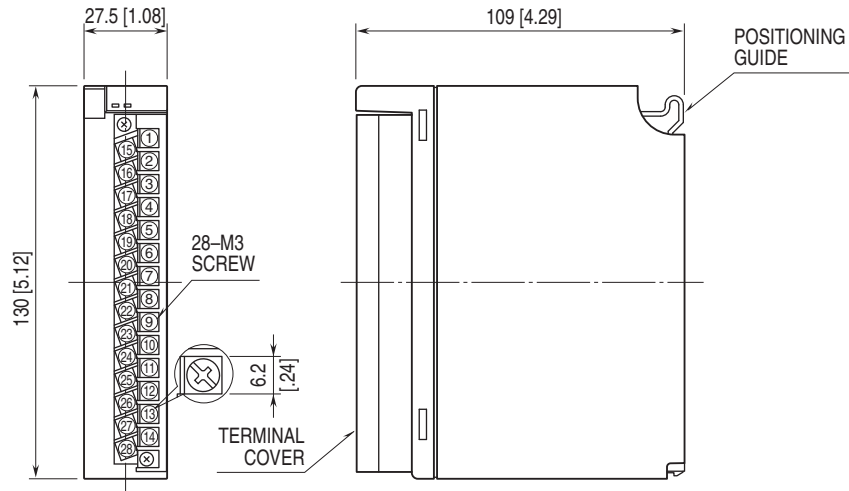
■ SIDE VIEW



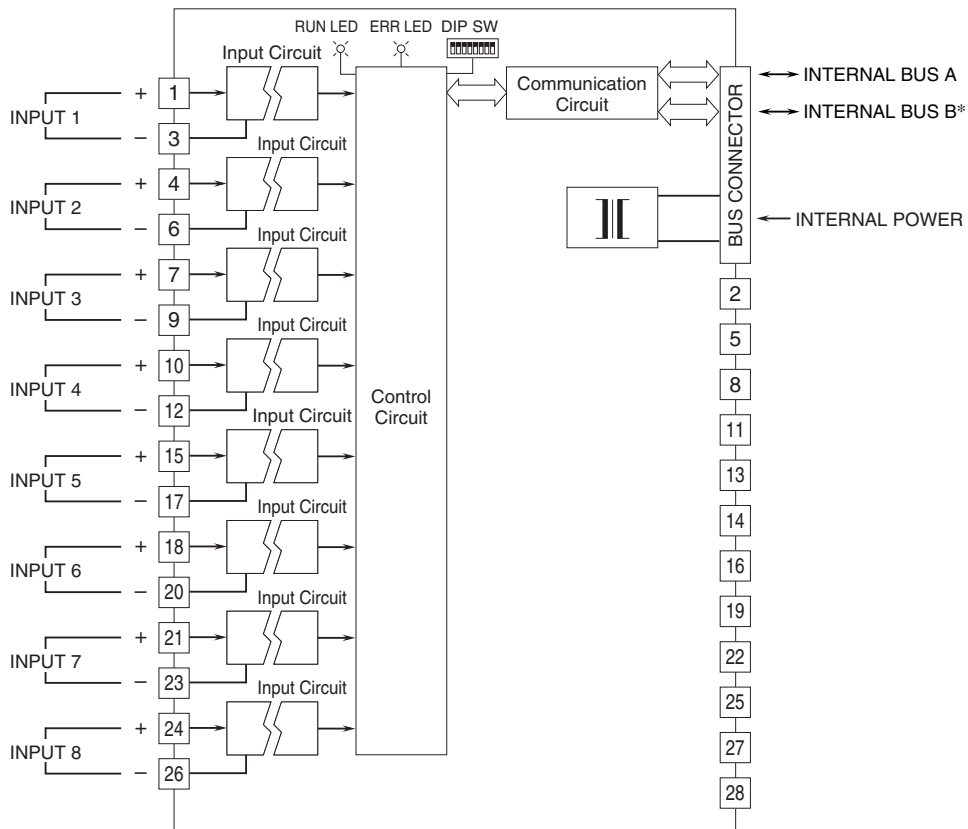
■ FRONT VIEW



## EXTERNAL DIMENSIONS & TERMINAL ASSIGNMENTS unit: mm [inch]



## SCHEMATIC CIRCUITRY & CONNECTION DIAGRAM



\*For dual redundant communication.  
DO NOT connect external wiring to the unused terminals.



Specifications are subject to change without notice.