



Converter which outputs DC signal proportional to the load cell signals

Features

- ★ Converts load cell signal to DC voltage or DC current
- ★ 3 port isolation between Input-Output-Power supply
- ★ DIN rail mount
- ★ Terminal block type

Ordering code

TW - 3S -

| Code | Input                                                                                                           |
|------|-----------------------------------------------------------------------------------------------------------------|
| 0    | 1 to 4mV/V                                                                                                      |
| Y    | Contact us for other than the above<br>Production range : 4 to 20mV/V<br>Load Cell : Strain Gauge Sensors(350Ω) |

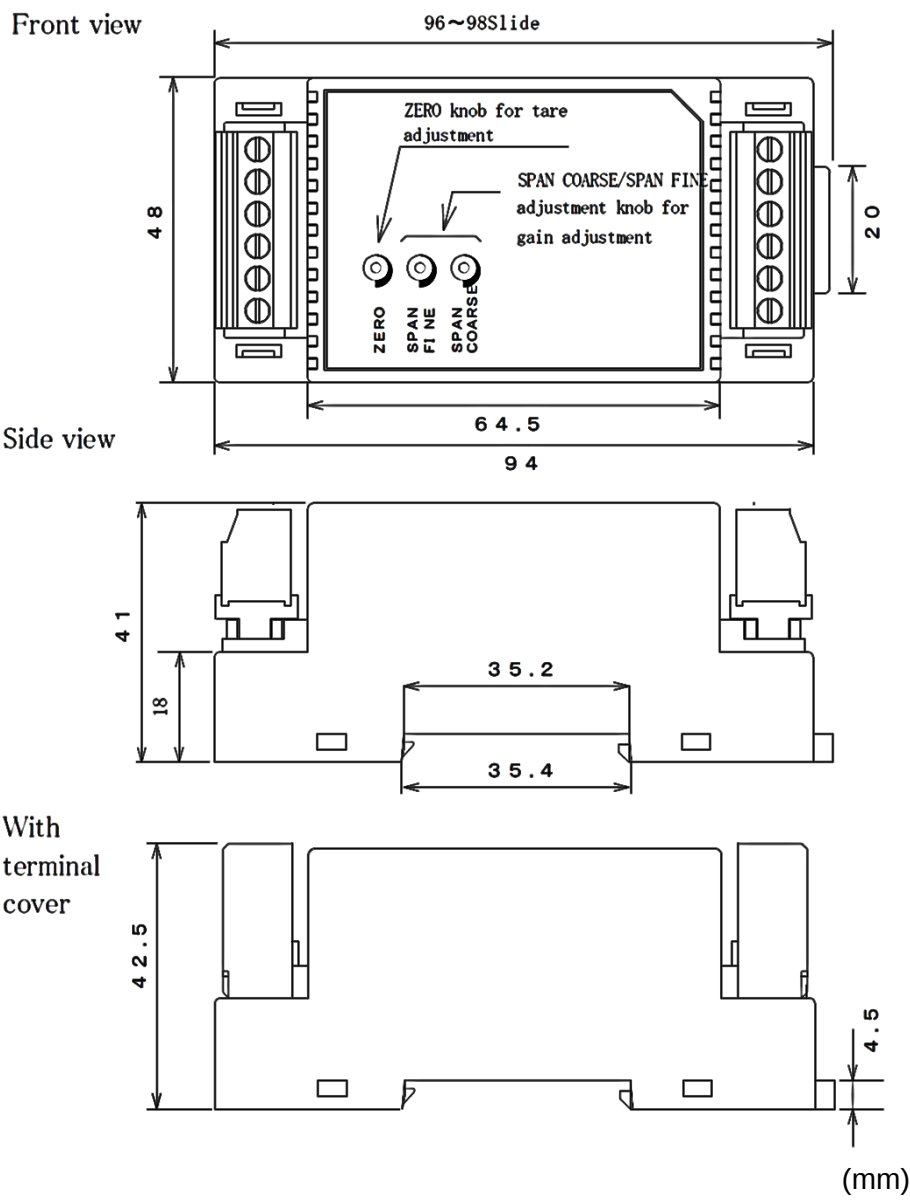
| Code | Output                                                                                                                         | Allowable Load Resistance |
|------|--------------------------------------------------------------------------------------------------------------------------------|---------------------------|
| 0    | 0 to 5VDC                                                                                                                      | 2kΩ or more               |
| 1    | 1 to 5VDC                                                                                                                      |                           |
| 2    | 0 to 10VDC                                                                                                                     | 4kΩ or more               |
| A    | 4 to 20mVDC                                                                                                                    |                           |
| B    | 0 to 20mVDC                                                                                                                    | 550Ω or less              |
| Y    | Contact us for other than the above<br>Current output : 20mA or less, Min. span : 1mA<br>Voltage output : ±10V, Min. span : 1V |                           |

| Code | Load Cell Applied Voltage | Allowable current | Tare Adjustment                 |
|------|---------------------------|-------------------|---------------------------------|
| 1    | 2.5V                      | 30mA              | ±0.25mV/V<br>(Input conversion) |
| 2    | 5V                        |                   |                                 |
| 3    | 10V                       |                   |                                 |

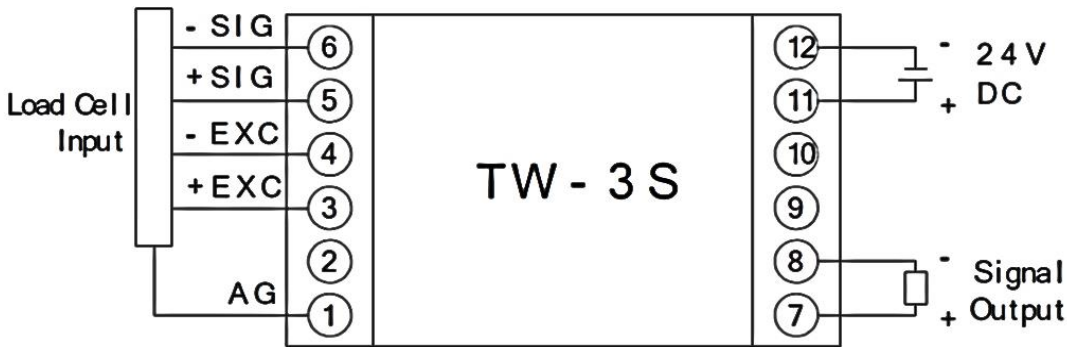
Specifications

|                             |                                                                                          |
|-----------------------------|------------------------------------------------------------------------------------------|
| Input signal                | Load Cell : Strain Gauge Sensors (350Ω)                                                  |
| Output signal               | DC current / voltage                                                                     |
| Accuracy                    | ±0.25% of span (at 25°C ±2°C)                                                            |
| Temperature coefficient     | ±0.03% of span per °C                                                                    |
| Response time               | 10ms (0 to 90%)                                                                          |
| Insulation resistance       | 100MΩ or more with 500Vdc megger<br>Between input, output, and power supply terminal     |
| Dielectric strength         | 1500Vac for 1 minute<br>Between input, output, power supply terminal<br>Leak current 2mA |
| Power supply voltage        | 24VDC ±10%                                                                               |
| Power consumption (current) | 120mA or less                                                                            |
| Operating temperature range | -5 to +50°C                                                                              |
| Operating relative humidity | 90% or less (Non-condensing)                                                             |
| Case color and material     | Black PBT                                                                                |
| Dimensions                  | 98(H) X 48(W) X 41(D)mm                                                                  |
| Weight                      | Approx. 120g                                                                             |
| Accessory                   | Terminal cover, Removable type 6p connector                                              |

Demensions

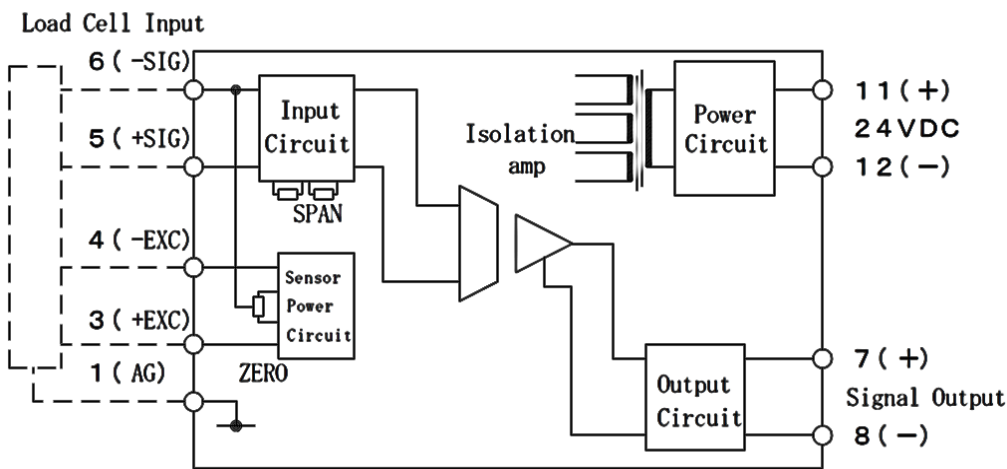


Terminal connections



| No | Symbol       | Description   |
|----|--------------|---------------|
| 1  | AG           | Analog ground |
| 2  | NC           | No connection |
| 3  | BRIDGE DRIVE | +             |
| 4  |              | -             |
| 5  | INPUT        | +             |
| 6  |              | -             |
| 7  | OUTPUT       | +             |
| 8  |              | -             |
| 9  | NC           | No connection |
| 10 | NC           | No connection |
| 11 | POWER        | +             |
| 12 |              | -             |

Block diagram



\* Specification is subject to change without notice