

# AMPLI-Block<sup>+</sup>

## UNIVERSAL AMPLIFIER

**MEROBEL**  
Torque & Tension

- > Wide range of Amplification
- > Direct & filtered outputs
- > Suitable for foil & semi conductor gauges load cells

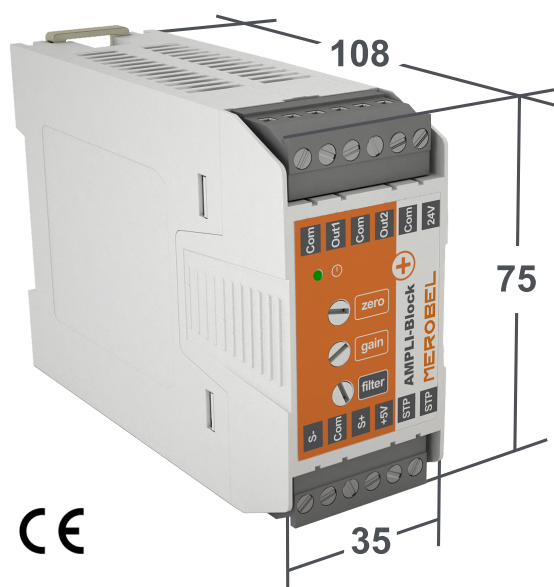
AMPLI-Block+, the universal **precision signal amplifier** is designed for simple set up for the use with one or two load cells, either half or full bridge.



## AMPLI-Block<sup>+</sup>

- > The universal solution, suitable for one or two load cells.
- > Simple set up with zero & gain adjustment (gain x20 to x10000)
- > Two levels of gain range to cover any type of transducers
- > Direct output signal for fast response time application (motor control)
- > Filtered output signal for noise cancelation

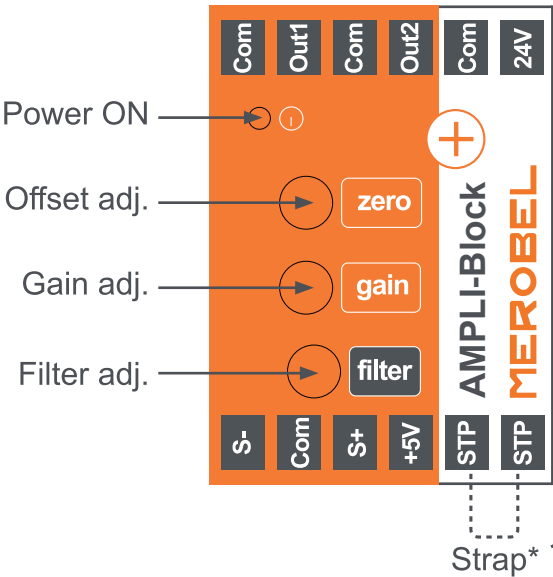
## DIMENSIONS



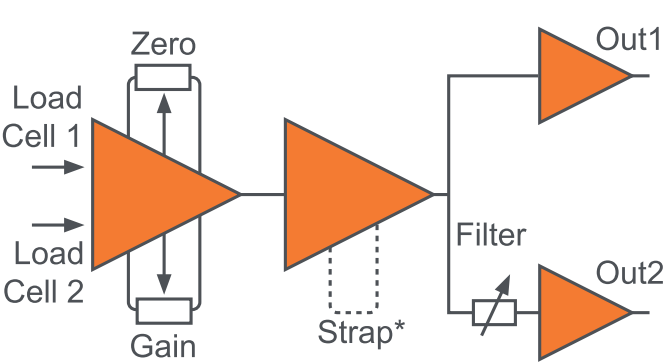
## TECHNICAL FEATURES

| Part number                 | #        | ME135691-00  |
|-----------------------------|----------|--------------|
| Power supply                | [ V DC ] | 24 (20 → 35) |
| Max power consumption       | [ VA ]   | 3            |
| Strain gauges bridge supply | [ V DC ] | 5            |
| Output voltage              | [ V DC ] | 0 → 10       |
| Current (Output voltage)    | [ mA ]   | < 5          |
| Zero compensation           |          | ± 50% of FS  |
| Ambient temperature         | [ °C ]   | 0 → +40      |
| Weight                      | g        | 120          |

SETTINGS



PRINCIPLE



**No strap** → High gain for typical 2mV/V signal and lower  
**With strap** → Low gain for semi conductor gauges typically 50mV/V and higher

CALIBRATION PROCEDURE



No load : set 0v with zero adjustment



Simulate max load by hanging a weight on a string following the product path.  
Set 10v with gain pot adjustment.



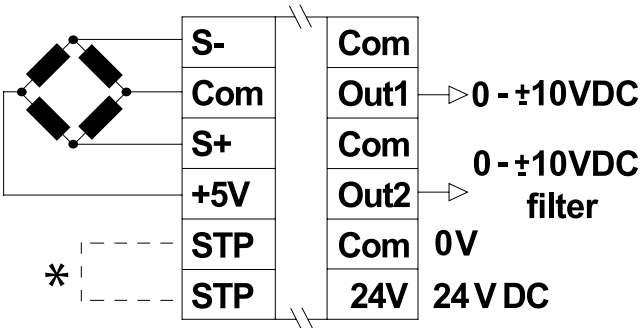
Remove load (totally free) and reset 0v with zero pot adjustment.



Calibration is done.  
Check that voltage follows the weight variation.  
It is possible that you need one extra setting to ensure accurate measurement.

CONNECTIONS

Full bridge gauges



|      |                                          |
|------|------------------------------------------|
| Out1 | Direct output signal Ua (0 → ±10V)       |
| Out2 | Output signal filtered Ub (0 → ±10V)     |
| Com  | 0 V / Merobel equipotential supply point |
| 24V  | Supply : 24 V DC                         |
| S-   | Signal sensor -                          |
| S+   | Signal sensor +                          |
| +5V  | Supply sensor(s)                         |
| STP  | *Strap for gain selection                |