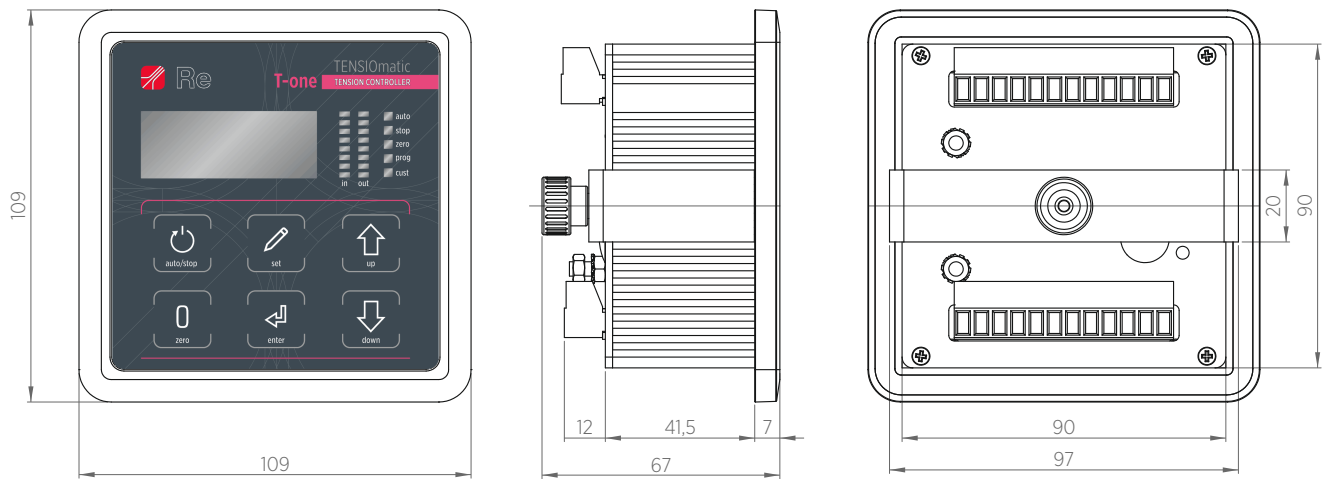# T-ONE

TENSION CONTROLLER

- ✔ Control of closed-loop and combined systems
- ✔ Regulation both in torque and speed
- ✔ Tension control with load cells or dancer roller
- ✔ Compact design
- ✔ Ease of use and calibration

T-one is a tension controller specifically designed for the web tension control in closed-loop and combined systems; extreme ease of use and compactness are the main features of the tension controller. The core of T-one is the P.I.D. algorithm, which has been improved in speed and accuracy.
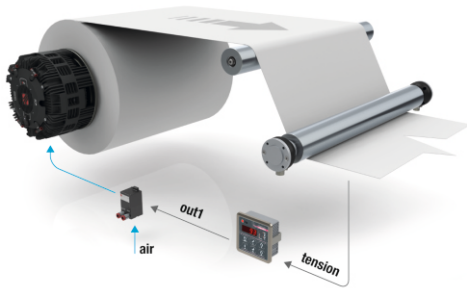
The interface with 6 buttons and 4 digit is easy to use and allows to smoothly control and set up the desired parameters to obtain the best results.

T-one can be used both with load cells and dancing roller and it can control the web tension in unwinding, rewinding and processing. The P.I.D. algorithm calculates the measured error and modifies the brake or clutch control output maintaining the web tension stabilized at the set point value.
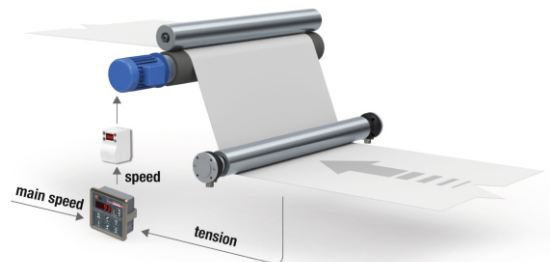
TECHNICAL DRAWING

APPLICATIONS

Regulation in torque with load cells
or dancer roller

Regulation in speed with
load cells

TECHNICAL DATA

Power supply	24 Vdc
Power	8 W max
Analog input 0÷20 mV / 4÷20 mA	1 max nr.2 load cells
Analog inputs 0÷10 V	1 dancer roller or remote setpoint or line speed
Digital inputs 24 V	2 remote controls
Analog outputs 0÷10 V / 4÷20 mA	1 PID torque control
Analog output 0÷10 V	1 tension proportional or dancing roller piston control
Digital relay output 24 Vdc / 24 Vac	2 for alarms
Weight	400 g
Working temperature	0÷50°C
IP protection class	IP 20 (case) IP 52 (frontal panel)
Dimensions	109 x 109 x 67 mm

*Data are subject to technical change without notice