







capable

MECHANICAL SPECIFICATIONS

- Mechanical rotation angle: 280° ± 10° - Electrical rotation angle: 245° ± 25° 0.2 to 3 Ncm. - Torque: (0.28 to 4.2 in-oz)

> 7.5 Ncm. (10.5 in-oz) - Stop torque:

up to 10K cycles - Mechanical life*:

N-6 R Miniature Control Potentiometer

FEATURES

- 10K cycles mechanical life version available
- Endless rotation upon request
- RoHS compliant materials ready
- Carbon resistive element
- Plastic substrate
- Over-moulding manufacturing technique
- SMD mounting
- RoHS reflow soldering capable
- Wiper positioned at 50%
- Both sides cross slot easy adjustment
- Accidental rotor movement protected
- Traceability insured through date code marking
- IP54 protection according to IEC 60529

ELECTRICAL SPECIFICATIONS

- Range of values*

"E" version: $1K\Omega \le Rn \le 500K\Omega$ (1.0 - 2.0 - 2.2 - 2.5 - 4.7 - 5.0)

Std version: $250 \Omega \le Rn \le 500 K \Omega (1.0 - 2.0 - 2.2 - 2.5 - 4.7 - 5.0)$

- Tolerance: $250 \Omega \le Rn \le 500 K \Omega_{----} \pm 30\%$

- Max. Voltage: 100 VDC

- Nominal Power 50°C (122°F) (see power rating curve): 0.1W

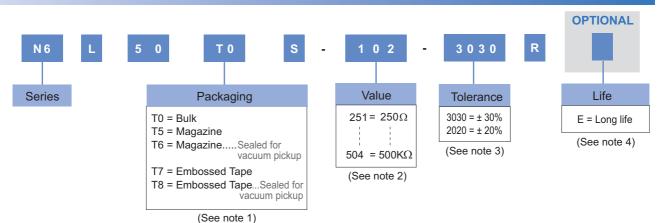
- Taper: linear

- End resistance: \leq 2% Rn (10 Ω min.)

Equivalent noise resistance: ≤ 5%

- Operating temperature**: -25°C + 70°C (-13°F + 158°F)

HOW TO ORDER





(1) - "T7", "T8" Embossed Tape 750 Units per Reel. Diameter: 330 mm, aprox. thickness: 30 mm.

- "T6" and "T8" are sealed for vacuum pickup (sticker at the bottom side)

(2) Value: Example: Code: Number of zeros First two digits of the value.

Standard is 30%. For 20% and below tolerances, please check availability.

(4) Life: • Standard = 100 cycles • Long = 10K cycles

* Version with sticker on TOP

side is available under request

Sticker

NOTE: The information contained here should be used for reference purposes only This project has been financially supported by the Spanish Technological Development Institute (CDTI).

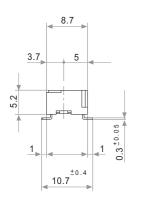
^{*} depending on application

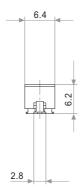
^{*} Others: check availability.

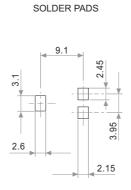
^{**} Up to 85°C depending on application.

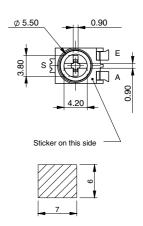
Special Version 100410-G

N-6 L 50 T0 S







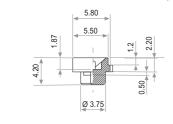


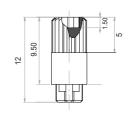
KNOB Ref.: 5680

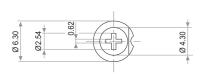
SHAFT Ref.: 6133

Rohs recommended reflow profile

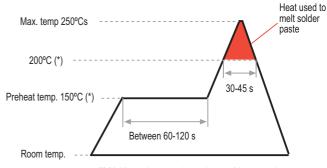
Please order both Knob and Shaft separately. They should be inserted after the reflow process. If you wish to use your own custom plastic shaft/knob/actuator please contact Piher for advice about compatible materials.









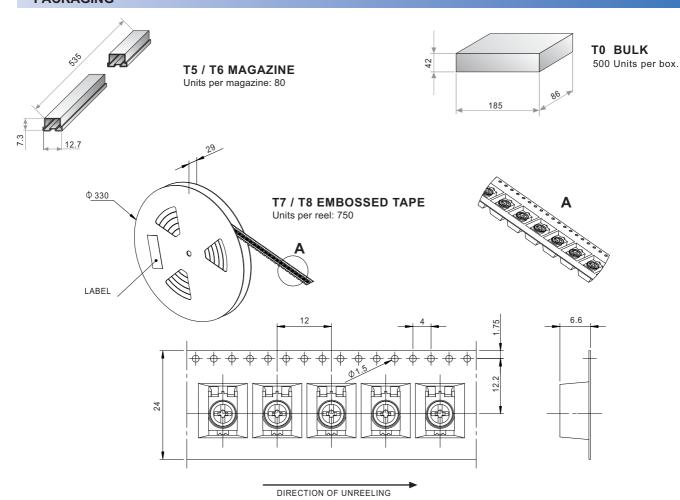


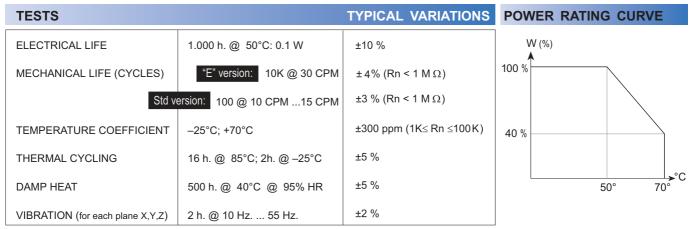
(*) Melting point temp. depends on solder properties

The recommended reflow profile is provided as a guideline. Optimal profile may differ due to oven type, assembly layout or other design or process variables.

Customers should verify actual device performance in their specific application and reflow process. Please contact Piher if you require additional support.

PACKAGING



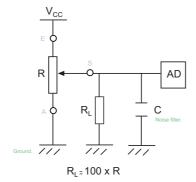


NOTE: Out of range values may not comply with these results.

RECOMMENDED CONNECTIONS

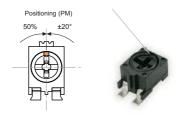
Piher potentiometer's recommended connection circuit for a position sensor or control application.

(voltage divider circuit electronic design).



POSITIONING

This mark in the rotor shows the wiper's position.



(example of 50% of the travel)

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