

Pro Audio Panel Potentiometer

P165 Series



Features:

- 17mm
- Resistance Range 1 kΩ to 1 MΩ
- Temperature Range -10 °C to +70 °C
- Rotational Cycles of 100,000 minimum
- Switch option
- RoHS compliant

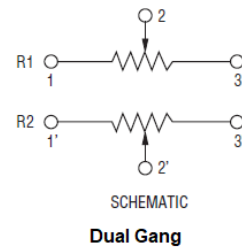


Description:

17 mm Dual Gang Potentiometer with MN taper. Options include metal shaft; metal bushing; knurled or plain shaft types.

Applications:

- Electric Guitars
- Amplifiers
- Mixers
- Drum Machines
- Synthesizers



Electrical Characteristics

$T_A = 25^\circ\text{C}$ unless otherwise noted

Resistance Range	1 kΩ to 1 MΩ
Standard Resistance Tolerance	500 Ω < R < 1 MΩ ± 20% R ≤ 500 Ω or R ≥ 1 MΩ ± 30%
Residual Resistance	Term. 1~2: Less than 20 Ω Term: 2~3: Less than 20 Ω
Resistance Taper	MN
Maximum Operating Voltage	150 Vac
Rated Power	0.1 W
Dielectric Strength	1 minute at 500 Vac
Rotational Noise	Less than 100 mV
Insulation Resistance	More than 100 MΩ at 500 Vdc

General Note

TT Electronics reserves the right to make changes in product specification without notice or liability. All information is subject to TT Electronics' own data and is considered accurate at time of going to print.

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Mechanical Characteristics

T_A = 25°C unless otherwise noted

Mechanical Travel	300 ° ±5 °
Rotational Torque	20 gf.cm~100 gf.cm
Rotational Stop Strength	7 kgf.cm minimum
Shaft Pull Strength	8 kgf minimum
Detent Torque	100~300 gf.cm
Nut Tightening Strength	8 kgf.cm minimum
Rotational Life	100,000 Cycles minimum

Environmental Characteristics

T_A = 25°C unless otherwise noted

Operating Temperature	-10 °C to +70 °C
IP Rating	IP 40
Soldering Condition	Wave Soldering 260 °C maximum for 1-3 seconds Hand Soldering 300 °C maximum for 3 seconds
RoHS	Please refer to TT Electronics website
REACH	Please refer to TT Electronics website

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Ordering Information

P165	M	2	00	Q	N	C	20	MN	103
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Part Family

Terminal Configuration

M - PC Pins, Rear Facing

K - Solder Lugs, Rear Facing

Gang Number

2 - 2 Gang

Detents/ Rotation

00 - No Position

Shaft Style

Q - Metal Knurled Type

P - Plain Type

Switch Option

N - No Switch

Full CCW Position

A/C/N (see note 1 page 4)

Shaft Length (mm) - L

20

Resistance Taper

MN

Resistance

See Resistance Table

Resistance Table	
Resistance (Ohms)	Code
10,000	103
25,000	253
50,000	503
100,000	104
250,000	254
300,000	304
500,000	504
1,000,000	105

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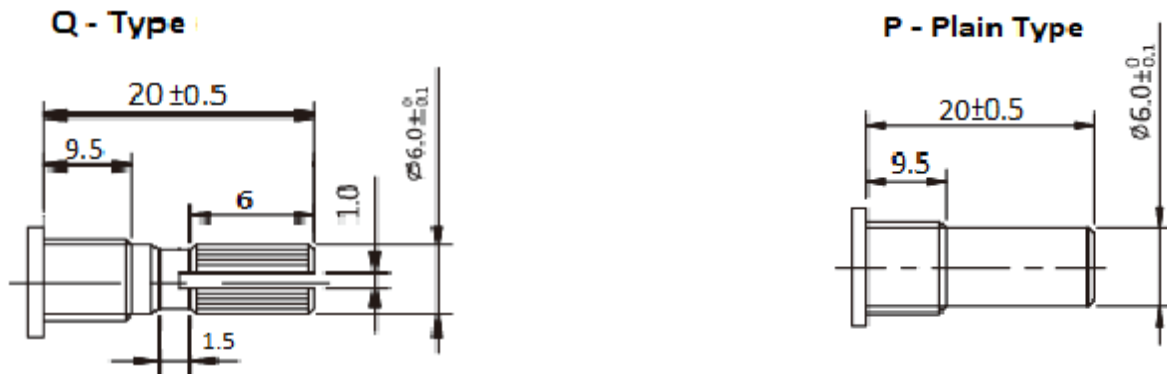
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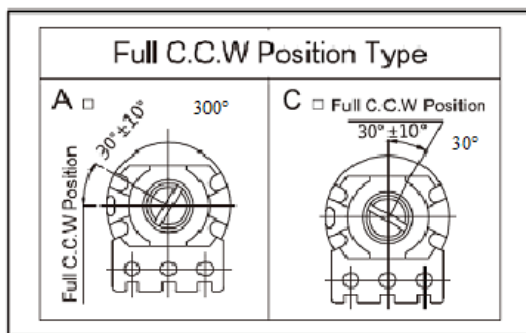
Outline Drawings

Shaft Style & Length

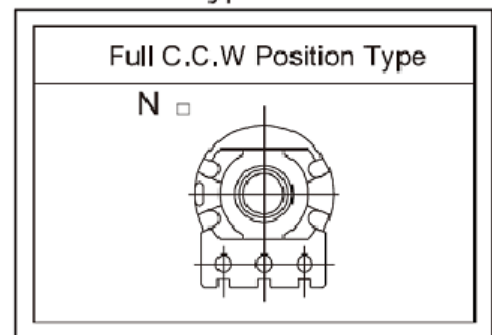


Note 1: Full CCW Position

Q-type shaft



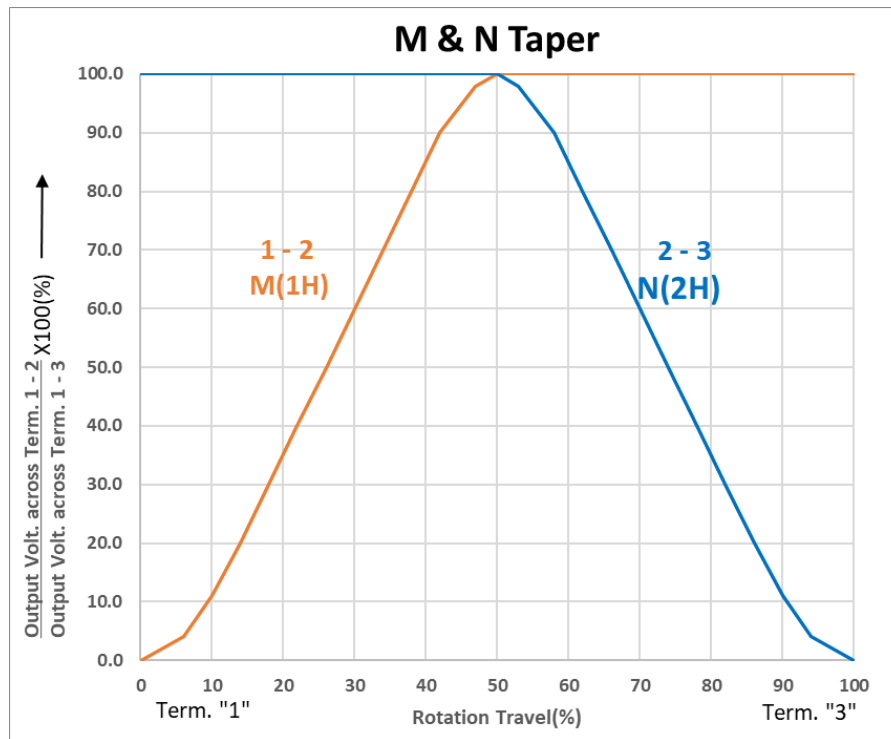
P-type shaft



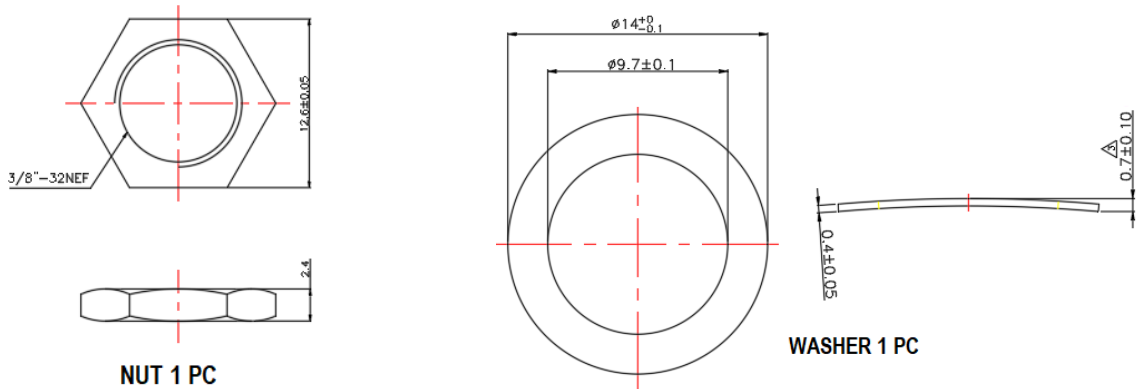
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Standard Tapers



Screw & Washer Dimensions



Packaging

Standard Packaging	Plastic Trays
Hardware	Two flat washers and mounting nut