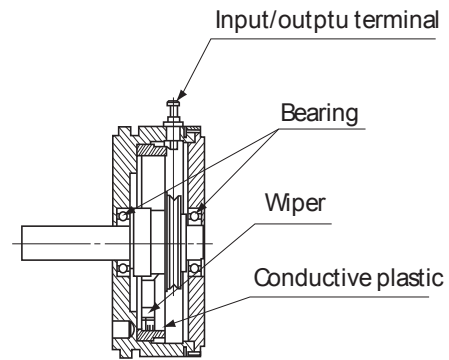


# CONDUCTIVE PLASTIC SINGLE TURN TYPE **JC**

**RoHS compliant**



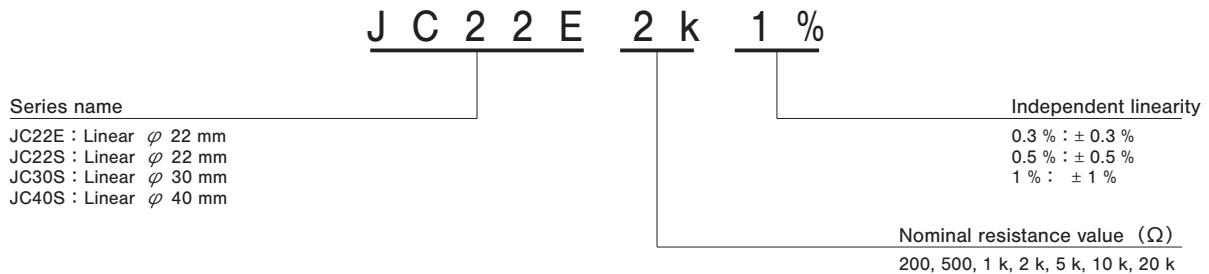
## Basic construction Conductive plastic single turn type



## FEATURES

- Compact
- Cost effective (JC22E) in house comparison
- Long life
- High following characteristics
- High resolution (Essentially infinite)
- RoHS compliant

## PART NUMBER DESIGNATION



## LIST OF PART NUMBERS

Size	Item	Nominal resistance value	Independent linearity	Part number	
$\phi$ 22 mm		1 k $\Omega$	$\pm 1$ %	JC22E 1 k 1 %	
		2 k $\Omega$		JC22E 2 k 1 %	
		5 k $\Omega$		JC22E 5 k 1 %	
		10 k $\Omega$		JC22E 10 k 1 %	
			200 $\Omega$	$\pm 0.5$ %	⊕ JC22S 200 0.5 %
			500 $\Omega$		⊕ JC22S 500 0.5 %
			1 k $\Omega$		JC22S 1 k 0.5 %
			2 k $\Omega$		JC22S 2 k 0.5 %
			5 k $\Omega$		JC22S 5 k 0.5 %
			10 k $\Omega$		JC22S 10 k 0.5 %

※ Verify the above part numbers when placing orders.

The products indicated by ⊕ mark are manufactured upon receipt of order basis.

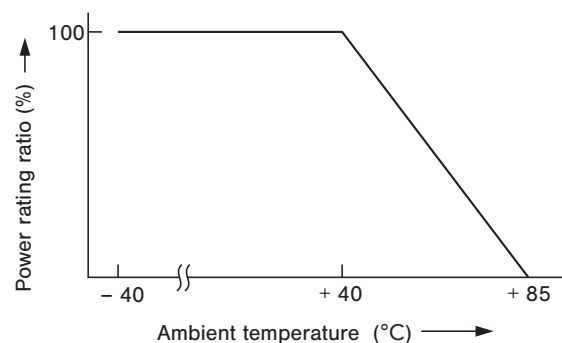
Size	Item	Nominal resistance value	Independent linearity	Part number
$\phi$ 30 mm		500 $\Omega$	$\pm 0.5$ %	JC30S 500 0.5 %
		1 k $\Omega$		JC30S 1 k 0.5 %
		2 k $\Omega$		JC30S 2 k 0.5 %
		5 k $\Omega$		JC30S 5 k 0.5 %
		10 k $\Omega$		JC30S 10 k 0.5 %
		20 k $\Omega$		JC30S 20 k 0.5 %
$\phi$ 40 mm		500 $\Omega$	$\pm 0.3$ %	JC40S 500 0.3 %
		1 k $\Omega$		JC40S 1 k 0.3 %
		2 k $\Omega$		JC40S 2 k 0.3 %
		5 k $\Omega$		JC40S 5 k 0.3 %
		10 k $\Omega$		JC40S 10 k 0.3 %
		20 k $\Omega$		JC40S 20 k 0.3 %

# JC POTENTIOMETERS

## STANDARD SPECIFICATIONS

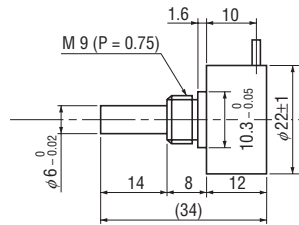
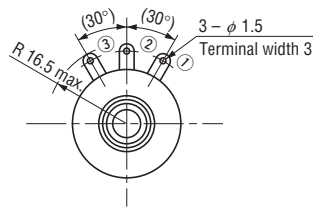
Item	Output		Single turn			
	Part number		JC22E	JC22S	JC30S	JC40S
Nominal resistance value			Refer to LIST OF PART NUMBERS			
Resistance tolerance	%		± 20	± 15		
Resolution			Essentially infinite			
Independent linearity	%		± 1	± 0.5		± 0.3
Effective electrical angle			320° ± 5°	340° ± 5°	343° ± 5°	345° ± 5°
Mechanical angle			360° continuous			
Power rating (at 40 °C)	W		0.5		0.7	1.5
Dielectric strength	Vrms		1000 1 min			
Insulation resistance	MΩ minimum		1000 (at DC500 V)			
Rotational torque	mN·m {gf·cm} maximum		4.9 {50}	0.98 {10}	1.18 {12}	1.47 {15}
Strength of tighten screw	N·m {kgf·cm} maximum		0.98 {10}	—		
Temp. coefficient of resistance	ppm/°C		± 400			
Operating temp. range	°C		-40 ~ 85			
Maximum rotational speed	min <sup>-1</sup>		100	300		
Rotational life (cycles)			10 million	20 million	30 million	
Output smoothness			0.1 % maximum			
Net weight	g		Approx. 15	Approx. 17	Approx. 24	Approx. 56
Protection grade			IP40			

## RATED POWER DERATING CURVE



## OUTLINE DIMENSIONS

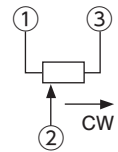
### JC22E



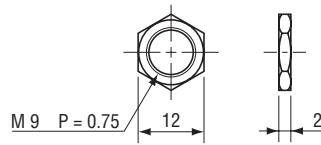
(Unit : mm)

JC22E, JC22S  
JC30S, JC40S

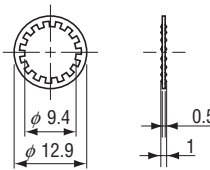
Wiring diagram



### (JC22E Accessories)

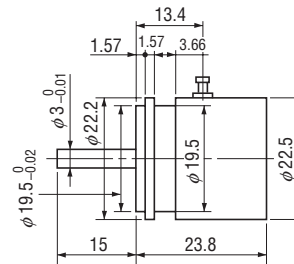
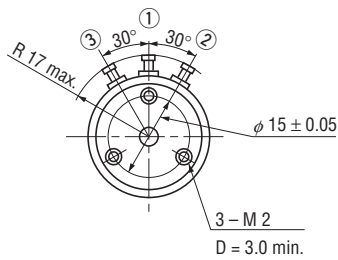


1. Nut

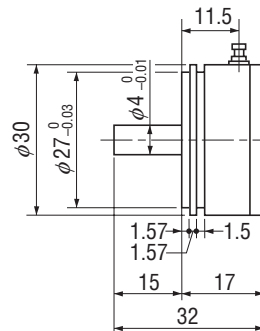
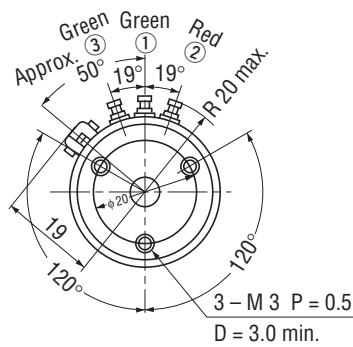


2. Washer

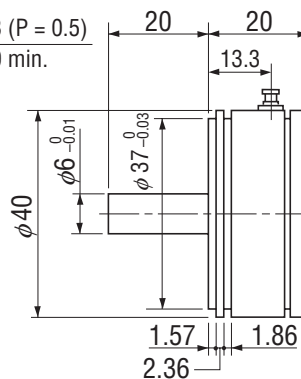
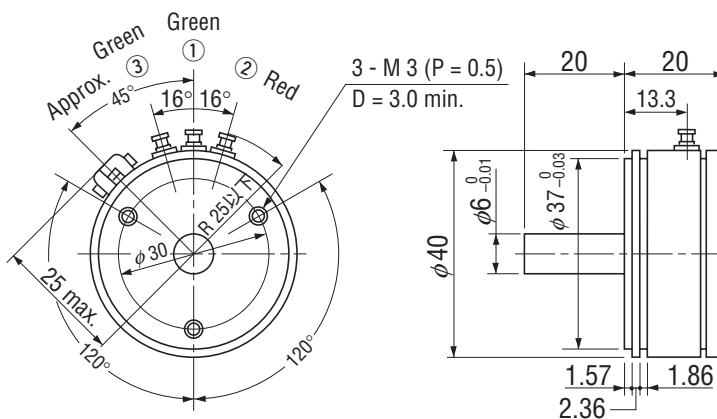
### JC22S



### JC30S



### JC40S



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## Nidec:

[JC40S 20K 0.3%](#) [JC40S 2K 0.3%](#) [JC40S 500 0.3%](#) [JC40S 5K 0.3%](#) [JC30S 20K 0.5%](#) [JC30S 2K 0.5%](#) [JC30S 500 0.5%](#) [JC30S 5K 0.5%](#) [JC40S 10K 0.3%](#) [JC40S 1K 0.3%](#) [JC22S 200 0.5%](#) [JC22S 2K 0.5%](#) [JC22S 500 0.5%](#) [JC22S 5K 0.5%](#) [JC30S 10K 0.5%](#) [JC30S 1K 0.5%](#) [JC22E 10K 1%](#) [JC22E 1K 1%](#) [JC22E 2K 1%](#) [JC22E 5K 1%](#) [JC22S 10K 0.5%](#) [JC22S 1K 0.5%](#)