



# Class II Ceramic Disc Capacitors (RoHS Compliant) CDR Series

## FEATURES

- Large capacitance in small sizes
- Non linear temperature coefficient of capacitance.



## CHARACTERISTICS

Item	Characteristics
Operating Temperature Range	-25°C ~ +85°C
Capacitance Tolerance (min.)	Within the tolerance at 1MHz, 1~3Vrms, 25°C
Working Voltage (WVDC)	50WV, 100WV, or 500WV
Insulation Resistance	10,000MΩ min. or 200MΩμF, whichever is less
Test Voltage	2.5 x WVDC
Life Test	At 2 x WVDC @85°C for 1000 hours @ 85°C, capacitors shall meet the following: the capacitance change for Y5P will be ±10%; Z5U will be ±20%; Z5V will be ±30%; the dissipation factor for Y5P and Z5U will be ≤50x10 <sup>-3</sup> ; Z5V will be ≤75x10 <sup>-3</sup> .
Humidity Test	At exposure in the ambient temperature of 40°C, and at 95% RH for 500 hours: the capacitance change for Y5P will be ±10%; Z5U will be ±20%; Z5V will be ±30%; the dissipation factor for Y5P and Z5U will be ≤50x10 <sup>-3</sup> ; Z5V will be ≤75x10 <sup>-3</sup> .

## PART NUMBERING SYSTEM

1	4	0	5	0	P	2	-	1	0	1	K	-	R	C
Series			Voltage Actual Value		Temp. Coeff.	Lead Space		1st digit	2nd digit	# of's	Capacitance (pF)	Tolerance	Suffix (RoHSCompliant)	

Temp. Coeff.	Code
Y5P	P
Z5U	Z
Z5V	Q

Lead Space	Code
2.5mm	2
5.0mm	5
9.5mm	9

Tolerance	Code
±0.25pF	C
±5%	J
±10%	K

Tolerance	Code
±20%	M
±0.5pF	D
+80/-20%	Z

## TEMPERATURE COEFFICIENT CHARACTERISTICS

Temperature Coefficient	Y5P	Z5U	Z5V
Operating Temp. Range	-25°C ~ +85°C	+10°C ~ +85°C	+10°C ~ +85°C
Capacitance Change	±10%	+20%, -55%	+30%, -80%

