StackiCap[™] Capacitors - X7R

The StackiCap[™] range offers a significant reduction in `PCB real estate' for an equivalent capacitance value when board space is at a premium. For example, a standard 150nF chip in a 8060 case size is now available in a much smaller 3640 case size.

Knowles's unique patented* construction and FlexiCap[™] termination material make the StackiCap[™] range suitable for applications including: power supplies, lighting, aerospace electronics and high voltage applications where a large amount of capacitance is required. Further developments are on-going, please contact the Sales Office for details of the full range.

* StackiCap[™] technology is protected by international patents (pending) EP2847776, WO2013186172A1, US20150146343A1 and CN104471660A.





Insulation resistance Time Constant (RxCr) (whichever is the least - 500s or $500M\Omega$)

Maximum capacitance Up to 5.6μF

Maximum voltage Up to 2kV

Maximum capacitance values - StackiCap™ Capacitors

Chip Size	1812	2220	3640
200/250V	1.0µF	2.2µF	5.6µ F
500V	470nF	1.2µF	2.7µF
630V	330nF	1.0µF	2.2µF
1kV	180nF	470nF	1.0µF
1.2kV	100nF	220nF	470nF
1.5kV	56nF	150nF	330nF
2kV	33nF	100nF	150nF

= AEC-Q200

Ordering information - StackiCap[™] Capacitors

1812	Υ	500	0474	K	J	Т	WS2
Chip size	Termination	Voltage	Capacitance in picofarads (pF)	Capacitance tolerance	Dielectric	Packaging	Suffix code
1812 2220 3640	Y = FlexiCap [™] termination base with nickel barrier (100% matte tin plating). RoHS compliant. Lead free. H = FlexiCap [™] Termination base with nickel barrier (Tin/lead plating with minimum 10% lead). Not RoHS compliant.	200/250 = 200/250V 500 = 500V 630 = 630V 1K0 = 1kV 1K2 = 1.2kV 1K5 = 1.5kV 2K0 = 2kV	First digit is 0. Second and third digits are significant figures of capacitance code in picofarads (pF). Fourth digit is number of zeros eg. 0474 = 470nF Values are E12 series	$J = \pm 5\%$ K = ±10% M = ±20%	J = X7R (BME) E = X7R (2R1) AEC-Q200 S = X7R (BME) AEC-Q200 X = X7R	T = 178mm (7") reel R = 330mm (13") reel B = Bulk pack - tubs or trays	WS2

Reeled quantities - StackiCap™ Capacitors

	1812	2220	3640
178mm (7") Reel	500	500	-
330mm (13") Reel	2,000	2,000	500

Note: Parts in this range may be defined as dual-use under export control legislation as such may be subject to export licence restrictions.

Please refer to page 12 for more information on the dual-use regulations and contact the Sales Office for further information on specific part numbers.

StackiCap