

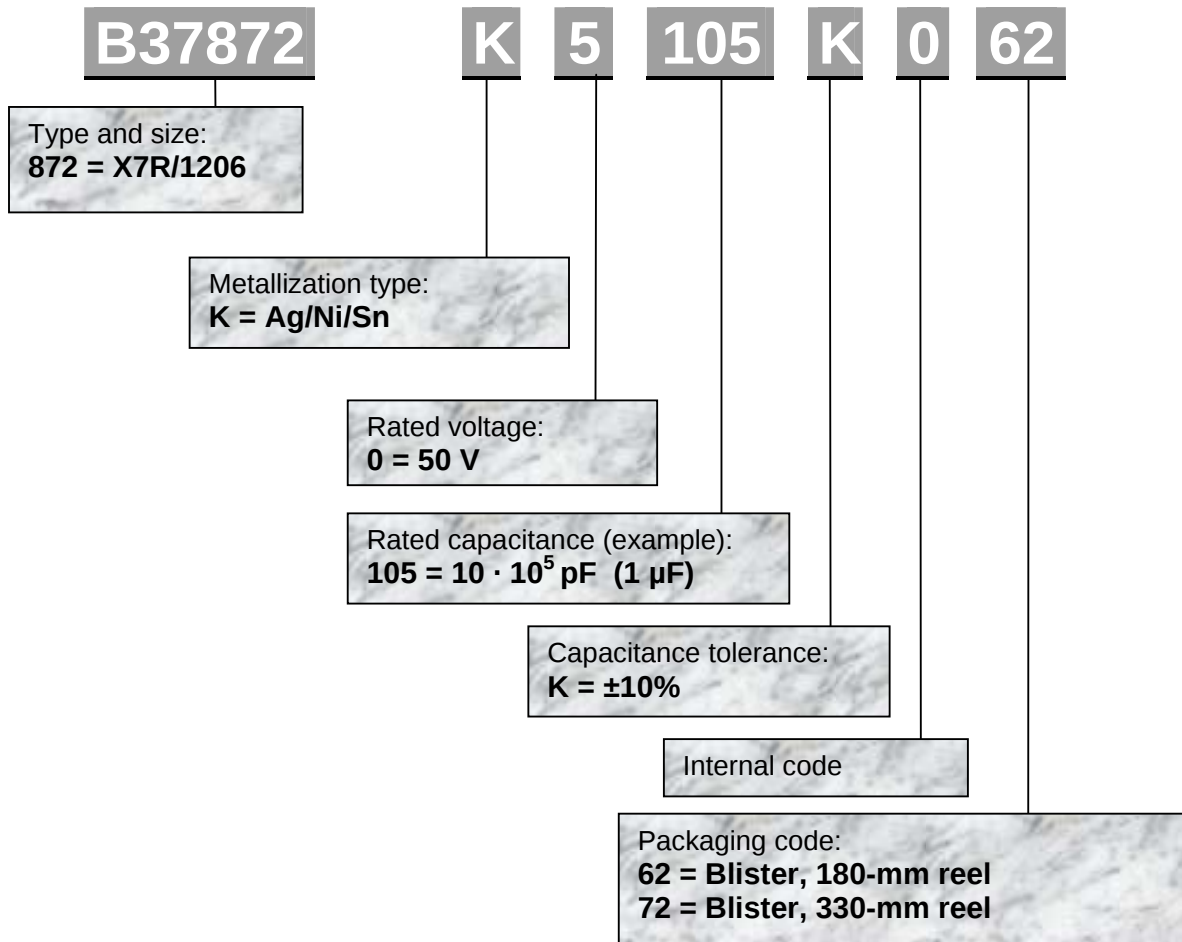


Multilayer ceramic capacitor

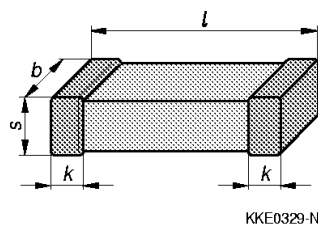
HighCV, X7R 1206 50 V

Series/Type: Chip
Ordering code: B37872K5105K0**
Date: 25.10.2005
Version: 1

Ordering code



Dimensional drawing



Size [inch / mm]	l [mm]	b [mm]	s [mm]	k [mm]
1206 / 3216	3.2 ± 0.20	1.6 ± 0.15	1.2 ± 0.10	$0.25 - 0.75$

see also "Ordering codes and chip thickness", dimensions in accordance to CECC 32101-801

Electrical data

Temperature characteristic:	X7R
Climatic category (IEC 60068-1):	55/125/56
Standard:	EIA
Dielectric:	Class 2
Rated voltage:	50 V
Capacitance ¹⁾ test conditions	
Test frequency:	(1.0 ±0.2) kHz
Test voltage:	(1.0 ±0.2) V _{RMS}
Max. relative capacitance change:	±15%
Dissipation factor tanδ (limit value):	< 25 · 10 ⁻³
Time constant τ at +25 °C:	> 500 s
Operating temperature range:	-55 °C ... +125 °C
Capacitance value:	1 μF

¹⁾ Subject to aging, please see "General Technical Information" at www.epcos.com/ceramic_capacitors or the databook "Multilayer Ceramic Capacitors".

Ordering codes and chip thickness

Size [inch]	C _R [μF]	Ordering code	Thickness [mm]	Packing quantity	
				Ø 180-mm reel [pcs]	Ø 330-mm reel [pcs]
1206	1	B37872K5105K062*	1.2 ±0.1	3000	12000

* Ordering Code Example Standard tolerance: ± 10%
 Standard packaging: Blister tape, 180-mm reel

Further information

Please see General Technical Information at www.epcos.com/ceramic_capacitors or the data book "Multilayer Ceramic Capacitors" for further information on:

- Soldering directions
- Taping and packing
- Surface mounting instructions
- Effects of mechanical stress

Cautions and warnings

- Derating: A "state of the art" application design is essential to achieve failures rates at ppb level. Do not use designs based on 100% of specified rated values.
- AC applications may damage MLCC on a much lower level than DC voltage due to power dissipation losses.
- Mechanical stress - Please note EPCOS "General Technical Information", "Surface mounting instructions" and information about the effect of mechanical stress.
- ESD - EPCOS recommends the use of varistors.
- Further processing - care must be taken using moulding processes.
- Combined stresses - the total stress (e.g. DC voltage, AC ripple, pulses and temperature) has to be taken into account to estimate reliability of MLCC.

Important notes

The following applies to all products named in this publication:

1. Some parts of this publication contain **statements about the suitability of our products for certain areas of application**. These statements are based on our knowledge of typical requirements that are often placed on our products in the areas of application concerned. We nevertheless expressly point out **that such statements cannot be regarded as binding statements about the suitability of our products for a particular customer application**. As a rule, EPCOS is either unfamiliar with individual customer applications or less familiar with them than the customers themselves. For these reasons, it is always ultimately incumbent on the customer to check and decide whether an EPCOS product with the properties described in the product specification is suitable for use in a particular customer application.
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