



Product Range

SMD
PCM 2.5 mm
PCM 5.0 mm
PCM 7.5 - 37.5mm
metallized
PCM 7.5 - 15 mm
film/foil
For high current
ratings
Snubber capacitors
RFI-capacitors

News

TECHNICAL SPOTLIGHT

WIMA FKP 2



Polypropylene film and foil capacitors for pulse applications in PCM 5 mm

■ For all applications from the millivolt range up to 1000 VDC rated. ■ For substitution of polystyrene capacitors e.g. in audio applications and HF technique. ■ Close tolerances up to 1%. ■ Low loss and low damping capacitors with high resonant frequency. ■ Constantly negative TKc. ■ For all pulse applications with high repetition frequency like switch mode power supplies, ballasts, etc. ■ Available taped and reeled.

Technical Data / General Data

Dielectric: Polypropylene film.

Capacitor electrodes: Metal foil.

Encapsulation: Flame retardent plastic case,
UL 94 V-0, with epoxy resin seal.

Colour: Red. Epoxy resin seal: Yellow. Marking: Black.

Temperature range: -55° C to +100° C.

Test specifications: In accordance with IEC 60384-13
and EN 131800.

Test category: 55/100/56 in accordance with IEC.

Insulation resistance at +20° C:
 $\geq 5 \times 10^5 \text{ M}\Omega$ (mean value: $1 \times 10^6 \text{ M}\Omega$)
In accordance with IEC 60384-13 and EN 131800.

Measuring voltage:
Ur = 63 V: Utest = 50 V/1 min.
Ur $\geq$ 100 V: Utest = 100 V/1 min.

Capacitance tolerances: $\pm 10\%$, $\pm 5\%$, $\pm 2.5\%$,
($\pm 1\%$ available subject to special enquiry).

Test voltage: 2 Ur, 2 sec.

Temperature coefficient:
 -200×10^{-6} per degree C (typical).

Maximum pulse rise time: 1000 V/ μsec for pulses equal to the
rated voltage.

Dissipation factors at +20° C: tan delta

at f	C≤1000pF	1000pF<C≤4700pF	4700pF<C≤0.033μF
1 kHz	≤ 3 × 10 ⁻⁴	≤ 4 × 10 ⁻⁴	≤ 4 × 10 ⁻⁴
10 kHz	≤ 3 × 10 ⁻⁴	≤ 4 × 10 ⁻⁴	≤ 4 × 10 ⁻⁴
100kHz	≤ 4 × 10 ⁻⁴	≤ 5 × 10 ⁻⁴	-
1 MHz	≤ 10x10 ⁻⁴	-	-

Vibration: 6 hours at 10...2000 Hz and 0.75 mm displacement amplitude or 10 g in accordance with IEC 60068-2-6.

Low air density: 1 kPa = 10 mbar in accordance with IEC 60068-2-13.

Bump test: 4000 bumps at 390 m/sec² in accordance with IEC 60068-2-29.

Voltage derating: A voltage derating factor of 1.35% per K must be applied from +85° C for DC voltages and from +75° C for AC voltages.

Graphs: / Taping:

Example for ordering/Part number

Impedance change with frequency (general guide)

