

### RM SERIES ■ STANDARD 105°C TYPE

#### KEY FEATURES

- ALUMINUM ELECTROLYTIC CAPACITOR ■ Screw terminal type
- Useful life: 105°C ■ 6000 hours
- Wide capacitance range
- All-welded construction ensures highest reliability
- Bottom cooling possible due to the thermal construction



#### SPECIFICATIONS

Items		Performance Characteristics		
Operating Temperature Range		-40 ~ +105°C		-25 ~ +105°C
Rated Voltage Range	V <sub>R</sub>	160 ~ 450V DC		500V DC
Surge Voltage	V <sub>S</sub>	(V <sub>R</sub> ≤ 315V): V <sub>S</sub> = 1.15·V <sub>R</sub>		(V <sub>R</sub> > 315V): V <sub>S</sub> = 1.10·V <sub>R</sub>
Capacitance Range	C <sub>R</sub>	180 ~ 68000µF		330 ~ 10000µF
Cap. Tolerance	ΔC	±20% (120Hz ■ 20°C)		
Leakage Current (20°C ■ V <sub>R</sub> applied)	I <sub>LEAK</sub>	≤ 0.018·(C <sub>R</sub> ·V <sub>R</sub> ) <sup>0.85</sup> + 4 (µA) or 5mA (whichever is smaller) ■ After 5 minutes [ I <sub>LEAK</sub> (µA) ; C <sub>R</sub> (µF) ; V <sub>R</sub> (V) ]		
Dissipation Factor % (20°C ■ 120Hz)	tanδ	V <sub>R</sub> (V DC)	160 ~ 450	500
		tanδ	15	20
Low Temperature Characteristics at 120Hz	Z ratio max.	V <sub>R</sub> (V DC)	160 ~ 450	500
		Z-25°C/Z+20°C	4	4
		Z-40°C/Z+20°C	10	-
Lifetime Test				
Useful Life 105°C (V <sub>R</sub> & I <sub>R</sub> applied)	Test	<b>6000 hours</b>		
	ΔC/C <sub>R</sub>	≤ ±15% of initial measured value		
	tanδ	≤ 175% of initial specified value		
	I <sub>Leak</sub>	≤ the initial specified value		
Deviation Rate @ Useful Life: 10 000 FIT = 1%/1000h with 60% confidence level ■ parts show higher drift as test criteria				
Endurance 105°C (V <sub>R</sub> & I <sub>R</sub> applied)	Test	<b>2000 hours</b>		
	ΔC/C <sub>R</sub>	≤ ±10% of initial measured value		
	tanδ	≤ 130% of initial specified value		
	I <sub>Leak</sub>	≤ the initial specified value		
Shelf Life 105°C (V <sub>R</sub> = 0)	Test	<b>1000 hours</b>		
	ΔC/C <sub>R</sub>	≤ ±10% of initial measured value		
	tanδ	≤ 130% of initial specified value		
	I <sub>Leak</sub>	≤ the initial specified value		
Before measurement: Restore capacitor to 20°C, apply V <sub>R</sub> for 30 min according JIS-C-5101-4				
Vibration Resistance Test	Max. 10g force, f <sub>RANGE</sub> 10Hz ... 55Hz, amplitude 0.75mm; X/Y/Z-axis each 2h; capacitor rigidly clamped by body to surface ■ IEC 60068-2-6			

**STANDARD RATINGS**

□□□ see terminal code at dimensions table

$V_R$ (V)	$C_R$ ( $\mu$ F)	$\varnothing D$ (mm)	L (mm)	Typ. ESR +20°C - 120Hz (m $\Omega$ )	Max. ESR +20°C - 120Hz (m $\Omega$ )	$I_R$ - Max. Ripple Current +105°C - 120Hz (mA rms)	CapXon Part Number
160	470	35	50	230	420	1100	RM471M160P500□□□
	560	35	50	200	360	1300	RM561M160P500□□□
	680	35	50	160	290	1400	RM681M160P500□□□
	820	35	50	130	240	1500	RM821M160P500□□□
	1000	35	50	110	200	1600	RM102M160P500□□□
	1200	35	60	94	170	2000	RM122M160P600□□□
	1500	35	60	72	130	2200	RM152M160P600□□□
	1800	35	80	61	110	2600	RM182M160P800□□□
	2200	35	80	50	90	2900	RM222M160P800□□□
	2700	35	100	41	74	3400	RM272M160PA00□□□
	3300	51	75	33	60	3900	RM332M160R750□□□
	3900	51	75	28	51	4000	RM392M160R750□□□
	4700	51	96	24	42	4700	RM472M160R960□□□
	5600	51	96	20	36	5200	RM562M160R960□□□
	6800	51	120	16	29	6200	RM682M160RA20□□□
	6800	63.5	96	16	29	6200	RM682M160S960□□□
	8200	63.5	96	13	24	7100	RM822M160S960□□□
	10000	63.5	120	11	20	8500	RM103M160SA20□□□
	10000	76.2	96	11	20	8500	RM103M160T960□□□
	12000	76.2	100	9	17	9500	RM123M160TA00□□□
	15000	76.2	120	7	13	11500	RM153M160TA20□□□
	18000	76.2	140	6	11	13500	RM183M160TA40□□□
	22000	76.2	140	5	9	14000	RM223M160TA40□□□
22000	89	130	5	9	14800	RM223M160XA30□□□	
27000	89	140	4	8	16100	RM273M160XA40□□□	
33000	89	140	3	7	16600	RM333M160XA40□□□	
47000	89	220	3	7	17500	RM473M160XB20□□□	
68000	100	250	2	6	19300	RM683M160DB50□□□	
200	330	35	50	330	600	1000	RM331M200P500□□□
	390	35	50	280	510	1100	RM391M200P500□□□
	470	35	50	230	420	1200	RM471M200P500□□□
	560	35	50	200	360	1400	RM561M200P500□□□
	680	35	50	160	290	1500	RM681M200P500□□□
	820	35	50	130	240	1600	RM821M200P500□□□
	1000	35	60	110	200	1800	RM102M200P600□□□
	1200	35	60	94	170	2100	RM122M200P600□□□
	1500	35	80	72	130	2300	RM152M200P800□□□
	1800	35	80	61	110	2700	RM182M200P800□□□
	2200	35	100	50	90	3100	RM222M200PA00□□□
	2200	51	75	50	90	3200	RM222M200R750□□□
	2700	35	120	41	74	3700	RM272M200PA20□□□
	2700	51	96	41	74	3700	RM272M200R960□□□
	3300	51	80	33	60	4200	RM332M200R800□□□
	3900	51	100	28	51	5000	RM392M200RA00□□□

**STANDARD RATINGS**

□□□ see terminal code at dimensions table

V <sub>R</sub> (V)	C <sub>R</sub> (μF)	∅ D (mm)	L (mm)	Typ. ESR +20°C · 120Hz (mΩ)	Max. ESR +20°C · 120Hz (mΩ)	I <sub>R</sub> = Max. Ripple Current +105°C · 120Hz (mA rms)	CapXon Part Number
200	4700	51	140	24	42	5800	RM472M200RA40□□□
	4700	63.5	96	24	42	5400	RM472M200S960□□□
	5600	63.5	96	20	36	5900	RM562M200S960□□□
	6800	63.5	115	16	29	7000	RM682M200SA15□□□
	8200	63.5	120	13	24	7700	RM822M200SA20□□□
	10000	76.2	115	11	20	9700	RM103M200TA15□□□
	12000	76.2	120	9	17	10300	RM123M200TA20□□□
	15000	76.2	140	7	13	11600	RM153M200TA40□□□
	15000	89	130	7	13	12300	RM153M200XA30□□□
	18000	89	140	6	11	13600	RM183M200XA40□□□
	22000	76.2	160	5	9	14000	RM223M200TA60□□□
	22000	89	140	5	9	15200	RM223M200XA40□□□
	33000	89	220	4	6	16600	RM333M200XB20□□□
	47000	89	250	3	5	19900	RM473M200XB50□□□
250	270	35	50	410	740	900	RM271M250P500□□□
	330	35	50	330	600	1100	RM331M250P500□□□
	390	35	50	280	510	1200	RM391M250P500□□□
	470	35	50	230	420	1300	RM471M250P500□□□
	560	35	50	200	360	1500	RM561M250P500□□□
	680	35	60	160	290	1600	RM681M250P600□□□
	820	35	80	130	240	1700	RM821M250P800□□□
	1000	35	80	110	200	1900	RM102M250P800□□□
	1200	35	80	94	170	2200	RM122M250P800□□□
	1500	35	100	72	130	2400	RM152M250PA00□□□
	1500	51	75	72	130	2500	RM152M250R750□□□
	1800	35	120	61	110	2800	RM182M250PA20□□□
	1800	51	75	61	110	2800	RM182M250R750□□□
	2200	51	96	50	90	3300	RM222M250R960□□□
	2700	51	100	41	74	3800	RM272M250RA00□□□
	3300	51	120	33	60	4300	RM332M250RA20□□□
	3300	63.5	96	33	60	4300	RM332M250S960□□□
	3900	51	120	28	51	5100	RM392M250RA20□□□
	3900	63.5	96	28	51	4700	RM392M250S960□□□
	4700	63.5	115	24	42	5800	RM472M250SA15□□□
	5600	63.5	120	20	36	6400	RM562M250SA20□□□
	6800	76.2	115	16	29	7800	RM682M250TA15□□□
	8200	76.2	120	13	24	8500	RM822M250TA20□□□
	10000	76.2	140	11	20	10100	RM103M250TA40□□□
	10000	89	140	11	20	10300	RM103M250XA40□□□
	12000	89	140	9	17	12000	RM123M250XA40□□□
15000	89	157	7	13	12600	RM153M250XA57□□□	
22000	89	220	5	9	15500	RM223M250XB20□□□	
33000	100	250	3	6	17100	RM333M250DB50□□□	

**STANDARD RATINGS**

□□□ see terminal code at dimensions table

$V_R$ (V)	$C_R$ ( $\mu$ F)	$\varnothing D$ (mm)	L (mm)	Typ. ESR +20°C - 120Hz (m $\Omega$ )	Max. ESR +20°C - 120Hz (m $\Omega$ )	$I_R$ - Max. Ripple Current +105°C - 120Hz (mA rms)	CapXon Part Number
315	180	35	50	620	1110	800	RM181M315P500□□□
	220	35	50	500	900	1000	RM221M315P500□□□
	270	35	50	410	740	1100	RM271M315P500□□□
	330	35	50	330	600	1200	RM331M315P500□□□
	390	35	50	280	510	1300	RM391M315P500□□□
	470	35	60	230	420	1500	RM471M315P600□□□
	560	35	55	200	360	2500	RM561M315P550□□□
	680	35	65	160	290	3000	RM681M315P650□□□
	820	35	75	130	240	3400	RM821M315P750□□□
	1000	35	80	110	200	3900	RM102M315P800□□□
	1200	35	100	94	170	4600	RM122M315PA00□□□
	1500	51	70	72	130	5500	RM152M315R700□□□
	1800	51	75	61	110	6100	RM182M315R750□□□
	2200	51	90	50	90	7300	RM222M315R900□□□
	2700	51	100	41	74	8500	RM272M315RA00□□□
	3300	63.5	85	33	60	10000	RM332M315S850□□□
	3900	63.5	96	28	51	11400	RM392M315S960□□□
	4700	76.2	85	24	42	13200	RM472M315T850□□□
	5600	76.2	96	20	36	15100	RM562M315T960□□□
6800	76.2	110	16	29	17700	RM682M315TA10□□□	
8200	89	100	13	24	17800	RM822M315XA00□□□	
10000	89	115	11	20	20200	RM103M315XA15□□□	
350	180	35	50	620	1110	900	RM181M350P500□□□
	220	35	50	500	900	1100	RM221M350P500□□□
	270	35	50	410	740	1200	RM271M350P500□□□
	330	35	50	330	600	1300	RM331M350P500□□□
	390	35	60	280	510	1400	RM391M350P600□□□
	470	35	55	230	420	2300	RM471M350P550□□□
	560	35	60	200	360	2600	RM561M350P600□□□
	680	35	70	160	290	3100	RM681M350P700□□□
	820	35	80	130	240	3500	RM821M350P800□□□
	1000	35	90	110	200	4100	RM102M350P900□□□
	1000	51	75	110	200	4300	RM102M350R750□□□
	1200	51	65	94	170	4700	RM122M350R650□□□
	1500	51	75	72	130	5600	RM152M350R750□□□
	1800	51	85	61	110	6500	RM182M350R850□□□
	2200	51	100	50	90	7700	RM222M350RA00□□□
	2700	51	105	41	74	8700	RM272M350RA05□□□
	2700	63.5	80	41	74	8800	RM272M350S800□□□
	3300	51	130	33	60	10100	RM332M350RA30□□□
	3300	63.5	96	33	60	10100	RM332M350S960□□□
	3900	63.5	105	28	51	11200	RM392M350SA05□□□
3900	76.2	80	28	51	11800	RM392M350T800□□□	
4700	63.5	130	24	42	12700	RM472M350SA30□□□	

**STANDARD RATINGS**

□□□ see terminal code at dimensions table

$V_R$ (V)	$C_R$ ( $\mu$ F)	$\phi D$ (mm)	L (mm)	Typ. ESR +20°C - 120Hz (m $\Omega$ )	Max. ESR +20°C - 120Hz (m $\Omega$ )	$I_R$ - Max. Ripple Current +105°C - 120Hz (mA rms)	CapXon Part Number
350	4700	76.2	96	24	42	13300	RM472M350T96□□□
	5600	63.5	130	20	36	14200	RM562M350SA30□□□
	5600	76.2	105	20	36	15700	RM562M350TA05□□□
	6800	76.2	125	16	29	18700	RM682M350TA25□□□
	6800	89	120	16	29	18800	RM682M350XA20□□□
	8200	76.2	143	13	24	19000	RM822M350TA43□□□
	8200	89	115	13	24	18900	RM822M350XA15□□□
	10000	76.2	160	11	20	19500	RM103M350TA60□□□
	10000	89	140	11	20	21000	RM103M350XA40□□□
	12000	76.2	190	9	17	24800	RM123M350TA90□□□
	12000	89	145	9	17	25700	RM123M350XA45□□□
	15000	76.2	220	7	13	29100	RM153M350TB20□□□
	15000	89	170	7	13	29600	RM153M350XA70□□□
	18000	89	200	6	11	33200	RM183M350XB00□□□
400	180	35	50	620	1110	1000	RM181M400P500□□□
	220	35	50	500	900	1200	RM221M400P500□□□
	270	35	50	410	740	1300	RM271M400P500□□□
	330	35	60	330	600	1500	RM331M400P600□□□
	390	35	55	280	510	2100	RM391M400P550□□□
	470	35	60	230	420	2400	RM471M400P600□□□
	560	35	70	200	360	2800	RM561M400P700□□□
	680	51	80	160	290	3700	RM681M400R800□□□
	820	35	90	130	240	3700	RM821M400P900□□□
	1000	51	65	110	200	4400	RM102M400R650□□□
	1200	51	75	94	170	5000	RM122M400R750□□□
	1500	51	85	72	130	5800	RM152M400R850□□□
	1800	51	96	61	110	7000	RM182M400R960□□□
	2200	51	115	50	90	8100	RM222M400RA15□□□
	2200	63.5	85	50	90	8200	RM222M400S850□□□
	2700	51	130	41	74	9400	RM272M400RA30□□□
	2700	63.5	96	41	74	9300	RM272M400S960□□□
	3300	63.5	105	33	60	10800	RM332M400SA05□□□
	3300	76.2	105	33	60	11300	RM332M400TA05□□□
	3900	63.5	118	28	51	11800	RM392M400SA18□□□
	3900	76.2	105	28	51	12300	RM392M400TA05□□□
	4700	63.5	143	24	42	13500	RM472M400SA43□□□
	4700	76.2	105	24	42	14400	RM472M400TA05□□□
	4700	89	97	24	42	14900	RM472M400X970□□□
	5600	63.5	195	20	36	17200	RM562M400SA95□□□
	5600	76.2	130	20	36	15800	RM562M400TA30□□□
	5600	89	96	20	36	15300	RM562M400X960□□□
	6800	76.2	143	16	29	19000	RM682M400TA43□□□
6800	89	115	16	29	18900	RM682M400XA15□□□	
8200	76.2	170	13	24	20600	RM822M400TA70□□□	

**STANDARD RATINGS**

□□□ see terminal code at dimensions table

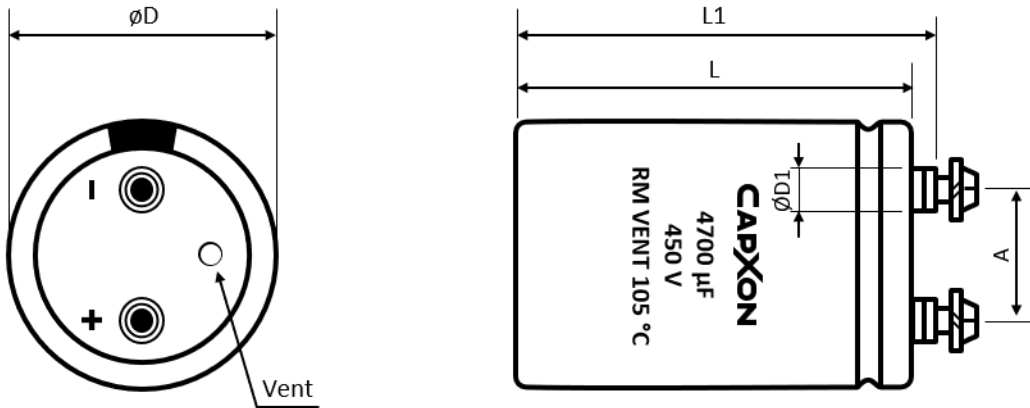
$V_R$ (V)	$C_R$ ( $\mu$ F)	$\varnothing D$ (mm)	L (mm)	Typ. ESR +20°C - 120Hz (m $\Omega$ )	Max. ESR +20°C - 120Hz (m $\Omega$ )	$I_R$ - Max. Ripple Current +105°C - 120Hz (mA rms)	CapXon Part Number
400	8200	89	130	13	24	19300	RM822M400XA30□□□
	10000	76.2	190	11	20	21800	RM103M400TA90□□□
	10000	89	160	11	20	22000	RM103M400XA60□□□
	12000	76.2	220	9	17	27000	RM123M400TB20□□□
	12000	89	180	9	17	26000	RM123M400XA80□□□
	15000	89	200	7	13	29700	RM153M400XB00□□□
450	220	35	50	500	900	1200	RM221M450P500□□□
	330	35	55	330	600	1900	RM331M450P550□□□
	390	35	65	280	510	2300	RM391M450P650□□□
	470	35	75	230	420	2600	RM471M450P750□□□
	560	35	80	200	360	2900	RM561M450P800□□□
	680	35	100	160	290	3600	RM681M450PA00□□□
	680	51	80	160	290	3800	RM681M450R800□□□
	820	35	110	130	240	4200	RM821M450PA10□□□
	1000	51	80	110	200	4700	RM102M450R800□□□
	1200	51	90	94	170	5400	RM122M450R900□□□
	1500	51	105	72	130	6800	RM152M450RA05□□□
	1500	63.5	80	72	130	7000	RM152M450S800□□□
	1800	51	130	61	110	7800	RM182M450RA30□□□
	1800	63.5	96	61	110	7800	RM182M450S960□□□
	2200	63.5	96	50	90	8600	RM222M450S960□□□
	2700	63.5	118	41	74	10200	RM272M450SA18□□□
	2700	76.2	96	41	74	10700	RM272M450T960□□□
	3300	63.5	145	33	60	11500	RM332M450SA45□□□
	3300	76.2	120	33	60	11000	RM332M450TA20□□□
	3300	89	97	33	60	13100	RM332M450X970□□□
	3900	76.2	130	28	51	13400	RM392M450TA30□□□
	3900	89	120	28	51	14900	RM392M450XA20□□□
	4700	76.2	120	24	42	14500	RM472M450TA20□□□
	4700	89	120	24	42	16700	RM472M450XA20□□□
	5600	76.2	160	20	36	15900	RM562M450TA60□□□
	5600	89	120	20	36	15400	RM562M450XA20□□□
	6800	76.2	160	16	29	19100	RM682M450TA60□□□
6800	89	140	16	29	19200	RM682M450XA40□□□	
8200	76.2	220	13	24	23100	RM822M450TB20□□□	
8200	89	170	13	24	23700	RM822M450XA70□□□	
10000	89	200	11	20	24000	RM103M450XB00□□□	
500	330	51	80	440	800	2800	RM331M500R800□□□
	470	51	60	310	560	2700	RM471M500R600□□□
	680	51	80	220	390	4100	RM681M500R800□□□
	820	51	85	180	320	4300	RM821M500R850□□□
	1000	51	105	150	270	4800	RM102M500RA05□□□
	1200	51	120	120	220	6000	RM122M500RA20□□□
	1200	63.5	85	120	220	5800	RM122M500S850□□□

**STANDARD RATINGS**

□□□ see terminal code at dimensions table

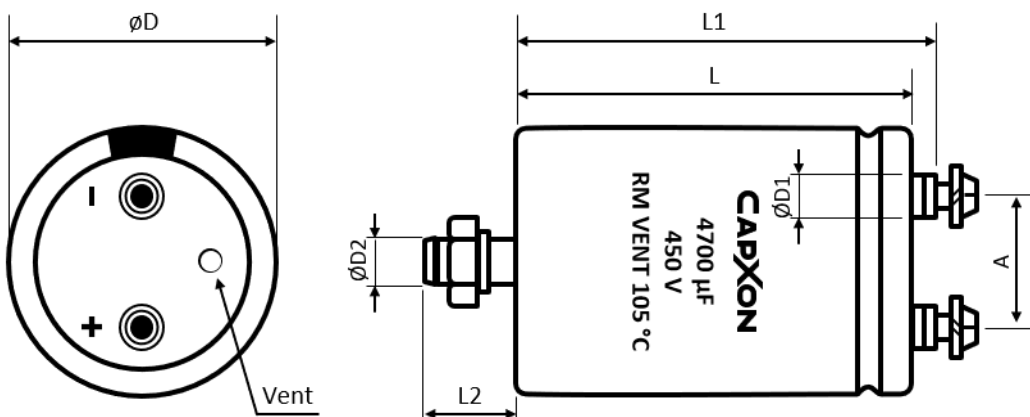
$V_R$ (V)	$C_R$ ( $\mu F$ )	$\phi D$ (mm)	L (mm)	Typ. ESR +20°C - 120Hz (m $\Omega$ )	Max. ESR +20°C - 120Hz (m $\Omega$ )	$I_R$ - Max. Ripple Current +105°C - 120Hz (mA rms)	CapXon Part Number
500	1500	51	130	100	180	7000	RM152M500RA30□□□
	1500	63.5	96	100	180	7100	RM152M500S960□□□
	1800	63.5	105	83	150	7900	RM182M500SA05□□□
	2200	63.5	130	67	120	9400	RM222M500SA30□□□
	2200	76.2	96	67	120	9500	RM222M500T960□□□
	2700	63.5	145	55	98	10300	RM272M500SA45□□□
	2700	76.2	105	55	98	10800	RM272M500TA05□□□
	2700	89	97	55	98	11600	RM272M500X970□□□
	3300	63.5	170	45	80	13000	RM332M500SA70□□□
	3300	76.2	130	45	80	12200	RM332M500TA30□□□
	3300	89	120	45	80	13400	RM332M500XA20□□□
	3900	76.2	145	38	68	13500	RM392M500TA45□□□
	3900	89	120	38	68	15000	RM392M500XA20□□□
	4700	76.2	170	31	56	16000	RM472M500TA70□□□
	4700	89	145	31	56	16800	RM472M500XA45□□□
	5600	76.2	220	26	47	18100	RM562M500TB20□□□
	5600	89	150	26	47	17900	RM562M500XA50□□□
	6800	89	170	22	39	20800	RM682M500XA70□□□
8200	89	220	18	32	25600	RM822M500XB20□□□	
10000	89	250	15	27	30000	RM103M500XB50□□□	

### DIMENSIONS - Ring clamp mounting - All dimensions in mm



Terminal	Dimensions (mm) with insulating sleeve					Min. Full Thread (mm)	Max. Torque (Nm)	Terminal code
	$D \pm 2$	$L \pm 3$	$L1 \pm 3$	$D1$ max.	$A \pm 0.5$			
M5	35	50 ~ 120	56.5 ~ 126.5	8.3	12.7	8	2	A50
M5	51	50 ~ 140	56.5 ~ 146.5	10.3	22	8	2	A50
M5	63.5	80 ~ 140	86.5 ~ 146.5	10.3	28.6	8	2	A50
M5	63.5	80 ~ 140	86.5 ~ 146.5	13	28.6	8	2	A53
M5	76.2	100 ~ 240	106.5 ~ 246.5	10.3	31.8	12	2.5	A50
M5	76.2	100 ~ 240	106.5 ~ 246.5	13	31.8	12	2.5	A53
M6	76.2	100 ~ 240	106.5 ~ 246.5	13	31.8	12	2.5	A63
M6	76.2	100 ~ 240	106.5 ~ 246.5	17.5	31.8	12	2.5	A67
M6	89	100 ~ 240	106.5 ~ 246.5	13	31.8	12	2.5	A63
M6	89	100 ~ 240	106.5 ~ 246.5	17.5	31.8	12	2.5	A67
M8	100	100 ~ 240	110 ~ 250	17.5	41.5	16	5	A87

### DIMENSIONS - Threaded stud mounting - All dimensions in mm





**DIMENSIONS - Threaded stud mounting - All dimensions in mm**

Terminal	Dimensions (mm) with insulating sleeve							Min. Full Thread (mm)	Max. Torque (Nm)	Terminal code
	D ± 2	L ± 3	L1 ± 3	L2 ± 1	D1 max.	D2	A ± 0.5			
M5	35	50 ~ 120	56.5 ~ 126.5	12	8.3	M8	12.7	8	2	E50
M5	51	50 ~ 140	56.5 ~ 146.5	16	10.3	M12	22	8	2	E50
M5	63.5	80 ~ 140	86.5 ~ 146.5	16	10.3	M12	28.6	8	2	E50
M5	63.5	80 ~ 140	86.5 ~ 146.5	16	13	M12	28.6	8	2	E53
M5	76.2	100 ~ 240	106.5 ~ 246.5	16	10.3	M12	31.8	12	2.5	E50
M5	76.2	100 ~ 240	106.5 ~ 246.5	16	13	M12	31.8	12	2.5	E53
M6	76.2	100 ~ 240	106.5 ~ 246.5	16	13	M12	31.8	12	2.5	E63
M6	76.2	100 ~ 240	106.5 ~ 246.5	16	17.5	M12	31.8	12	2.5	E67
M6	89	100 ~ 240	106.5 ~ 246.5	16	13	M12	31.8	12	2.5	E63
M6	89	100 ~ 240	106.5 ~ 246.5	16	17.5	M12	31.8	12	2.5	E67
M8	100	100 ~ 240	110 ~ 250	16	17.5	M12	41.5	16	5	E87

**ACCESSORIES**

- The capacitors are supplied with suitable screws, serrated washers and plain washers. Accessories are not fastened to the capacitor.
- Suitable ring clamps and further assembly material see packaging information “Accessories”.

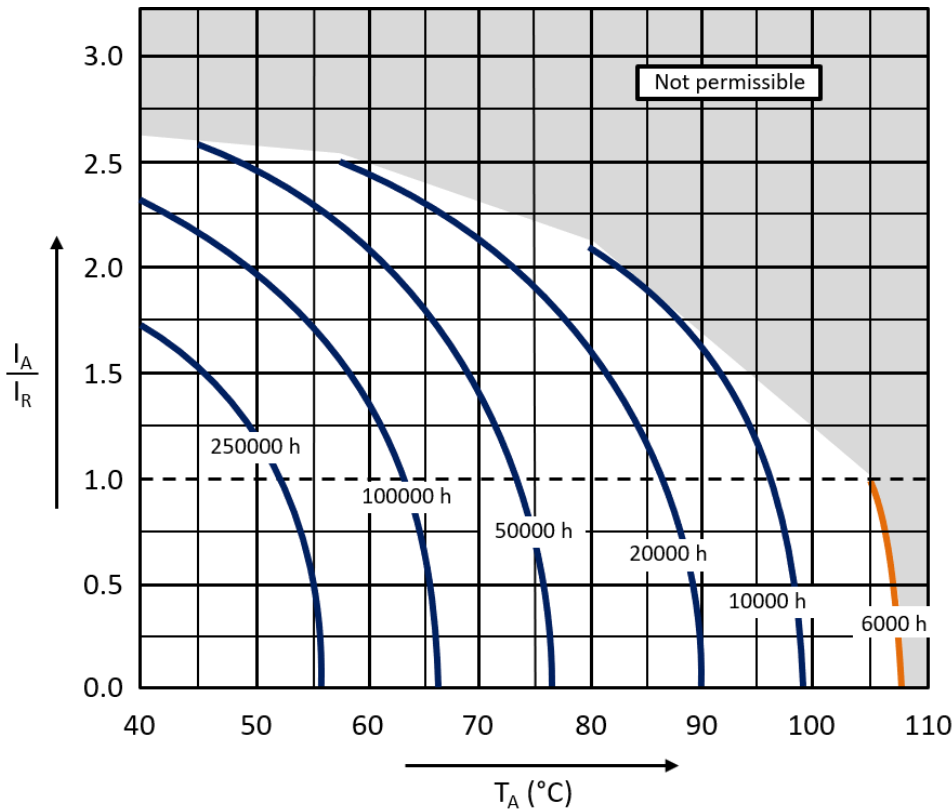
**MULTIPLIER  $K_f$  for RIPPLE CURRENT vs. FREQUENCY**

Frequency (Hz)	50/60	100/120	300	1k	≥ 3k
$K_f$	0.8	1	1.2	1.3	1.4

**PRECAUTIONS, GUIDELINES AND PACKAGING INFORMATION**

Unless otherwise agreed in individual specifications, all products are subject to our “General Precautions and Guidelines” as well as our “Packaging Information”. Please refer to the following links in the table.

<a href="#">General Precautions &amp; Guidelines</a>	<a href="#">Packaging Information</a>	<a href="#">3D Models</a>

**USEFUL LIFE**


With:  $I_A$ : Actual application current  
 $I_R$ : Maximum permissible rated ripple current (A RMS)  
 $T_A$ : Ambient temperature of the capacitor

**DISCLAIMER**

All product related data (e.g. specification, statements and general information) are subject to change without any notice. It is necessary that the customer observes all product related technical / application information and handling instructions.

CapXon products are designed and manufactured according to severe quality and safety standards. Under no circumstance, CapXon warrants that any CapXon product is suitable for the purposes intended for your application, even CapXon knows the application. It is customer's duty and obligation to check and make sure that CapXon products are suitable for the purposes intended and select the correct and proper CapXon product. Customers are requested to perform a sufficient validation and reliability evaluation to assure needed safety level and reliability performance by suitable designs and to apply proper safeguards (e.g. redundancies, protective circuits).

Particular operating conditions (ambient temperature, ripple current, voltage, thermal resistance, etc.) as well as storage, production or assembly may affect the performance and the lifetime of the capacitor. Please consult CapXon for lifetime estimation, failure mode considerations or worst-case scenarios according to the product technology, product tolerances / deviations or change of the characteristics of the capacitor due to shipment, storage, handling, production and usage.

For aerospace or military application, life-saving, life-sustaining, safety critical applications or any application where failure may cause severe personal injury or death, please consult us before design-in the capacitor in your application.

Except for the written expressed warranties, CapXon does not impliedly, by assumption or whatever else, warrant, undertake, promise any other warranty or guaranty for any CapXon product.

For further information, please visit our website [www.capxongroup.com](http://www.capxongroup.com) or contact CapXon directly.