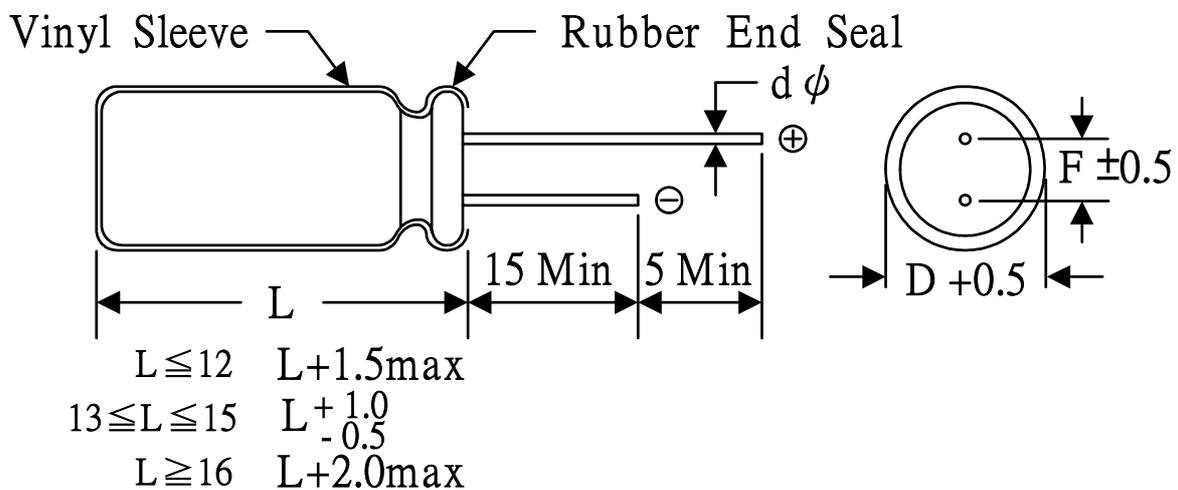


## SEK Type

+105°C Single-ended lead aluminum electrolytic capacitors for the rated voltage up to 450V.

- . Lower-cost capacitors expressly intended for high density printed circuit board.
- . Very high volumetric efficiency.
- . Ideally suited for general-purpose applications, coupling, decoupling, by pass, and filtering circuit in entertainment electronics.
- . Feature high CV product with moderate cost.

Diagram of Dimensions (Unit = mm)



<b>D <math>\phi</math></b>	<b>5.0</b>	<b>6.0</b>	<b>8.0</b>	<b>10.0</b>	<b>12.0</b>	<b>13.0</b>	<b>16.0</b>	<b>18.0</b>	<b>22.0</b>
<b>F</b>	<b>2.0</b>	<b>2.5</b>	<b>3.5</b>	<b>5.0</b>		<b>7.5</b>		<b>10.0</b>	
<b>d <math>\phi</math></b>	<b>0.5</b>			<b>0.6</b>		<b>0.8</b>		<b>0.8</b>	

## PERFORMANCE CHARACTERISTICS

### Feature

- . Working voltage range : 6.3 to 100V ! 160 to 250V ! 350 to 450V
- . Operating temp. range : -40°C to 105°C ! -40°C to +105°C ! -25°C to +105°C
- . Rate capacitance range : 0.47 to 15000uF ! 0.47 to 470uF ! 0.47 to 150uF
- . Capacitance tolerance : -20 to +20% ! -20 to +20% ! -20 to +20%
- . DC leakage current (uA): 0.01CV+3 ! 0.03CV+10 ! 0.03CV+10  
( Measurements shall be made after a 2 minute charge at rated working voltage, @ 20°C)
- . Dissipation factor : at 120 Hz, 20°C

WV(V)	6.3	10	16	25	35	50	63	80	100	160-250	350-450
DF(%)	26	22	18	16	14	12	10	10	10	15	20

For capacitor whose capacitance exceeds 1000 uF, the value of DF(%) is increased by 2% for every addition of 1000 uF.

- . Load Life (1000 hrs, at rated temperature)
  - Capacitance change ..... : within 20% of initial value
  - Dissipation factor .. .. : not exceed 200% of specified value
  - Leakage current ..... : not exceed the specified value
- . Shelf Life (500 hrs, no voltage applied)
  - Capacitance change ..... : within 20% of initial value
  - Dissipation factor ..... : not exceed 200% of specified value
  - Leakage current ..... : not exceed 200% of specified value

### Catalog Numbering

SE	016	M	1000	A	5	S	-	1015	
---	---	---	---	-	-	-	-	-----	
:	:	:	:	:	:	:	:	...	Case size
:	:	:	:	:	:	:	:	...	Lead cut
:	:	:	:	:	:	:	:	...	Rubber
:	:	:	:	:	:	:	:	...	Pitch
:	:	:	:	:	:	:	:	...	Package Code
:	:	:	:	:	:	:	:	...	Capacitance. This expressed in microfarads
:	:	:	:	:	:	:	:	...	Capacitance tolerance
:	:	:	:	:	:	:	:	...	DC voltage rating. This is expressed in volt.
:	:	:	:	:	:	:	:	...	YAGEO type number. This identifies the basic capacitor design

## *PERFORMANCE CHARACTERISTICS (continued)*

### 1. General Characteristics

#### 1.1 Marking

Capacitors shall be marked with TEAPO mark ; rated capacitance ; rated DC working voltage range. and the date code of manufacture. The cathode lead will be identified with minus signs (-) on the side of the case.

#### 1.2 Operating Temperature Range

These capacitors are designed to operate over a temperature range from -40°C to +105°C , for the rated voltage up to 250 V, while 350V to 450V operating temperature range within -25°C to +105°C.

1.2.1 At -40(-25)°C, capacitors shall retain at least 70% of their original 20°C measured capacitance. At +105°C. capacitance shall increases to no more than 120% of their original 20°C measured capacitance.

1.2.2 At -40(-25)°C, impedance shall increase to no more than the following table.

#### TEMPERATURE CHARACTERISTIC (@ 120Hz)

Working Voltage (WV)	6.3	10	16	25	35-100	160-250	315-350	400-450
Impedance Z-25°C/ Z+20°C	8	6	5	3	3	7	10	15
Impedance Z-40°C/ Z+20°C	10	8	6	4	3	7	-	-

#### 1.3 Vent Test (applies only to those capacitors with vents.)

During and after the applicable test below (1.3.1 or 1.3.2.) there shall be no explosion, flash, flame or expulsion of particles of the core or container. In addition, the case shall not be expelled from the core. If the capacitor under test is a multisection unit, this test shall apply to the input section only.

##### 1.3.1 AC Test. Capacitors with DC Rating Over 100 Volts

The capacitor under test shall be connected to a 120 volt RMS 60Hz, 100 ampere service through a 30 ampere thermal breaker and a 0.5 ohm, low inductance, series resistor. The capacitor shall be connected to this circuit for 5 minutes after the initial setting of the breaker or until the breaker has opened 3 times. If the breaker opens, it shall be reset not sooner than 30 seconds nor longer than 60 seconds from the time it opened.

##### 1.3.2 DC Test. Capacitors with DC Rating 100 Volts or Less

Both of the following tests shall be performed, but on separate test units.

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*PERFORMANCE CHARACTERISTICS (continued)*

1.3.2.1 Forward Bias Test.

The capacitor under test shall be connected to a DC power supply that has sufficient voltage to supply a constant direct current of 500 milliamperes with the positive terminal of the capacitor connected to the positive supply terminal and the negative capacitor terminal connected to the negative supply terminal. The constant current shall be maintained until (1) the capacitor vents, (2) 300 seconds have elapsed, or (3) the capacitor under test open circuits.

1.3.2.2 Reverse Bias Test.

The capacitor under test shall be connected to a power supply with sufficient voltage to provide a constant direct current of 500 milliamperes when the positive capacitor terminal is connected to the negative supply terminal and the negative capacitor terminal to the positive supply terminal. The constant current shall be maintained until (1) the capacitor vents, (2)300 seconds have elapsed, or (3) The capacitor open circuits.

2. Mechanical Characteristics

2.1 Lead Pull test

Capacitor leads shall withstand a steady pull of 1 Kg applied axially to the leads for 5 seconds.

3. Electrical Characteristics

3.1 Standard Test Conditions

Unless otherwise specified all tests shall be performed at, or referred to, an ambient temperature of 25°C and a relative humidity not greater than 50%.

3.2 Capacitance and Dissipation Factor

Measurements shall be made on a capacitance bridge capable of +-2% accuracy on capacitance and dissipation factor measurements. Measurements shall be made at 120 Hz The RMS value of the AC measuring voltage shall not exceed 1.0 volt.

3.3 Leakage Current

3.3.1 Pre-conditioning. Rated working voltage shall be applied to capacitors for a minimum period of 15 minutes duration at least 24 hours and not more than 48 hours before test.

3.3.2 Test. Measurements shall be made after a 2 minute charge at rated working voltage at 20°C with an application of a steady source of power. Such as a regular power supply, with a 1000 ohm resistance to limit the charging current, connected in series with each capacitor under test.

3.4 Surge Voltage

The surge DC rating is the maximum voltage to which the capacitor should be subjected under any conditions. This includes transients and peak ripple at the highest line voltage.

3.4.1 Capacitors, connected in series with 1000 ohm resistors, shall withstand the surge test voltage applied at the rated of 1/2 minute on, 5 1/2 minutes off, for 1000 successive test cycles at 20°C.(see the following table)

*PERFORMANCE CHARACTERISTICS (continued)*

Rated Voltage 6.3 10 16 25 35 50 63 80 100 160 200 250 350 400 450

Surge Voltage 8 13 20 32 44 63 79 100 125 200 250 300 400 450 500

3.4.2 After the test, the capacitors shall meet the requirement specified in the following table.

Test	Value after test
Leakage Current	Not more than the initial value specified
Capacitance Change	More than 85% of the value before test
Dissipation Factor	Not more than 175% of the initial value specified

3.5 Humidity Test

Capacitors shall be subjected to a temperature of 40+-2°C at a relative humidity of 90-95% for a period of 500 hours, then air dried for 1 hour. Following this conditioning, capacitors shall meet the specified requirements for dissipation factor and DC leakage current, and the capacitance value shall not change more than 10%.

4. Life And Reliability Test

4.1 Life Test

4.1.1 Rated voltage shall be applied to the capacitors for a period of 1000 hours while units are maintained at an ambient temperature of +105°C.

4.1.2 Capacitors shall then be removed from the test chamber and return to room temperature.

4.1.3 The capacitance shall then be measured in accordance with section 3.2 It shall not decrease to less than 80% of the capacitance at 20°C, measured prior to the test, nor shall it increase to more than 120% of the original 20°C value.

4.1.4 The dissipation factor shall be measured in accordance with section 3.2 The dissipation factor shall not exceed 200% of the specified value.

4.1.5 At the conclusion of the test, the leakage current shall not exceed the initial DC leakage current requirement. Measurements shall be made in accordance with section 3.3

4.2 Shelf Test

After storage for 500 hours at 105°C with no voltage applied, the capacitance change within 20% of initial value at 20°C and dissipation factor shall meet the specified values of section 4.1.4; the DC leakage current, measured in accordance with section 3.3, shall not exceed 200% of the specified value for the capacitor.

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*GUIDE TO APPLICATION*

## 1. Maximum Ripple Current

1.1 Maximum rms. ripple current at 105°C 120Hz is given in the table 1.

1.2 When capacitors are operated at temperatures other than 105°C, and frequency other than 120 Hz, the maximum rms. ripple currents must be multiplied by the factors shown in below table.

## COMPENSATION FACTOR OF RIPPLE CURRENT VERSUS FREQUENCY

WV\Frequency	50	120	300	1K	10K-100K (Hz)
6.3 ~ 100V Below - 68 $\mu$ F	0.75	1	1.2	1.30	1.45
6.3 ~ 100V 69 - 680 $\mu$ F	0.80	1	1.1	1.15	1.25
6.3 ~ 100V 681 - 22000 $\mu$ F	0.80	1	1.05	1.10	1.15
160 ~ 450V All Cap( $\mu$ F)	0.80	1	1.05	1.10	1.50

## 2. Ripple voltage

Ripple voltage must not exceed the following:

The sum of the DC voltage plus the AC ripple voltage must not exceed the rated DC voltage. The DC voltage plus the peak AC voltage must not cause a voltage reversal more than 1.5 volts.

## 3. Insulating

General types of aluminum electrolytic capacitors are covered with a vinyl sleeve or the like. And this sleeve is used for marking. When the internal element or the container is needed to be insulated, capacitors specially designed for insulation requirement are recommended to be used.

## 4. Soldering

4-1 When soldering a printed circuit board with various components, too high soldering temperature or too long dipping times may cause secondary shrinking of the sleeve which unnecessarily exposes the container. Soldering is allowed to performed at less than 260°C for less than 10 seconds.

4-2 Soldering may melt or break the sleeve,if the sleeve is contacted with circuit patterns. To avoid this trouble ,the capacitors are recommended to be slightly apart from the circuit boards.

*GUIDE TO APPLICATION (continued)*

5. Vent

The capacitors are provided with a pressure resistive controlled safety vent formed on the bottom of the container. The vent is designed to rupture in the event that higher internal pressure is developed by circuit malfunction or capacitor miss-use.

6. High Altitude

These capacitors are capable of withstanding in transit conditions where storage temperature may range from -40°C to +105°C and the altitude may reach 200,000 feet.

7. Cleaning agents

Halogenated hydrocarbon cleaning solvents are not recommended for use in cleaning capacitors supplied with exposed end seals. Where cleaning with a halogenated solvent is desired, capacitors should be ordered with a Epoxy-coated end seal.

Table 1-1 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	( $\mu$ F)	(V.DC)	(mm)	( $\mu$ A)	(Tan $\delta$ )	(mA)
SE006M0047A2F-0511	47	6.3	5X11	6	0.26	60
SE006M0047B2F-0511	47	6.3	5X11	6	0.26	60
SE006M0047AZF-0511	47	6.3	5X11	6	0.26	60
SE006M0047A5F-0511	47	6.3	5X11	6	0.26	60
SE006M0068A2F-0511	68	6.3	5X11	7	0.26	75
SE006M0068B2F-0511	68	6.3	5X11	7	0.26	75
SE006M0068AZF-0511	68	6.3	5X11	7	0.26	75
SE006M0068A5F-0511	68	6.3	5X11	7	0.26	75
SE006M0100A2F-0511	100	6.3	5X11	9	0.26	100
SE006M0100B2F-0511	100	6.3	5X11	9	0.26	100
SE006M0100AZF-0511	100	6.3	5X11	9	0.26	100
SE006M0100A5F-0511	100	6.3	5X11	9	0.26	100
SE006M0150A2F-0511	150	6.3	5X11	12	0.26	120
SE006M0150B2F-0511	150	6.3	5X11	12	0.26	120
SE006M0150AZF-0511	150	6.3	5X11	12	0.26	120
SE006M0150A5F-0511	150	6.3	5X11	12	0.26	120
SE006M0220A2F-0511	220	6.3	5X11	17	0.26	140
SE006M0220B2F-0511	220	6.3	5X11	17	0.26	140
SE006M0220AZF-0511	220	6.3	5X11	17	0.26	140
SE006M0220A5F-0511	220	6.3	5X11	17	0.26	140
SE006M0220AZF-0611	220	6.3	6.3X11	17	0.26	165
SE006M0220BZF-0611	220	6.3	6.3X11	17	0.26	165
SE006M0220A5F-0611	220	6.3	6.3X11	17	0.26	165
SE006M0330AZF-0611	330	6.3	6.3X11	24	0.24	160
SE006M0330BZF-0611	330	6.3	6.3X11	24	0.24	160
SE006M0330A5F-0611	330	6.3	6.3X11	24	0.24	160
SE006M0330A3F-0811	330	6.3	8X11	24	0.26	200
SE006M0330B3F-0811	330	6.3	8X11	24	0.26	200
SE006M0330A5F-0811	330	6.3	8X11	24	0.26	200
SE006M0470AZF-0611	470	6.3	6.3X11	33	0.26	220
SE006M0470BZF-0611	470	6.3	6.3X11	33	0.26	220
SE006M0470A5F-0611	470	6.3	6.3X11	33	0.26	220
SE006M0470A3F-0811	470	6.3	8X11	33	0.26	280
SE006M0470B3F-0811	470	6.3	8X11	33	0.26	280
SE006M0470A5F-0811	470	6.3	8X11	33	0.26	280
SE006M0680A3F-0811	680	6.3	8X11	46	0.26	320
SE006M0068B3F-0811	680	6.3	8X11	46	0.26	320
SE006M0680A5F-0811	680	6.3	8X11	46	0.26	320
SE006M0680A5S-1012	680	6.3	10X12	45	0.26	320
SE006M0680B5S-1012	680	6.3	10X12	45	0.26	320
SE006M1000A3F-0811	1000	6.3	8X11	66	0.26	370
SE006M1000B3F-0811	1000	6.3	8X11	66	0.26	370
SE006M1000A5F-0811	1000	6.3	8X11	66	0.26	370
SE006M1000A5S-1012	1000	6.3	10X12	66	0.26	470
SE006M1000B5S-1012	1000	6.3	10X12	66	0.26	470
SE006M1500A5S-1015	1500	6.3	10X15	98	0.26	600
SE006M1500B5S-1015	1500	6.3	10X15	98	0.26	600
SE006M2200A5S-1019	2200	6.3	10X19.5	142	0.28	740
SE006M2200B5S-1019	2200	6.3	10X19.5	142	0.28	740
SE006M2200A5S-1320	2200	6.3	13X20	142	0.28	930
SE006M2200B5S-1320	2200	6.3	13X20	142	0.28	930

Table 1-2 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	( $\mu$ F)	(V.DC)	(mm)	( $\mu$ A)	(Tan $\delta$ )	(mA)
SE006M4700A5S-1325	4700	6.3	13X25	299	0.32	1100
SE006M4700B5S-1325	4700	6.3	13X25	299	0.32	1100
SE006M4700B7F-1625	4700	6.3	16X25	299	0.32	1320
SE006M6800A5S-1325	6800	6.3	13X25	431	0.36	1250
SE006M6800B5S-1325	6800	6.3	13X25	431	0.36	1250
SE006M6800B7F-1625	6800	6.3	16X25	431	0.36	1490
SE006M10K0B7F-1625	10000	6.3	16X25	633	0.44	1560
SE006M10K0B7F-1632	10000	6.3	16X32	633	0.44	1830
SE006M15K0B7F-1836	15000	6.3	18X36	948	0.54	2280
SE010M0022A2F-0511	22	10	5X11	5	0.22	45
SE010M0022B2F-0511	22	10	5X11	5	0.22	45
SE010M0022AZF-0511	22	10	5X11	5	0.22	45
SE010M0022A5F-0511	22	10	5X11	5	0.22	45
SE010M0033A2F-0511	33	10	5X11	6	0.22	60
SE010M0033B2F-0511	33	10	5X11	6	0.22	60
SE010M0033AZF-0511	33	10	5X11	6	0.22	60
SE010M0033A5F-0511	33	10	5X11	6	0.22	60
SE010M0047A2F-0511	47	10	5X11	8	0.22	75
SE010M0047B2F-0511	47	10	5X11	8	0.22	75
SE010M0047AZF-0511	47	10	5X11	8	0.22	75
SE010M0047A5F-0511	47	10	5X11	8	0.22	75
SE010M0068A2F-0511	68	10	5X11	10	0.22	80
SE010M0068B2F-0511	68	10	5X11	10	0.22	80
SE010M0068AZF-0511	68	10	5X11	10	0.22	80
SE010M0068A5F-0511	68	10	5X11	10	0.22	80
SE010M0100A2F-0511	100	10	5X11	13	0.22	110
SE010M0100B2F-0511	100	10	5X11	13	0.22	110
SE010M0100AZF-0511	100	10	5X11	13	0.22	110
SE010M0100A5F-0511	100	10	5X11	13	0.22	110
SE010M0100AZF-0611	100	10	6.3X11	13	0.22	135
SE010M0100BZF-0611	100	10	6.3X11	13	0.22	135
SE010M0100A5F-0611	100	10	6.3X11	13	0.22	135
SE010M0150AZF-0611	150	10	6.3X11	18	0.22	130
SE010M0150BZF-0611	150	10	6.3X11	18	0.22	130
SE010M0150A5F-0611	150	10	6.3X11	18	0.22	130
SE010M0220AZF-0611	220	10	6.3X11	25	0.22	180
SE010M0220BZF-0611	220	10	6.3X11	25	0.22	180
SE010M0220A5F-0611	220	10	6.3X11	25	0.22	180
SE010M0330AZF-0611	330	10	6.3X11	36	0.22	205
SE010M0330BZF-0611	330	10	6.3X11	36	0.22	205
SE010M0330A5F-0611	330	10	6.3X11	36	0.22	205
SE010M0330A3F-0811	330	10	8X11	36	0.22	255
SE010M0330B3F-0811	330	10	8X11	36	0.22	255
SE010M0330A5F-0811	330	10	8X11	36	0.22	255
SE010M0470AZF-0611	470	10	6.3X11	50	0.22	245
SE010M0470BZF-0611	470	10	6.3X11	50	0.22	245
SE010M0470A5F-0611	470	10	6.3X11	50	0.22	245
SE010M0470A3F-0811	470	10	8X11	50	0.22	305
SE010M0470B3F-0811	470	10	8X11	50	0.22	305
SE010M0470B5F-0811	470	10	8X11	50	0.22	305
SE010M0680A3F-0811	680	10	8X11	71	0.22	335

Table 1-3 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	( $\mu$ F)	(V.DC)	(mm)	( $\mu$ A)	(Tan $\delta$ )	(mA)
SE010M0680B3F-0811	680	10	8X11	71	0.22	335
SE010M0680A5F-0811	680	10	8X11	71	0.22	335
SE010M0680A3F-0815	680	10	8X15	71	0.22	385
SE010M0680B3F-0815	680	10	8X15	71	0.22	385
SE010M0680A5F-0815	680	10	8X15	71	0.22	385
SE010M0680A5S-1012	680	10	10X12	71	0.22	420
SE010M0680B5S-1012	680	10	10X12	71	0.22	420
SE010M1000A3F-0811	1000	10	8X11	103	0.22	410
SE010M1000B3F-0811	1000	10	8X11	103	0.22	410
SE010M1000A5F-0811	1000	10	8X11	103	0.22	410
SE010M1000A3F-0815	1000	10	8X15	103	0.22	470
SE010M1000B3F-0815	1000	10	8X15	103	0.22	470
SE010M1000A5F-0815	1000	10	8X15	103	0.22	470
SE010M1000A5S-1012	1000	10	10X12	103	0.22	490
SE010M1000A5S-1012	1000	10	10X12	103	0.22	490
SE010M1000A5S-1015	1000	10	10X15	103	0.22	570
SE010M1000B5S-1015	1000	10	10X15	103	0.22	570
SE010M1500A5S-1019	1500	10	10X19.5	153	0.22	750
SE010M1500B5S-1019	1500	10	10X19.5	153	0.22	750
SE010M2200A5S-1019	2200	10	10X19.5	223	0.24	800
SE010M2200B5S-1019	2200	10	10X19.5	223	0.24	800
SE010M2200A5S-1320	2200	10	13X20	223	0.24	1010
SE010M2200B5S-1320	2200	10	13X20	223	0.24	1010
SE010M3300A5S-1320	3300	10	13X20	333	0.26	1050
SE010M3300B5S-1320	3300	10	13X20	333	0.26	1050
SE010M3300A5S-1325	3300	10	13X25	333	0.26	1220
SE010M3300B5S-1325	3300	10	13X25	333	0.26	1220
SE010M3300A5S-1025	3300	10	10X25	333	0.26	950
SE010M3300B5S-1025	3300	10	10X25	333	0.26	950
SE010M3300A5S-1030	3300	10	10X30	333	0.26	1090
SE010M3300B5S-1030	3300	10	10X30	333	0.26	1090
SE010M4700A5S-1325	4700	10	13X25	473	0.28	1190
SE010M4700A5S-1325	4700	10	13X25	473	0.28	1190
SE010M4700B5S-1325	4700	10	13X25	473	0.28	1190
SE010M4700B7F-1625	4700	10	16X25	473	0.28	1410
SE010M6800B7F-1625	6800	10	16X25	683	0.32	1370
SE010M6800B7F-1632	6800	10	16X32	683	0.32	1610
SE010M10K0B7F-1636	10000	10	16X36	1003	0.40	1760
SE010M10K0B7F-1836	10000	10	18X36	1003	0.40	1980
SE010M15K0B7F-1840	10000	10	18X40	1503	0.50	1960
SE016M0010A2F-0511	10	16	5X11	5	0.18	25
SE016M0010B2F-0511	10	16	5X11	5	0.18	25
SE016M0010AZF-0511	10	16	5X11	5	0.18	25
SE016M0010A5F-0511	10	16	5X11	5	0.18	25
SE016M0015A2F-0511	15	16	5X11	5	0.18	40
SE016M0015B2F-0511	15	16	5X11	5	0.18	40
SE016M0015AZF-0511	15	16	5X11	5	0.18	40
SE016M0015A5F-0511	15	16	5X11	5	0.18	40
SE016M0022A2F-0511	22	16	5X11	7	0.18	55
SE016M0022B2F-0511	22	16	5X11	7	0.18	55
SE016M0022AZF-0511	22	16	5X11	7	0.18	55

Table 1-4 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	( $\mu$ F)	(V.DC)	(mm)	( $\mu$ A)	(Tan $\delta$ )	(mA)
SE016M0022A5F-0511	22	16	5X11	7	0.18	55
SE016M0033A2F-0511	33	16	5X11	8	0.18	70
SE016M0033B2F-0511	33	16	5X11	8	0.18	70
SE016M0033AZF-0511	33	16	5X11	8	0.18	70
SE016M0033A5F-0511	33	16	5X11	8	0.18	70
SE016M0047A2F-0511	47	16	5X11	11	0.18	85
SE016M0068B2F-0511	68	16	5X11	14	0.18	100
SE016M0068AZF-0511	68	16	5X11	14	0.18	100
SE016M0068A5F-0511	68	16	5X11	14	0.18	100
SE016M0100A2F-0511	68	16	5X11	14	0.18	100
SE016M0100B2F-0511	68	16	5X11	14	0.18	100
SE016M0100AZF-0511	68	16	5X11	14	0.18	100
SE016M0100A5F-0511	68	16	5X11	14	0.18	100
SE016M0100AZF-0611	100	16	6.3X11	19	0.18	135
SE016M0100BZF-0611	100	16	6.3X11	19	0.18	135
SE016M0100A5F-0611	100	16	6.3X11	19	0.18	135
SE016M0150A3F-0811	150	16	8X11	27	0.18	180
SE016M0150B3F-0811	150	16	8X11	27	0.18	180
SE016M0150A5F-0811	150	16	8X11	27	0.18	180
SE016M0220AZF-0611	220	16	6.3X11	38	0.18	180
SE016M0220BZF-0611	220	16	6.3X11	38	0.18	180
SE016M0220A5F-0611	220	16	6.3X11	38	0.18	180
SE016M0220A3F-0811	220	16	8X11	38	0.18	235
SE016M0220B3F-0811	220	16	8X11	38	0.18	235
SE016M0220A5F-0811	220	16	8X11	38	0.18	235
SE016M0330A3F-0811	330	16	8X11	56	0.18	285
SE016M0330B3F-0811	330	16	8X11	56	0.18	285
SE016M0330A5F-0811	330	16	8X11	56	0.18	285
SE016M0470A3F-0811	470	16	8X11	78	0.18	310
SE016M0470B3F-0811	470	16	8X11	78	0.18	310
SE016M0470A5F-0811	470	16	8X11	78	0.18	310
SE016M0470A5S-1012	470	16	10X12	78	0.18	395
SE016M0470B5S-1012	470	16	10X12	78	0.18	395
SE016M0680A5F-1012	680	16	10X12	112	0.18	455
SE016M0680B8F-1012	680	16	10X12	112	0.18	455
SE016M0680A5S-1015	680	16	10X15	112	0.18	530
SE016M0680B5S-1015	680	16	10X15	112	0.18	530
SE016M1000A3F-0820	1000	16	8X20	163	0.18	600
SE016M1000B3F-0820	1000	16	8X20	163	0.18	600
SE016M1000A5F-0820	1000	16	8X20	163	0.18	600
SE016M1000A5S-1015	1000	16	10X15	163	0.18	590
SE016M1000B5S-1015	1000	16	10X15	163	0.18	590
SE016M1000A5S-1019	1000	16	10X19.5	163	0.18	700
SE016M1000B5S-1019	1000	16	10X19.5	163	0.18	700
SE016M1500A5S-1019	1500	16	10X19.5	243	0.18	680
SE016M1500B5S-1019	1500	16	10X19.5	243	0.18	680
SE016M1500A5S-1320	1500	16	13X20	243	0.18	860
SE016M1500B5S-1320	1500	16	13X20	243	0.18	860
SE016M2200A5S-1025	2200	16	10X25	355	0.20	895
SE016M2200B5S-1025	2200	16	10X25	355	0.20	895
SE016M2200A5S-1325	2200	16	13X25	355	0.20	1040

Table 1-5 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE016M2200B5S-1325	2200	16	13X25	355	0.20	1040
SE016M2200A5S-1320	2200	16	13X20	355	0.20	990
SE016M2200B5S-1320	2200	16	13X20	355	0.20	990
SE016M2200A5S-1325	2200	16	13X25	355	0.20	1150
SE016M2200B5S-1325	2200	16	13X25	355	0.20	1150
SE016M3300A5S-1325	3300	16	13X25	531	0.22	1140
SE016M3300B5S-1325	3300	16	13X25	531	0.22	1140
SE016M3300B7F-1625	3300	16	16X25	531	0.22	1350
SE016M4700B7F-1625	4700	16	16X25	755	0.24	1330
SE016M4700B7F-1632	4700	16	16X32	755	0.24	1560
SE016M6800B7F-1636	6800	16	16X36	1091	0.28	1590
SE016M6800B7F-1640	6800	16	16X40	1091	0.28	1670
SE016M6800B7F-1836	6800	16	18X36	1091	0.28	1790
SE016M10K0B7F-1836	10000	16	18X36	1603	0.36	2100
SE025M4R70A2F-0511	4.7	25	5X11	4	0.16	20
SE025M4R70B2F-0511	4.7	25	5X11	4	0.16	20
SE025M4R70AZF-0511	4.7	25	5X11	4	0.16	20
SE025M4R70A5F-0511	4.7	25	5X11	4	0.16	20
SE025M6R80A2F-0511	6.8	25	5X11	5	0.16	25
SE025M6R80B2F-0511	6.8	25	5X11	5	0.16	25
SE025M6R80AZF-0511	6.8	25	5X11	5	0.16	25
SE025M6R80A5F-0511	6.8	25	5X11	5	0.16	25
SE025M0010A2F-0511	6.8	25	5X11	5	0.16	25
SE025M0010B2F-0511	6.8	25	5X11	5	0.16	25
SE025M0010AZF-0511	6.8	25	5X11	5	0.16	25
SE025M0010A5F-0511	6.8	25	5X11	5	0.16	25
SE025M0015A2F-0511	15	25	5X11	7	0.16	45
SE025M0015B2F-0511	15	25	5X11	7	0.16	45
SE025M0015AZF-0511	15	25	5X11	7	0.16	45
SE025M0015A5F-0511	15	25	5X11	7	0.16	45
SE025M0022A2F-0511	22	25	5X11	9	0.16	60
SE025M0022B2F-0511	22	25	5X11	9	0.16	60
SE025M0022AZF-0511	22	25	5X11	9	0.16	60
SE025M0022A5F-0511	22	25	5X11	9	0.16	60
SE025M0033A2F-0511	33	25	5X11	11	0.16	75
SE025M0033B2F-0511	33	25	5X11	11	0.16	75
SE025M0033AZF-0511	33	25	5X11	11	0.16	75
SE025M0033A5F-0511	33	25	5X11	11	0.16	75
SE025M0047A2F-0511	47	25	5X11	15	0.16	90
SE025M0047B2F-0511	47	25	5X11	15	0.16	90
SE025M0047AZF-0511	47	25	5X11	15	0.16	90
SE025M0047A5F-0511	47	25	5X11	15	0.16	90
SE025M0068AZF-0611	68	25	6.3X11	20	0.16	125
SE025M0068BZF-0611	68	25	6.3X11	20	0.16	125
SE025M0068A5F-0611	68	25	6.3X11	20	0.16	125
SE025M0100AZF-0611	100	25	6.3X11	28	0.16	145
SE025M0100BZF-0611	100	25	6.3X11	28	0.16	145
SE025M0100A5F-0611	100	25	6.3X11	28	0.16	145
SE025M0150A3F-0811	150	25	8X11	41	0.16	200
SE025M0150B3F-0811	150	25	8X11	41	0.16	200

Table 1-6 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	( $\mu$ F)	(V.DC)	(mm)	( $\mu$ A)	(Tan $\delta$ )	(mA)
SE025M0150A5F-0811	150	25	8X11	41	0.16	200
SE025M0220A3F-0811	220	25	8X11	58	0.16	200
SE025M0220B3F-0811	220	25	8X11	58	0.16	200
SE025M0220A5F-0811	220	25	8X11	58	0.16	200
SE025M0220A5S-1012	220	25	10X12	58	0.16	250
SE025M0220B5S-1012	220	25	10X12	58	0.16	250
SE025M0330A3F-0811	330	25	8X11	86	0.16	265
SE025M0330B3F-0811	330	25	8X11	86	0.16	265
SE025M0330A5F-0811	330	25	8X11	86	0.16	265
SE025M0330A3F-0815	330	25	8X15	86	0.16	320
SE025M0330B3F-0815	330	25	8X15	86	0.16	320
SE025M0330A5F-0815	330	25	8X15	86	0.16	320
SE025M0330A5S-1012	330	25	10X12	86	0.16	365
SE025M0330B5S-1012	330	25	10X12	86	0.16	365
SE025M0470A3F-0815	470	25	8X15	120	0.16	365
SE025M0470B3F-0815	470	25	8X15	120	0.16	365
SE025M0470A5F-0815	470	25	8X15	120	0.16	365
SE025M0470A5S-1012	470	25	10X12	120	0.16	400
SE025M0470B5S-1012	470	25	10X12	120	0.16	400
SE025M0470A5S-1015	470	25	10X15	120	0.16	470
SE025M0470B5S-1015	470	25	10X12	120	0.16	400
SE025M0680A5S-1019	680	25	10X19.5	173	0.16	650
SE025M0047B5S-1019	470	25	10X19.5	120	0.16	400
SE025M1000A5S-1019	1000	25	10X19.5	253	0.16	680
SE025M1000B5S-1019	1000	25	10X19.5	253	0.16	680
SE025M1000A5S-1320	1000	25	13X20	253	0.16	855
SE025M1000B5S-1320	1000	25	13X20	253	0.16	855
SE025M1500A5S-1325	1500	25	13X25	378	0.16	1020
SE025M1500B5S-1325	1500	25	13X25	378	0.16	1020
SE025M2200A7F-1325	2200	25	13X25	553	0.18	1030
SE025M2200B7F-1325	2200	25	13X25	553	0.18	1030
SE025M2200B7F-1625	2200	25	16X25	553	0.18	1230
SE025M3300A5S-1325	3300	25	13X25	828	0.20	1035
SE025M3300B5S-1325	3300	25	13X25	828	0.20	1035
SE025M3300B7F-1625	3300	25	16X25	828	0.20	1230
SE025M3300B7F-1632	3300	25	16X32	828	0.20	1450
SE025M4700B7F-1632	4700	25	16X32	1178	0.22	1420
SE025M4700B7F-1836	6800	25	18X36	1703	0.26	1850
SE035M4R70A2F-0511	4.7	35	5X11	5	0.14	25
SE035M4R70B2F-0511	4.7	35	5X11	5	0.14	25
SE035M4R70AZF-0511	4.7	35	5X11	5	0.14	25
SE035M4R70A5F-0511	4.7	35	5X11	5	0.14	25
SE035M6R80A2F-0511	6.8	35	5X11	5	0.14	30
SE035M6R80B2F-0511	6.8	35	5X11	5	0.14	30
SE035M6R80AZF-0511	6.8	35	5X11	5	0.14	30
SE035M6R80A5F-0511	6.8	35	5X11	5	0.14	30
SE035M0010A2F-0511	10	35	5X11	7	0.14	40
SE035M0010B2F-0511	10	35	5X11	7	0.14	40
SE035M0010AZF-0511	10	35	5X11	7	0.14	40
SE035M0010A5F-0511	10	35	5X11	7	0.14	40
SE035M0015A2F-0511	15	35	5X11	8	0.14	50

Table 1-7 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE035M0015B2F-0511	15	35	5X11	8	0.14	50
SE035M0015AZF-0511	15	35	5X11	8	0.14	50
SE035M0015A5F-0511	15	35	5X11	8	0.14	50
SE035M0022A2F-0511	22	35	5X11	11	0.14	65
SE035M0022B2F-0511	22	35	5X11	11	0.14	65
SE035M0022AZF-0511	22	35	5X11	11	0.14	65
SE035M0022A5F-0511	22	35	5X11	11	0.14	65
SE035M0033A2F-0511	33	35	5X11	15	0.14	85
SE035M0033B2F-0511	33	35	5X11	15	0.14	85
SE035M0033AZF-0511	33	35	5X11	15	0.14	85
SE035M0033A5F-0511	33	35	5X11	15	0.14	85
SE035M0047A2F-0511	47	35	5X11	19	0.14	95
SE035M0047B2F-0511	47	35	5X11	19	0.14	95
SE035M0047AZF-0511	47	35	5X11	19	0.14	95
SE035M0047A5F-0511	47	35	5X11	19	0.14	95
SE035M0047AZF-0611	47	35	6.3X11	19	0.14	115
SE035M0047BZF-0611	47	35	6.3X11	19	0.14	115
SE035M0047A5F-0611	47	35	6.3X11	19	0.14	115
SE035M0068A3F-0811	68	35	8X11	27	0.14	130
SE035M0068B3F-0811	68	35	8X11	27	0.14	130
SE035M0068A5F-0811	68	35	8X11	27	0.14	130
SE035M0100AZF-0611	100	35	6.3X11	38	0.14	150
SE035M0100BZF-0611	100	35	6.3X11	38	0.14	150
SE035M0100A5F-0611	100	35	6.3X11	38	0.14	150
SE035M0100A3F-0811	100	35	8X11	38	0.14	190
SE035M0100B3F-0811	100	35	8X11	38	0.14	190
SE035M0100A5F-0811	100	35	8X11	38	0.14	190
SE035M0150A5S-1012	150	35	10X12	56	0.14	240
SE035M0150B8S-1012	150	35	10X12	56	0.14	240
SE035M0220A3F-0811	220	35	8X11	80	0.14	230
SE035M0220B3F-0811	220	35	8X11	80	0.14	230
SE035M0220A5F-0811	220	35	8X11	80	0.14	230
SE035M0220A3F-0815	220	35	8X15	80	0.14	280
SE035M0220B3F-0815	220	35	8X15	80	0.14	280
SE035M0220A5F-0815	220	35	8X15	80	0.14	280
SE035M0220A5S-1012	220	35	10X12	80	0.14	315
SE035M0220B5S-1012	220	35	10X12	80	0.14	315
SE035M0330A3F-0815	330	35	8X15	119	0.14	345
SE035M0330B3F-0815	330	35	8X15	119	0.14	345
SE035M0330A5F-0815	330	35	8X15	119	0.14	345
SE035M0330A3F-0820	330	35	8X20	119	0.14	420
SE035M0330B3F-0820	330	35	8X20	119	0.14	420
SE035M0330A5F-0820	330	35	8X20	119	0.14	420
SE035M0330A5S-1012	330	35	10X12	119	0.14	380
SE035M0330B5S-1012	330	35	10X12	119	0.14	380
SE035M0330A5S-1015	330	35	10X15	119	0.14	440
SE035M0330B5S-1015	330	35	10X15	119	0.14	440
SE035M0470A5S-1015	470	35	10X15	168	0.14	420
SE035M0470B5S-1015	470	35	10X15	168	0.14	420
SE035M0470A5S-1019	470	35	10X19.5	168	0.14	490

Table 1-8 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE035M0470B5S-1019	470	35	10X19.5	168	0.14	490
SE035M0470A5S-1320	470	35	13X20	168	0.14	580
SE035M0470B5S-1320	470	35	13X20	168	0.14	580
SE035M0680A5S-1320	680	35	13X20	241	0.14	730
SE035M0680B5S-1320	680	35	13X20	241	0.14	730
SE035M1000A5S-1320	1000	35	13X20	353	0.14	850
SE035M1500B7F-1625	1500	35	16X25	528	0.14	1110
SE035M2200B7F-1625	2200	35	16X25	773	0.16	1230
SE035M2200B7F-1632	2200	35	16X32	773	0.16	1450
SE035M3300B7F-1636	3300	35	16X36	1158	0.18	1470
SE035M3300B7F-1836	3300	35	18X36	1158	0.18	1660
SE035M4700B7F-1836	4700	35	18X36	1648	0.20	1580
SE035M4700B7F-1840	4700	35	18X40	1648	0.20	1750
SE035M6800BPF-2240	6800	35	22X40	2383	0.24	1885
SE050M0R47A2F-0511	0.47	50	5X11	3	0.12	7
SE050M0R47B2F-0511	0.47	50	5X11	3	0.12	7
SE050M0R47AZF-0511	0.47	50	5X11	3	0.12	7
SE050M0R47A5F-0511	0.47	50	5X11	3	0.12	7
SE050M0R68A2F-0511	0.68	50	5X11	3	0.12	7
SE050M0R68B2F-0511	0.68	50	5X11	3	0.12	7
SE050M0R68AZF-0511	0.68	50	5X11	3	0.12	7
SE050M0R68A5F-0511	0.68	50	5X11	3	0.12	7
SE050M1R00A2F-0511	1	50	5X11	4	0.12	12
SE050M1R00B2F-0511	1	50	5X11	4	0.12	12
SE050M1R00AZF-0511	1	50	5X11	4	0.12	12
SE050M1R00A5F-0511	1	50	5X11	4	0.12	12
SE050M2R20A2F-0511	2.2	50	5X11	4	0.12	18
SE050M2R20B2F-0511	2.2	50	5X11	4	0.12	18
SE050M2R20AZF-0511	2.2	50	5X11	4	0.12	18
SE050M2R20A5F-0511	2.2	50	5X11	4	0.12	18
SE050M3R30A2F-0511	3.3	50	5X11	5	0.12	25
SE050M3R30B2F-0511	3.3	50	5X11	5	0.12	25
SE050M3R30AZF-0511	3.3	50	5X11	5	0.12	25
SE050M3R30A5F-0511	3.3	50	5X11	5	0.12	25
SE050M4R70A2F-0511	4.7	50	5X11	5	0.12	30
SE050M4R70B2F-0511	4.7	50	5X11	5	0.12	30
SE050M4R70AZF-0511	4.7	50	5X11	5	0.12	30
SE050M4R70A5F-0511	4.7	50	5X11	5	0.12	30
SE050M6R80A2F-0511	6.8	50	5X11	6	0.12	32
SE050M6R80B2F-0511	6.8	50	5X11	6	0.12	32
SE050M6R80AZF-0511	6.8	50	5X11	6	0.12	32
SE050M6R80A5F-0511	6.8	50	5X11	6	0.12	32
SE050M0010A2F-0511	10	50	5X11	8	0.12	50
SE050M0010B2F-0511	10	50	5X11	8	0.12	50
SE050M0010AZF-0511	10	50	5X11	8	0.12	50
SE050M0010A5F-0511	10	50	5X11	8	0.12	50
SE050M0015A2F-0511	15	50	5X11	11	0.12	60
SE050M0015B2F-0511	15	50	5X11	11	0.12	60
SE050M0015AZF-0511	15	50	5X11	11	0.12	60
SE050M0015A5F-0511	15	50	5X11	11	0.12	60

Table 1-9 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE050M0022A2F-0511	22	50	5X11	14	0.12	75
SE050M0022B2F-0511	22	50	5X11	14	0.12	75
SE050M0022AZF-0511	22	50	5X11	14	0.12	75
SE050M0022A5F-0511	22	50	5X11	14	0.12	75
SE050M0033AZF-0611	33	50	6.3X11	20	0.12	105
SE050M0033BZF-0611	33	50	6.3X11	20	0.12	105
SE050M0033A5F-0611	33	50	6.3X11	20	0.12	105
SE050M0047AZF-0611	47	50	6.3X11	27	0.12	100
SE050M0047BZF-0611	47	50	6.3X11	27	0.12	100
SE050M0047A5F-0611	47	50	6.3X11	27	0.12	100
SE050M0047A3F-0811	47	50	8X11	27	0.12	125
SE050M0047B3F-0811	47	50	8X11	27	0.12	125
SE050M0047A5F-0811	47	50	8X11	27	0.12	125
SE050M0068A3F-0811	68	50	8X11	37	0.12	159
SE050M0068B3F-0811	68	50	8X11	37	0.12	159
SE050M0068A5F-0811	68	50	8X11	37	0.12	159
SE050M0100A3F-0811	100	50	8X11	53	0.12	160
SE050M0100B3F-0811	100	50	8X11	53	0.12	160
SE050M0100A5F-0811	100	50	8X11	53	0.12	160
SE050M0100A5S-1012	100	50	10X12	53	0.12	210
SE050M0100B5S-1012	100	50	10X12	53	0.12	210
SE050M0150A5S-1012	150	50	10X12	78	0.12	280
SE050M0150B5S-1012	150	50	10X12	78	0.12	280
SE050M0220A5S-1015	220	50	10X15	113	0.12	400
SE050M0220B5S-1015	220	50	10X15	113	0.12	400
SE050M0330A5S-1015	330	50	10X15	168	0.12	450
SE050M0330B5S-1015	330	50	10X15	168	0.12	450
SE050M0330A5S-1019	330	50	10X19.5	168	0.12	535
SE050M0330B5S-1019	330	50	10X19.5	168	0.12	535
SE050M0470A5S-1019	470	50	10X19.5	238	0.12	580
SE050M0470B5S-1019	470	50	10X19.5	238	0.12	580
SE050M0470A5S-1320	470	50	13X20	238	0.12	730
SE050M0470B5S-1320	470	50	13X20	238	0.12	730
SE050M0680A5S-1325	680	50	13X25	343	0.12	860
SE050M0680B5S-1325	680	50	13X25	343	0.12	860
SE050M1000A5S-1325	1000	50	13X25	503	0.12	930
SE050M1000B5S-1325	1000	50	13X25	503	0.12	930
SE050M1000B7F-1625	1000	50	16X25	503	0.12	1110
SE050M1500B7F-1632	1500	50	16X32	753	0.12	1350
SE050M2200B7F-1632	2200	50	16X32	1122	0.14	1226
SE050M2200B7F-1636	2200	50	16X36	1103	0.14	1360
SE050M2200B7F-1836	2200	50	18X36	1103	0.14	1530
SE050M3300B7F-1836	3300	50	18X36	1653	0.16	1540
SE050M3300B7F-1840	3300	50	18X40	1653	0.16	1700
SE050M4700BPF-2235	4700	50	22X35	2353	0.18	1900
SE063M0R47A2F-0511	0.47	63	5X11	3	0.10	8
SE063M0R47B2F-0511	0.47	63	5X11	3	0.10	8
SE063M0R47AZF-0511	0.47	63	5X11	3	0.10	8
SE063M0R47A5F-0511	0.47	63	5X11	3	0.10	8
SE063M1R00A2F-0511	1	63	5X11	4	0.10	13
SE063M1R00B2F-0511	1	63	5X11	4	0.10	13
SE063M1R00AZF-0511	1	63	5X11	4	0.10	13

Table 1-10 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE063M1R00A5F-0511	1	63	5X11	4	0.10	13
SE063M2R20A2F-0511	2.2	63	5X11	4	0.10	20
SE063M2R20B2F-0511	2.2	63	5X11	4	0.10	20
SE063M2R20AZF-0511	2.2	63	5X11	4	0.10	20
SE063M2R20A5F-0511	2.2	63	5X11	4	0.10	20
SE063M3R30A2F-0511	3.3	63	5X11	5	0.10	27
SE063M3R30B2F-0511	3.3	63	5X11	5	0.10	27
SE063M3R30AZF-0511	3.3	63	5X11	5	0.10	27
SE063M3R30A5F-0511	3.3	63	5X11	5	0.10	27
SE063M4R70A2F-0511	4.7	63	5X11	6	0.10	34
SE063M4R70B2F-0511	4.7	63	5X11	6	0.10	34
SE063M4R70AZF-0511	4.7	63	5X11	6	0.10	34
SE063M4R70A5F-0511	4.7	63	5X11	6	0.10	34
SE063M6R80A2F-0511	6.8	63	5X11	7	0.10	37
SE063M6R80B2F-0511	6.8	63	5X11	7	0.10	37
SE063M6R80AZF-0511	6.8	63	5X11	7	0.10	37
SE063M6R80A5F-0511	6.8	63	5X11	7	0.10	37
SE063M0010A2F-0511	10	63	5X11	9	0.10	55
SE063M0010B2F-0511	10	63	5X11	9	0.10	55
SE063M0010AZF-0511	10	63	5X11	9	0.10	55
SE063M0010A5F-0511	10	63	5X11	9	0.10	55
SE063M0015A2F-0511	15	63	5X11	12	0.10	65
SE063M0015B2F-0511	15	63	5X11	12	0.10	65
SE063M0015AZF-0511	15	63	5X11	12	0.10	65
SE063M0015A5F-0511	15	63	5X11	12	0.10	65
SE063M0022AZF-0611	22	63	6.3X11	17	0.10	90
SE063M0022BZF-0611	22	63	6.3X11	17	0.10	90
SE063M0022A5F-0611	22	63	6.3X11	17	0.10	90
SE063M0033AZF-0611	33	63	6.3X11	24	0.10	110
SE063M0033BZF-0611	33	63	6.3X11	24	0.10	110
SE063M0033A5F-0611	33	63	6.3X11	24	0.10	110
SE063M0033A3F-0811	33	63	8X11	24	0.10	120
SE063M0033B3F-0811	33	63	8X11	24	0.10	120
SE063M0033A5F-0811	33	63	8X11	24	0.10	120
SE063M0047A3F-0811	47	63	8X11	33	0.10	155
SE063M0047B3F-0811	47	63	8X11	33	0.10	155
SE063M0047A5F-0811	47	63	8X11	33	0.10	155
SE063M0068A5S-1012	68	63	10X12	46	0.10	198
SE063M0068B5S-1012	68	63	10X12	46	0.10	198
SE063M0100A3F-0815	100	63	8X15	66	0.10	230
SE063M0100B3F-0815	100	63	8X15	66	0.10	230
SE063M0100A5F-0815	100	63	8X15	66	0.10	230
SE063M0100A5S-1012	100	63	10X12	66	0.10	260
SE063M0100B5S-1012	100	63	10X12	66	0.10	260
SE063M0150A5S-1015	150	63	10X15	98	0.10	330
SE063M0150B5S-1015	150	63	10X15	98	0.10	330
SE063M0220A5S-1015	220	63	10X15	142	0.10	400
SE063M0220B5S-1015	220	63	10X15	142	0.10	400
SE063M0220A5S-1019	220	63	10X19.5	142	0.10	465
SE063M0220B5S-1019	220	63	10X19.5	142	0.10	465

Table 1-11 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	( $\mu$ F)	(V.DC)	(mm)	( $\mu$ A)	(Tan $\delta$ )	(mA)
SE063M0330A5S-1019	330	63	10X19.5	211	0.10	520
SE063M0330B5S-1019	330	63	10X19.5	211	0.10	520
SE063M0330A5S-1320	330	63	13X20	211	0.10	650
SE063M0330B5S-1320	330	63	13X20	211	0.10	650
SE063M0470A5S-1320	470	63	13X20	299	0.10	700
SE063M0470B5S-1320	470	63	13X20	299	0.10	700
SE063M0470A5S-1325	470	63	13X25	299	0.10	800
SE063M0470B5S-1325	470	63	13X25	299	0.10	800
SE063M0680A5S-1325	680	63	13X25	431	0.10	840
SE063M0680B5S-1325	680	63	13X25	431	0.10	840
SE063M0680B7F-1625	680	63	16X25	431	0.10	1000
SE063M1000B7F-1625	1000	63	16X25	633	0.10	1020
SE063M1000B7F-1632	1000	63	16X32	633	0.10	1200
SE063M1500B7F-1632	1500	63	16X32	948	0.10	1300
SE100M2R20A5F-0511	2.2	100	5X11	5	0.10	22
SE100M3R30A2F-0511	3.3	100	5X11	6	0.10	29
SE100M3R30B2F-0511	3.3	100	5X11	6	0.10	29
SE100M3R30AZF-0511	3.3	100	5X11	6	0.10	29
SE100M3R30A5F-0511	3.3	100	5X11	6	0.10	29
SE100M4R70A2F-0511	4.7	100	5X11	8	0.10	37
SE100M4R70B2F-0511	4.7	100	5X11	8	0.10	37
SE100M4R70AZF-0511	4.7	100	5X11	8	0.10	37
SE100M4R70A5F-0511	4.7	100	5X11	8	0.10	37
SE100M6R80A2F-0511	6.8	100	5X11	10	0.10	46
SE100M6R80B2F-0511	6.8	100	5X11	10	0.10	46
SE100M6R80AZF-0511	6.8	100	5X11	10	0.10	46
SE100M6R80A5F-0511	6.8	100	5X11	10	0.10	46
SE100M0010A2F-0511	10	100	5X11	13	0.10	55
SE100M0010B2F-0511	10	100	5X11	13	0.10	55
SE100M0010AZF-0511	10	100	5X11	13	0.10	55
SE100M0010A5F-0511	10	100	5X11	13	0.10	55
SE100M0010AZF-0611	10	100	6.3X11	13	0.10	65
SE100M0010BZF-0611	10	100	6.3X11	13	0.10	65
SE100M0010A5F-0611	10	100	6.3X11	13	0.10	65
SE100M0015A3F-0811	15	100	8X11	18	0.10	82
SE100M0015B3F-0811	15	100	8X11	18	0.10	82
SE100M0015A5F-0811	15	100	8X11	18	0.10	82
SE100M0022A3F-0811	22	100	8X11	25	0.10	115
SE100M0022B3F-0811	22	100	8X11	25	0.10	115
SE100M0022A5F-0811	22	100	8X11	25	0.10	115
SE100M0033A3F-0811	33	100	8X11	36	0.10	120
SE100M0033B3F-0811	33	100	8X11	36	0.10	120
SE100M0033A5F-0811	33	100	8X11	36	0.10	120
SE100M0033A5S-1012	33	100	10X12	36	0.10	160
SE100M0033B5S-1012	33	100	10X12	36	0.10	160
SE100M0047A5S-1012	47	100	10X12	50	0.10	180
SE100M0047B5S-1012	47	100	10X12	50	0.10	180
SE100M0047A5S-1015	47	100	10X15	50	0.10	210
SE100M0047B5S-1015	47	100	10X15	50	0.10	210
SE100M0068A5S-1015	68	100	10X15	71	0.10	241
SE100M0068B5S-1015	68	100	10X15	71	0.10	241
SE100M0100A5S-1019	100	100	10X19.5	103	0.10	385

Table 1-12 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	( $\mu$ F)	(V.DC)	(mm)	( $\mu$ A)	(Tan $\delta$ )	(mA)
SE100M0100B5S-1019	100	100	10X19.5	103	0.10	385
SE100M0150A5S-1325	150	100	13X25	153	0.10	414
SE100M0150B5S-1325	150	100	13X25	153	0.10	414
SE100M0220A5S-1325	220	100	13X25	223	0.10	590
SE100M0220B5S-1325	220	100	13X25	223	0.10	590
SE100M0330A5S-1325	330	100	13X25	333	0.10	600
SE100M0330B5S-1325	330	100	13X25	333	0.10	600
SE100M0330B7F-1625	330	100	16X25	333	0.10	720
SE100M0470B7F-1625	470	100	16X25	473	0.10	740
SE100M0470B7F-1632	470	100	16X32	473	0.10	875
SE100M0680B7F-1636	680	100	16X36	683	0.10	1200
SE100M1000B7F-1840	1000	100	18X40	1003	0.10	1340
SE100M1000BPF-2240	1000	100	22X40	1003	0.10	1500
SE160M0R47A2F-0511	0.47	160	5X11	12	0.15	12
SE160M0R47B2F-0511	0.47	160	5X11	12	0.15	12
SE160M0R47AZF-0511	0.47	160	5X11	12	0.15	12
SE160M0R47A5F-0511	0.47	160	5X11	12	0.15	12
SE160M1R00A2F-0511	1	160	5X11	15	0.15	17
SE160M1R00B2F-0511	1	160	5X11	15	0.15	17
SE160M1R00AZF-0511	1	160	5X11	15	0.15	17
SE160M1R00A5F-0511	1	160	5X11	15	0.15	17
SE160M2R20AZF-0611	2.2	160	6.3X11	21	0.15	25
SE160M2R20BZF-0611	2.2	160	6.3X11	21	0.15	25
SE160M2R20A5F-0611	2.2	160	6.3X11	21	0.15	25
SE160M3R30AZF-0611	3.3	160	6.3X11	26	0.15	30
SE160M3R30BZF-0611	3.3	160	6.3X11	26	0.15	30
SE160M3R30A5F-0611	3.3	160	6.3X11	26	0.15	30
SE160M3R30A3F-0811	3.3	160	8X11	26	0.15	36
SE160M3R30B3F-0811	3.3	160	8X11	26	0.15	36
SE160M3R30A5F-0811	3.3	160	8X11	26	0.15	36
SE160M4R70AZF-0611	4.7	160	6.3X11	33	0.15	34
SE160M4R70BZF-0611	4.7	160	6.3X11	33	0.15	34
SE160M4R70A5F-0611	4.7	160	6.3X11	33	0.15	34
SE160M4R70A3F-0811	4.7	160	8X11	33	0.15	43
SE160M4R70B3F-0811	4.7	160	8X11	33	0.15	43
SE160M4R70A5F-0811	4.7	160	8X11	33	0.15	43
SE160M6R80A5S-1012	6.8	160	10X12	43	0.15	54
SE160M6R80B5S-1012	6.8	160	10X12	43	0.15	54
SE160M0010A3F-0811	10	160	8X11	58	0.15	56
SE160M0010B3F-0811	10	160	8X11	58	0.15	56
SE160M0010A5F-0811	10	160	8X11	58	0.15	56
SE160M0010A5S-1012	10	160	10X12	58	0.15	70
SE160M0010B5S-1012	10	160	10X12	58	0.15	70
SE160M0015A5S-1015	15	160	10X15	82	0.15	90
SE160M0015B5S-1015	15	160	10X15	82	0.15	90
SE160M0022A3F-0820	22	160	8X20	116	0.15	125
SE160M0022B3F-0820	22	160	8X20	116	0.15	125
SE160M0022A5F-0820	22	160	8X20	116	0.15	125
SE160M0022A5S-1015	22	160	10X15	116	0.15	130
SE160M0022B5S-1015	22	160	10X15	116	0.15	130
SE160M0033A5S-1019	33	160	10X19.5	168	0.15	180
SE160M0033B5S-1019	33	160	10X19.5	168	0.15	180

Table 1-13 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE160M0047A5S-1320	47	160	13X20	236	0.15	270
SE160M0047B5S-1320	47	160	13X20	236	0.15	270
SE160M0068A5S-1325	68	160	13X25	336	0.15	300
SE160M0068B5S-1325	68	160	13X25	336	0.15	300
SE160M0100A5S-1325	100	160	13X25	490	0.15	330
SE160M0100B5S-1325	100	160	13X25	490	0.15	330
SE160M0100B7F-1625	100	160	16X25	490	0.15	400
SE160M0150B7F-1632	150	160	16X32	720	0.15	435
SE160M0220B7F-1632	220	160	16X32	1056	0.15	550
SE160M0220B7F-1636	220	160	16X36	1056	0.15	620
SE160M0330B7F-1836	330	160	18X36	1594	0.15	770
SE160M0330B7F-1840	330	160	18X40	1594	0.15	850
SE160M0470BPF-2240	470	160	22X40	2266	0.15	980
SE200M0R47A2F-0511	0.47	200	5X11	13	0.15	14
SE200M0R47B2F-0511	0.47	200	5X11	13	0.15	14
SE200M0R47AZF-0511	0.47	200	5X11	13	0.15	14
SE200M0R47A5F-0511	0.47	200	5X11	13	0.15	14
SE200M1R00A2F-0511	1	200	5X11	16	0.15	19
SE200M1R00B2F-0511	1	200	5X11	16	0.15	19
SE200M1R00AZF-0511	1	200	5X11	16	0.15	19
SE200M1R00A5F-0511	1	200	5X11	16	0.15	19
SE200M2R20AZF-0611	2.2	200	6.3X11	23	0.15	22
SE200M2R20BZF-0611	2.2	200	6.3X11	23	0.15	22
SE200M2R20A5F-0611	2.2	200	6.3X11	23	0.15	22
SE200M2R20A3F-0811	2.2	200	8X11	23	0.15	28
SE200M2R20B3F-0811	2.2	200	8X11	23	0.15	28
SE200M2R20A5F-0811	2.2	200	8X11	23	0.15	28
SE200M3R30AZF-0611	3.3	200	6.3X11	30	0.15	32
SE200M3R30BZF-0611	3.3	200	6.3X11	30	0.15	32
SE200M3R30A5F-0611	3.3	200	6.3X11	30	0.15	32
SE200M3R30A3F-0811	3.3	200	8X11	30	0.15	40
SE200M3R30B3F-0811	3.3	200	8X11	30	0.15	40
SE200M3R30A5F-0811	3.3	200	8X11	30	0.15	40
SE200M4R70A3F-0811	4.7	200	8X11	38	0.15	40
SE200M4R70B3F-0811	4.7	200	8X11	38	0.15	40
SE200M4R70A5F-0811	4.7	200	8X11	38	0.15	40
SE200M4R70A5S-1012	4.7	200	10X12	38	0.15	50
SE200M4R70B5S-1012	4.7	200	10X12	38	0.15	50
SE200M6R80A5S-1012	6.8	200	10X12	51	0.15	60
SE200M6R80B5S-1012	6.8	200	10X12	51	0.15	60
SE200M0010A5S-1012	10	200	10X12	70	0.15	69
SE200M0010B5S-1012	10	200	10X12	70	0.15	69
SE200M0010A5S-1015	10	200	10X15	70	0.15	80
SE200M0010B5S-1015	10	200	10X15	70	0.15	80
SE200M0015A5S-1015	15	200	10X15	100	0.15	110
SE200M0015B5S-1015	15	200	10X15	100	0.15	110
SE200M0022A5S-1015	22	200	10X15	142	0.15	140
SE200M0022B5S-1015	22	200	10X15	142	0.15	140
SE200M0033A5S-1019	33	200	10X19.5	208	0.15	190
SE200M0033B5S-1019	33	200	10X19.5	208	0.15	190
SE200M0047A5S-1320	47	200	13X20	292	0.15	240

Table 1-14 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE200M0047B5S-1320	47	200	13X20	292	0.15	240
SE200M0047A5S-1325	47	200	13X25	292	0.15	290
SE200M0047B5S-1325	47	200	13X25	292	0.15	290
SE200M0068A5S-1325	68	200	13X25	418	0.15	330
SE200M0068B5S-1325	68	200	13X25	418	0.15	330
SE200M0100B7F-1625	100	200	16X25	610	0.15	410
SE200M0150B7F-1636	150	200	16X36	900	0.15	450
SE200M0220B7F-1832	220	200	18X32	1320	0.15	520
SE200M0220B7F-1836	220	200	18X36	1320	0.15	580
SE200M0220B7F-1840	220	200	18X40	1320	0.15	650
SE200M0330B7F-1836	330	200	18X36	1990	0.15	705
SE200M0330B7F-1840	330	200	18X40	1990	0.15	780
SE200M0330BPF-2240	330	200	22X40	1990	0.15	920
SE250M0R47A2F-0511	0.47	250	5X11	14	0.15	14
SE250M0R47B2F-0511	0.47	250	5X11	14	0.15	14
SE250M0R47AZF-0511	0.47	250	5X11	14	0.15	14
SE250M4R70A3F-0811	4.7	250	8X11	45	0.15	41
SE250M4R70B3F-0811	4.7	250	8X11	45	0.15	41
SE250M4R70A5F-0811	4.7	250	8X11	45	0.15	41
SE250M4R70A5S-1012	4.7	250	10X12	45	0.15	52
SE250M4R70B5S-1012	4.7	250	10X12	45	0.15	52
SE250M6R80A3F-0815	6.7	250	8X15	61	0.15	57
SE250M6R80B3F-0815	6.7	250	8X15	61	0.15	57
SE250M6R80A5F-0815	6.7	250	8X15	61	0.15	57
SE250M6R80A5S-1012	6.8	250	10X12	61	0.15	62
SE250M6R80B5S-1012	6.8	250	10X12	61	0.15	62
SE250M0010A5S-1015	10	250	10X15	85	0.15	88
SE250M0010B5S-1015	10	250	10X15	85	0.15	88
SE250M0015A5S-1015	15	250	10X15	122	0.15	120
SE250M0015B5S-1015	15	250	10X15	122	0.15	120
SE250M0022A5S-1019	22	250	10X19.5	175	0.15	155
SE250M0022B5S-1019	22	250	10X19.5	175	0.15	155
SE250M0033A5S-1320	33	250	13X20	258	0.15	170
SE250M0033B5S-1320	33	250	13X20	258	0.15	170
SE250M0033A5S-1325	33	250	13X25	258	0.15	200
SE250M0033B5S-1325	33	250	13X25	258	0.15	200
SE250M0047A5S-1325	47	250	13X25	362	0.15	330
SE250M0047B5S-1325	47	250	13X25	362	0.15	330
SE250M0068B7F-1625	68	250	16X25	510	0.15	350
SE250M0100B7F-1632	100	250	16X32	750	0.15	440
SE250M0150B7F-1840	150	250	18X40	1135	0.15	460
SE250M0220BPF-2240	220	250	22X40	1660	0.15	680
SE350M0R47A2F-0511	0.47	350	5X11	15	0.20	14
SE350M0R47B2F-0511	0.47	350	5X11	15	0.20	14
SE350M0R47AZF-0511	0.47	350	5X11	15	0.20	14
SE350M0R47A5F-0511	0.47	350	5X11	15	0.20	14
SE350M1R00AZF-0611	1	350	6.3X11	21	0.20	20
SE350M1R00BZF-0611	1	350	6.3X11	21	0.20	20
SE350M1R00A5F-0611	1	350	6.3X11	21	0.20	20
SE350M2R20A3F-0811	2.2	350	8X11	33	0.20	35
SE350M2R20B3F-0811	2.2	350	8X11	33	0.20	35
SE350M2R20A5F-0811	2.2	350	8X11	33	0.20	35

Table 1-15 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE350M3R30A3F-0811	3.3	350	8X11	45	0.20	37
SE350M3R30B3F-0811	3.3	350	8X11	45	0.20	37
SE350M3R30A5F-0811	3.3	350	8X11	45	0.20	37
SE350M3R30A5S-1012	3.3	350	10X12	45	0.20	47
SE350M3R30B5S-1012	3.3	350	10X12	45	0.20	47
SE350M4R70A5S-1012	4.7	350	10X12	59	0.20	47
SE350M4R70B5S-1012	4.7	350	10X12	59	0.20	47
SE350M4R70A5S-1015	4.7	350	10X15	59	0.20	55
SE350M4R70B5S-1015	4.7	350	10X15	59	0.20	55
SE350M6R80A5S-1015	6.8	350	10X15	81	0.20	65
SE350M6R80B5S-1015	6.8	350	10X15	81	0.20	65
SE350M0010A5S-1015	10	350	10X15	115	0.20	95
SE350M0010B5S-1015	10	350	10X15	115	0.20	95
SE350M0015A5S-1019	15	350	10X19.5	168	0.20	140
SE350M0015B5S-1019	15	350	10X19.5	168	0.20	140
SE350M0022A5S-1320	22	350	13X20	241	0.20	165
SE350M0022B5S-1320	22	350	13X20	241	0.20	165
SE350M0033A5S-1325	33	350	13X25	356	0.20	220
SE350M0033B5S-1325	33	350	13X25	356	0.20	220
SE350M0047B7F-1625	47	350	16X25	496	0.20	340
SE350M0068B7F-1632	68	350	16X32	714	0.20	370
SE350M0100B7F-1836	100	350	18X36	1060	0.20	460
SE350M0150BPF-2240	150	350	22X40	1585	0.20	480
SE400M0R47AZF-0611	0.47	400	6.3X11	16	0.20	14
SE400M0R47BZF-0611	0.47	400	6.3X11	16	0.20	14
SE400M0R47A5F-0611	0.47	400	6.3X11	16	0.20	14
SE400M1R00AZF-0611	1	400	6.3X11	22	0.20	16
SE400M1R00BZF-0611	1	400	6.3X11	22	0.20	16
SE400M1R00A5F-0611	1	400	6.3X11	22	0.20	16
SE400M1R00A3F-0811	1	400	8X11	22	0.20	20
SE400M1R00B3F-0811	1	400	8X11	22	0.20	20
SE400M1R00A5F-0811	1	400	8X11	22	0.20	20
SE400M2R20A3F-0811	2.2	400	8X11	40	0.20	28
SE400M2R20B3F-0811	2.2	400	8X11	40	0.20	28
SE400M2R20A5F-0811	2.2	400	8X11	40	0.20	28
SE400M2R20A5S-1012	2.2	400	10X12	40	0.20	35
SE400M2R20B5S-1012	2.2	400	10X12	40	0.20	35
SE400M3R30A3F-0811	3.3	400	8X11	50	0.20	38
SE400M3R30B3F-0811	3.3	400	8X11	50	0.20	38
SE400M3R30A5F-0811	3.3	400	8X11	50	0.20	38
SE400M3R30A5S-1015	3.3	400	10X12	50	0.20	50
SE400M3R30B5S-1015	3.3	400	10X12	50	0.20	50
SE400M4R70A3F-0815	4.7	400	8X15	66	0.20	45
SE400M4R70B3F-0815	4.7	400	8X15	66	0.20	45
SE400M4R70A5F-0815	4.7	400	8X15	66	0.20	45
SE400M4R70A5S-1012	4.7	400	10X12	66	0.20	49
SE400M4R70B5S-1012	4.7	400	10X12	66	0.20	49
SE400M4R70A5S-1015	4.7	400	10X15	66	0.20	57
SE400M4R70B5S-1015	4.7	400	10X15	66	0.20	57
SE400M6R80A5S-1015	6.8	400	10X15	91	0.20	60
SE400M6R80B5S-1015	6.8	400	10X15	91	0.20	60
SE400M6R80A5S-1019	6.8	400	10X19.5	91	0.20	72

Table 1-16 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE400M6R80B5S-1019	6.8	400	10X19.5	91	0.20	72
SE400M0010A5S-1015	10	400	10X15	130	0.20	65
SE400M0010B5S-1015	10	400	10X15	130	0.20	65
SE400M0010A5S-1019	10	400	10X19.5	130	0.20	77
SE400M0010B5S-1019	10	400	10X19.5	130	0.20	77
SE400M0010A5S-1320	10	400	13X20	130	0.20	97
SE400M0010B5S-1320	10	400	13X20	130	0.20	97
SE400M0015A5S-1019	15	400	10X19.5	190	0.20	100
SE400M0015B5S-1019	15	400	10X19.5	190	0.20	100
SE400M0015A5S-1320	15	400	13X20	190	0.20	125
SE400M0015B5S-1320	15	400	13X20	190	0.20	125
SE400M0015A5S-1325	15	400	13X25	190	0.20	150
SE400M0015B5S-1325	15	400	13X25	190	0.20	150
SE400M0022A5S-1320	22	400	13X20	274	0.20	150
SE400M0022B5S-1320	22	400	13X25	274	0.20	150
SE400M0022A5S-1325	22	400	13X25	274	0.20	175
SE400M0022B5S-1325	22	400	13X25	274	0.20	175
SE400M0033A5S-1325	33	400	13X25	406	0.20	190
SE400M0033B5S-1325	33	400	13X25	406	0.20	190
SE400M0015A5S-1620	33	400	16X20	406	0.20	195
SE400M0015B5S-1620	33	400	16X20	406	0.20	195
SE400M0015B7F-1625	33	400	16X25	406	0.20	230
SE400M0047B7F-1625	47	400	16X25	574	0.20	280
SE400M0047B7F-1632	47	400	16X32	574	0.20	315
SE400M0047B7F-1636	47	400	16X36	574	0.20	350
SE400M0047B7F-1820	47	400	18X20	574	0.20	275
SE400M0047B7F-1825	47	400	18X25	575	0.20	300
SE400M0068B7F-1632	68	400	16X32	826	0.20	320
SE400M0068B7F-1636	68	400	16X36	826	0.20	335
SE400M0068B7F-1825	68	400	18X25	826	0.20	305
SE400M0068B7F-1836	68	400	18X36	826	0.20	380
SE400M0100B7F-1632	100	400	16X36	1210	0.20	425
SE400M0100B7F-1832	100	400	18X32	1210	0.20	430
SE400M0100B7F-1836	100	400	18X36	1210	0.20	480
SE400M0120B7F-1836	120	400	18X36	1450	0.20	480
SE400M0150BPF-2240	150	400	22X40	1810	0.20	450
SE450M0R47AZF-0611	0.47	450	6.3X11	16	0.20	14
SE450M0R47BZF-0611	0.47	450	6.3X11	16	0.20	14
SE450M0R47A5F-0611	0.47	450	6.3X11	16	0.20	14
SE450M1R00A3F-0811	1	450	8X11	24	0.20	20
SE450M1R00B3F-0811	1	450	8X11	24	0.20	20
SE450M1R00A5F-0811	1	450	8X11	24	0.20	20
SE450M2R20A5S-1012	2.2	450	10X12	40	0.20	35
SE450M2R20B5S-1012	2.2	450	10X12	40	0.20	35
SE450M3R30A5S-1015	3.3	450	10X15	55	0.20	54
SE450M3R30B5S-1015	3.3	450	10X15	55	0.20	54
SE450M4R70A5S-1015	4.7	450	10X15	74	0.20	60
SE450M4R70B5S-1015	4.7	450	10X15	74	0.20	60
SE450M6R80A5S-1019	6.8	450	10X19.5	102	0.20	80
SE450M6R80B5S-1019	6.8	450	10X19.5	102	0.20	80
SE450M0010A5S-1320	10	450	13X20	145	0.20	85

Table 1-17 SEK Type , Standard Rating And Catalog Number

Catalog Number	Capacitance	Rated Voltage	Size D X L	Leakage Current	Dissipation Factor	Ripple 120KHz 105°C
	(Mf)	(V.DC)	(mm)	(Ma)	(Tan $\delta$ )	(Ma)
SE450M0010B5S-1320	10	450	13X20	145	0.20	85
SE450M0010A5S-1325	10	450	13X25	145	0.20	100
SE450M0010B5S-1325	10	450	13X25	145	0.20	100
SE450M0015B7F-1625	15	450	16X25	212	0.20	160
SE450M0022A5S-1325	22	450	13X25	307	0.20	125
SE450M0022B7F-1625	22	450	16X25	307	0.20	150
SE450M0022B7F-1632	22	450	16X32	307	0.20	180
SE450M0033B7F-1625	33	450	16X25	455	0.20	190
SE450M0033B7F-1636	33	450	16X36	455	0.20	240
SE450M0047B7F-1636	47	450	16X36	645	0.20	300
SE450M0047B7F-1840	47	450	18X40	645	0.20	360
SE450M0068B7F-1832	68	450	18X32	928	0.20	305
SE450K0068BPF-2240	68	450	22X40	928	0.20	400

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