#### Part Numbering Chip Monolithic Ceramic Capacitors GR M 18 8 B1 1H 102 K A01 D (Part Number) Ð Ø 6 4 6 6 Ø 8 9 D Product ID 2 Series Product ID Code Series J Soft Termination Type Μ Tin Plated Layer GR 4 Only for Information Devices / Tip & Ring 7 Only for Camera Flash Circuit High Frequency for М GQ Flow/Reflow Soldering Α Monolithic Microchip GM D For Bonding GN Μ Capacitor Array L Low ESL Type R Controlled ESR Low ESL Type LL Α 8-termination Low ESL Type М 10-termination Low ESL Type GJ Μ High Frequency Low Loss Type 2 For AC250V (r.m.s.) GA 3 Safety Standard Certified Type

#### Object Strength St

Code	Dimensions (L×W)	EIA
02	0.4×0.2mm	01005
03	0.6×0.3mm	0201
05	0.5×0.5mm	0202
08	0.8×0.8mm	0303
0D	0.38×0.38mm	015015
OM	0.9×0.6mm	0302
15	1.0×0.5mm	0402
18	1.6×0.8mm	0603
1M	1.37×1.0mm	0504
21	2.0×1.25mm	0805
22	2.8×2.8mm	1111
31	3.2×1.6mm	1206
32	3.2×2.5mm	1210
42	4.5×2.0mm	1808
43	4.5×3.2mm	1812
52	5.7×2.8mm	2211
55	5.7×5.0mm	2220

#### ④Dimension (T) (Except GNM)

Code	Dimension (T)		
2	0.2mm		
3	0.3mm		
5	0.5mm		
6	0.6mm		
7	0.7mm		
8	0.8mm		
9	0.85mm		
Α	1.0mm		
В	1.25mm		
С	1.6mm		
D	2.0mm		
E	2.5mm		
F	3.2mm		
М	1.15mm		
N	1.35mm		
Q	1.5mm		
R	1.8mm		
S	2.8mm		
Х	Depends on individual standards.		

#### Elements (GNM Only)

Code	Elements
2	2-elements
4	4-elements

Continued on the following page.



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Temperatur	e Characteristic	Codes	Temperature Characteristics				
Code Public STD Code		Code	Reference Temperature	Temperature Range	Capacitance Change or Temperature Coefficient	Operating     Temperature Range	
1X	SL *1	JIS	20°C	20 to 85°C	+350 to -1000ppm/°C	-55 to 125°C	
2C	CH *1	JIS	20°C	20 to 125°C	0±60ppm/°C	-55 to 125°C	
2P	PH *1	JIS	20°C	20 to 85°C	-150±60ppm/°C	-25 to 85°C	
2R	RH *1	JIS	20°C	20 to 85°C	-220±60ppm/°C	-25 to 85°C	
2S	SH *1	JIS	20°C	20 to 85°C	-330±60ppm/°C	-25 to 85°C	
2T	TH *1	JIS	20°C	20 to 85°C	-470±60ppm/°C	-25 to 85°C	
3C	CJ *1	JIS	20°C	20 to 125°C	0±120ppm/°C	-55 to 125°C	
3P	PJ *1	JIS	20°C	20 to 85°C	-150±120ppm/°C	-25 to 85°C	
3R	RJ *1	JIS	20°C	20 to 85°C	-220±120ppm/°C	-25 to 85°C	
3S	SJ *1	JIS	20°C	20 to 85°C	-330±120ppm/°C	-25 to 85°C	
3T	TJ *1	JIS	20°C	20 to 85°C	-470±120ppm/°C	-25 to 85°C	
3U	UJ *1	JIS	20°C	20 to 85°C	-750±120ppm/°C	-25 to 85°C	
4C	CK *1	JIS	20°C	20 to 125°C	0±250ppm/°C	-55 to 125°C	
5C	C0G *1	EIA	25°C	25 to 125°C	0±30ppm/°C	-55 to 125°C	
5G	X8G *1	EIA	25°C	25 to 150°C	0±30ppm/°C	-55 to 150°C	
6C	C0H *1	EIA	25°C	25 to 125°C	0±60ppm/°C	-55 to 125°C	
6P	P2H *1	EIA	25°C	25 to 85°C	-150±60ppm/°C	-55 to 125°C	
6R	R2H *1	EIA	25°C	25 to 85°C	-220±60ppm/°C	-55 to 125°C	
6S	S2H *1	EIA	25°C	25 to 85°C	-330±60ppm/°C	-55 to 125°C	
6T	T2H *1	EIA	25°C	25 to 85°C	-470±60ppm/°C	-55 to 125°C	
7U	U2J *1	EIA	25°C	25 to 125°C *6	-750±120ppm/°C	-55 to 125°C	
B1	B *2	JIS	20°C	-25 to 85°C	±10%	-25 to 85°C	
B3	В	JIS	20°C	-25 to 85°C	±10%	-25 to 85°C	
C7	X7S	EIA	25°C	-55 to 125°C	±22%	-55 to 125°C	
C8	X6S	EIA	25°C	-55 to 105°C	±22%	-55 to 105°C	
D7	X7T	EIA	25°C	-55 to 125°C	+22, -33%	-55 to 125°C	
D8	X6T	EIA	25°C	-55 to 105°C	+22, -33%	-55 to 105°C	
E7	X7U	EIA	25°C	-55 to 125°C	+22, -56%	-55 to 125°C	
F1	F *2	JIS	20°C	-25 to 85°C	+30, -80%	-25 to 85°C	
F5	Y5V	EIA	25°C	-30 to 85°C	+22, -82%	-30 to 85°C	
L8	X8L	*3	25°C	-55 to 150°C	+15, -40%	-55 to 150°C	
R1	<b>R</b> *2	JIS	20°C	-55 to 125°C	±15%	-55 to 125°C	
R3	R	JIS	20°C	-55 to 125°C	±15%	-55 to 125°C	
R6	X5R	EIA	25°C	-55 to 85°C	±15%	-55 to 85°C	
R7	X7R	EIA	25°C	-55 to 125°C	±15%	-55 to 125°C	
R9	X8R	EIA	25°C	-55 to 150°C	±15%	-55 to 150°C	
					±10% *4		
WO	-	-	25°C	-55 to 125°C	+22, -33% *5	-55 to 125°C	

\*1 Please refer to table for Capacitance Change under reference temperature. \*2 Capacitance change is specified with 50% rated voltage applied.

\*3 Murata Temperature Characteristic Code.

\*4 Apply DC350V bias. \*5 No DC bias.

\*6 Rated Voltage 100Vdc max : 25 to 85°C

Continued on the following page.  $\boxed{\circlel{A}}$ 



Continued from the preceding page.

•Capacitance Change from each temperature

JIS Code

		Capacitance Change from 20°C (%)					
Murata Code	–55°C		–25°C		-10°C		
	Max.	Min.	Max.	Min.	Max.	Min.	
1X	-	-	-	-	-	-	
2C	0.82	-0.45	0.49	-0.27	0.33	-0.18	
2P	-	-	1.32	0.41	0.88	0.27	
2R	-	-	1.70	0.72	1.13	0.48	
2S	-	-	2.30	1.22	1.54	0.81	
2T	-	-	3.07	1.85	2.05	1.23	
3C	1.37	-0.90	0.82	-0.54	0.55	-0.36	
3P	_	-	1.65	0.14	1.10	0.09	
3R	_	-	2.03	0.45	1.35	0.30	
3S	_	-	2.63	0.95	1.76	0.63	
3Т	_	-	3.40	1.58	2.27	1.05	
3U	_	-	4.94	2.84	3.29	1.89	
4C	2.56	-1.88	1.54	-1.13	1.02	-0.75	

EIA Code

	Capacitance Change from 25°C (%)					
Murata Code	–55°C		–30°C		-10°C	
	Max.	Min.	Max.	Min.	Max.	Min.
5C/5G	0.58	-0.24	0.40	-0.17	0.25	-0.11
6C	0.87	-0.48	0.59	-0.33	0.38	-0.21
6P	2.33	0.72	1.61	0.50	1.02	0.32
6R	3.02	1.28	2.08	0.88	1.32	0.56
6S	4.09	2.16	2.81	1.49	1.79	0.95
6Т	5.46	3.28	3.75	2.26	2.39	1.44
7U	8.78	5.04	6.04	3.47	3.84	2.21

#### 6Rated Voltage

Code	Rated Voltage			
0E	DC2.5V			
0G	DC4V			
0J	DC6.3V			
1A	DC10V			
1C	DC16V			
1E	DC25V			
YA	DC35V			
1H	DC50V			
2A	DC100V			
2D	DC200V			
2E	DC250V			
YD	DC300V			
2H	DC500V			
2J	DC630V			
3A	DC1kV			
3D	DC2kV			
3F	DC3.15kV			
BB	DC350V (for Camera Flash Circuit)			
E2	AC250V			
GC	X1/Y2; AC250V (Safety Standard Certified Type GC)			
GF	Y2, X1/Y2; AC250V (Safety Standard Certified Type GF)			
GD	Y3; AC250V (Safety Standard Certified Type GD)			
GB	X2; AC250V (Safety Standard Certified Type GB)			

#### Capacitance

Expressed by three-digit alphanumerics. The unit is picofarad (pF). The first and second figures are significant digits, and the third figure expresses the number of zeros which follow the two numbers. If there is a decimal point, it is expressed by the capital letter " $\mathbf{R}$ ." In this case, all figures are significant digits.

Ex.)	Code	Capacitance
	R50	0.5pF
	1R0	1.0pF
	100	10pF
	103	10000pF

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Code	Capacitance Tolerance	TC	Series	Ca	pacitance Step	
w	±0.05pF	СΔ	GRM/GJM	≦9.9pF	0.1pF	
			GRM/GJM	≦9.9pF	0.1pF	
в	±0.1pF	CΔ	GQM	≦1pF	0.1pF	
			GGW	1.1 to 9.9pF	1pF Step and E24 Serie	
		CΔ	GRM/GJM	≦9.9pF	0.1pF	
с	±0.25pF	except C∆	GRM	≦5pF	* 1pF	
C	±0.25рг	Сд	GQM	≦1pF	0.1pF	
		CΔ	GOM	1.1 to 9.9pF	1pF Step and E24 Serie	
	±0.5pF	CΔ	GRM/GJM	5.1 to 9.9pF	0.1pF	
D		except C∆	GRM	5.1 to 9.9pF	* 1pF	
		CΔ	GQM	5.1 to 9.9pF	1pF Step and E24 Seri	
G	±2%	CΔ	GJM	≧10pF	E12 Series	
9	12 /0	CΔ	GQM	≧10pF	E24 Series	
J	±5%	CΔ, SL, U2J	GRM/GA3	≧10pF	E12 Series	
J	1070	CΔ	GQM/GJM	≧10pF	E24 Series	
		B, R, X7R, X5R, ZLM	GRJ/GRM/GR7/GA3		E6 Series	
к	±10%	C0G	GNM		E6 Series	
		B, R, X7R, X5R, ZLM	GR4, GMD		E12 Series	
		B, R, X7R, X7S	GRM/GMA		E6 Series	
м	±20%	X5R, X7R, X7S	GNM		E3 Series	
		X7R	GA2		E3 Series	
		X5R, X7R, X7S, X6S	LLL/LLR/LLA/LLM		E3 Series	
Z	+80%, -20%	F, Y5V	GRM	E3 Series		
R		Depends on individual standards.				

\* E24 series is also available.

Individual Specification Code (Except LLR) Expressed by three figures.

### 9ESR (LLR Only)

Code	ESR
E01	100mΩ
E03	220mΩ
E05	470mΩ
E07	1000mΩ

#### Packaging

Code	Packaging			
L	ø180mm Embossed Taping			
D	ø180mm Paper Taping			
E	ø180mm Paper Taping (LLL15)			
к	ø330mm Embossed Taping			
J	ø330mm Paper Taping			
F	ø330mm Paper Taping (LLL15)			
В	Bulk			
С	Bulk Case			
т	Bulk Tray			



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# **Chip Monolithic Ceramic Capacitors**



## **High-Q Type GJM Series**

### Features

- 1. Mobile Telecommunication and RF module, mainly
- 2. Improvement of telephone call quality, Low power Consumption, yield ratio improvement.

### Applications

VCO, PA, Mobile Telecommunication



Part Number	Dimensions (mm)					
Part Number	L	W	Т	е	g min.	
GJM03	0.6 ±0.03	0.3 ±0.03	0.3 ±0.03	0.1 to 0.2	0.2	
GJM15	1.0 ±0.05	0.5 ±0.05	0.5 ±0.05	0.15 to 0.35	0.3	

Array GNM Series

For General GRM Series



1.0x0.5

(**15**) <0402>

50

(1H)

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### **Capacitance Table**

For General GRM Series

Array GNM Series

Low ESL LL<sup>[]</sup> Series

High-Q

GJIM

High Frequency GOM Series

Monolithic Microchip

**GMA** Series

### Temperature Compensating Type C0G(5C)/C0H(6C) Characteristics

3 ex.3: T Dimension [mm]

[mm]

[Vdc] (1

Rated Voltage

0.1pF(R10)

0.2pF(R20)

0.3pF(R30)

0.4pF(**R40**) 0.5pF(**R50**)

0.6pF(R60)

0.7pF(**R70**) 0.8pF(**R80**)

0.9pF(**R90**)

1.0pF(1R0)

1.1pF(1R1)

1.2pF(1R2)

1.3pF(1R3)

1.4pF(1R4)

1.5pF(**1R5**) 1.6pF(**1R6**)

1.7pF(1R7)

1.8pF(1R8)

1.9pF(1R9)

2.0pF(2R0)

2.1pF(2R1)

2.2pF(2R2) 2.3pF(2R3)

2.4pF(2R4) 2.5pF(2R5)

2.6pF(**2R6**) 2.7pF(**2R7**)

2.8pF(2R8)

2.9pF(2R9)

3.0pF(3R0)

3.1pF(3R1)

3.2pF(3R2)

3.3pF(3R3)

3.4pF(3R4)

3.5pF(**3R5**) 3.6pF(**3R6**)

3.7pF(3R7)

3.8pF(3R8)

3.9pF(**3R9**) 4.0pF(**4R0**)

4.1pF(4R1)

4.2pF(4R2)

4.3pF(4R3)

4.4pF(**4R4**) 4.5pF(**4R5**)

4.6pF(**4R6**) 4.7pF(**4R7**)

4.8pF(4R8)

4.9pF(4R9)

Capacitance

imensio	n [mm]					
0.6) ( <b>0</b> <02	3)	1.0x0.5 ( <b>15</b> ) <0402>	LxW [mm]	0.6× ( <b>0</b> : <02	3)	
25	6.3	50	Rated Voltage	25	6.3	ŀ
( <b>1E</b> )	( <b>0</b> J)	(1H)	Capacitance [Vdc]	( <b>1E</b> )	( <b>0</b> J)	
		5	5.0pF( <b>5R0</b> )	3		
3		5	5.1pF( <b>5R1</b> )	3		
3		5	5.2pF( <b>5R2</b> )	3		
3		5	5.3pF( <b>5R3</b> )	3		
3		5	5.4pF( <b>5R4</b> )	3		
3		5	5.5pF( <b>5R5</b> )	3		
3		5	5.6pF( <b>5R6</b> )	3		
3		5	5.7pF( <b>5R7</b> )	3		
3		5	5.8pF( <b>5R8</b> )	3		
3		5	5.9pF( <b>5R9</b> )	3		
3		5	6.0pF( <b>6R0</b> )	3		
3		5	6.1pF( <b>6R1</b> )	3		
3		5	6.2pF( <b>6R2</b> )	3		
3		5	6.3pF( <b>6R3</b> )	3		
3		5	6.4pF( <b>6R4</b> )	3		
3		5	6.5pF( <b>6R5</b> )	3		
3		5	6.6pF( <b>6R6</b> )	3		
3		5	6.7pF( <b>6R7</b> )	3		
3		5	6.8pF( <b>6R8</b> )	3		
3		5	6.9pF( <b>6R9</b> )	3		
3		5	7.0pF( <b>7R0</b> )	3		
3		5	7.1pF( <b>7R1</b> )	3		
3		5	7.2pF( <b>7R2</b> )	3		
3		5	7.3pF( <b>7R3</b> )	3		
3		5	7.4pF( <b>7R4</b> )	3		
3		5	7.5pF( <b>7R5</b> )	3		
3		5	7.6pF( <b>7R6</b> )	3		
3		5	7.7pF( <b>7R7</b> )	3		
3		5	7.8pF( <b>7R8</b> )	3		
3		5	7.9pF( <b>7R9</b> )	3		
3		5	8.0pF(8R0)	3		
3		5	8.1pF(8R1)	3		
3		5	8.2pF( <b>8R2</b> )	3		
3		5	8.3pF(8R3)	3		
3		5	8.4pF(8R4)	3		
3		5	8.5pF( <b>8R5</b> )	3		
3		5	8.6pF( <b>8R6</b> )	3		
3		5	8.7pF(8R7)	3		
3		5	8.8pF(8R8)	3		
3		5	8.9pF( <b>8R9</b> )	3		
3		5	9.0pF( <b>9R0</b> )	3		
3		5	9.1pF( <b>9R1</b> )	3		
3		5	9.2pF( <b>9R2</b> )	3		
3		5	9.3pF( <b>9R3</b> )	3		F
3		5	9.4pF( <b>9R4</b> )	3		
3		5	9.5pF( <b>9R5</b> )	3		
3		5	9.6pF( <b>9R6</b> )	3		F
3		5	9.7pF( <b>9R7</b> )	3		
3		5	9.8pF( <b>9R8</b> )	3		Ĺ

LxW [mm]	(0	<0.3 <b>3</b> ) 01>	1.0x0.5 ( <b>15</b> ) <0402>
Rated Voltage Capacitance [Vdc]	25 ( <b>1E</b> )	6.3 ( <b>0J</b> )	50 ( <b>1H</b> )
9.9pF( <b>9R9</b> )	3		5
10pF( <b>100</b> )	3		5
11pF( <b>110</b> )	3		5
12pF( <b>120</b> )	3		5
13pF( <b>130</b> )	3		5
15pF( <b>150</b> )	3		5
16pF( <b>160</b> )	3		5
18pF( <b>180</b> )	3		5
20pF( <b>200</b> )	3		5
22pF( <b>220</b> )		3	
24pF( <b>240</b> )		3	
27pF( <b>270</b> )		3	
30pF( <b>300</b> )		3	
33pF( <b>330</b> )		3	

on For Bonding GMD Series

Product Information

The part number code is shown in ( ) and Unit is shown in [ ]. <>: EIA [inch] Code



LxW [mm]		0.6x0.3( <b>03</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
Rated Volt. [Vdc]	]	25( <b>1E</b> )	50( <b>1H</b> )
Capacitance	Tolerance	Part N	umber
0.1pF( <b>R10</b> )	±0.05pF( <b>W</b> )		GJM1555C1HR10WB01D
	±0.1pF( <b>B</b> )		GJM1555C1HR10BB01D
0.2pF( <b>R20</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER20WB01D	GJM1555C1HR20WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER20BB01D	GJM1555C1HR20BB01D
0.3pF( <b>R30</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER30WB01D	GJM1555C1HR30WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER30BB01D	GJM1555C1HR30BB01D
0.4pF( <b>R40</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER40WB01D	GJM1555C1HR40WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER40BB01D	GJM1555C1HR40BB01D
0.5pF( <b>R50</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER50WB01D	GJM1555C1HR50WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER50BB01D	GJM1555C1HR50BB01D
0.6pF( <b>R60</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER60WB01D	GJM1555C1HR60WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER60BB01D	GJM1555C1HR60BB01D
0.7pF( <b>R70</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER70WB01D	GJM1555C1HR70WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER70BB01D	GJM1555C1HR70BB01D
0.8pF( <b>R80</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER80WB01D	GJM1555C1HR80WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER80BB01D	GJM1555C1HR80BB01D
0.9pF( <b>R90</b> )	±0.05pF( <b>W</b> )	GJM0335C1ER90WB01D	GJM1555C1HR90WB01D
	±0.1pF( <b>B</b> )	GJM0335C1ER90BB01D	GJM1555C1HR90BB01D
1.0pF( <b>1R0</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R0WB01D	GJM1555C1H1R0WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E1R0BB01D	GJM1555C1H1R0BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R0CB01D	GJM1555C1H1R0CB01D
1.1pF( <b>1R1</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R1WB01D	GJM1555C1H1R1WB01D
• • •	±0.1pF( <b>B</b> )	GJM0335C1E1R1BB01D	GJM1555C1H1R1BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R1CB01D	GJM1555C1H1R1CB01D
1.2pF( <b>1R2</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R2WB01D	GJM1555C1H1R2WB01D
• • •	±0.1pF( <b>B</b> )	GJM0335C1E1R2BB01D	GJM1555C1H1R2BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R2CB01D	GJM1555C1H1R2CB01D
1.3pF( <b>1R3</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R3WB01D	GJM1555C1H1R3WB01D
,	±0.1pF( <b>B</b> )	GJM0335C1E1R3BB01D	GJM1555C1H1R3BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R3CB01D	GJM1555C1H1R3CB01D
1.4pF( <b>1R4</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R4WB01D	GJM1555C1H1R4WB01D
. 、 /	±0.1pF( <b>B</b> )	GJM0335C1E1R4BB01D	GJM1555C1H1R4BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R4CB01D	GJM1555C1H1R4CB01D
1.5pF( <b>1R5</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R5WB01D	GJM1555C1H1R5WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E1R5BB01D	GJM1555C1H1R5BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R5CB01D	GJM1555C1H1R5CB01D
1.6pF( <b>1R6</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R6WB01D	GJM1555C1H1R6WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E1R6BB01D	GJM1555C1H1R6BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R6CB01D	GJM1555C1H1R6CB01D
1.7pF( <b>1R7</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R7WB01D	GJM1555C1H1R7WB01D
· [- · (····)	±0.1pF( <b>B</b> )	GJM0335C1E1R7BB01D	GJM1555C1H1R7BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R7CB01D	GJM1555C1H1R7CB01D
1.8pF( <b>1R8</b> )	±0.05pF( <b>W</b> )	GJM0335C1E1R8WB01D	GJM1555C1H1R8WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E1R8BB01D	GJM1555C1H1R8BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E1R8BB01D	GJM1555C1H1R8CB01D
1.9pF( <b>1R9</b> )	±0.25pf ( <b>C</b> ) ±0.05pF( <b>W</b> )	GJM0335C1E1R9WB01D	GJM1555C1H1R9WB01D
1.7pr( <b>1.3</b> )			
The part number of	±0.1pF( <b>B</b> ) ±0.25pF( <b>C</b> )	GJM0335C1E1R9BB01D GJM0335C1E1R9CB01D ) and Unit is shown in []. <>: E	GJM1555C1H1R9 GJM1555C1H1R9

The part number code is shown in ( ) and Unit is shown in [ ]. <>: EIA [inch] Code

(Part Number) GJ M 03 3 5C 1E R20 W B01 D 0 0 0 0 0 0 0 0 0 Packaging Code in Part Number shows STD 180mm Reel Taping.

Product ID
Series
Temperature Characteristics
Capacitance Tolerance

Dimensions (LxW)Rated VoltageIndividual Specification Code

Dimension (T)CapacitancePackaging

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es a	Tempera	ture Com	pensating Type C	OG(5C) Characte
GRM Series	LxW [mm]		0.6x0.3( <b>03</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
ž	Rated Volt. [Vdc	1	25( <b>1E</b> )	50( <b>1H</b> )
5 15	Capacitance	Tolerance	. ,	umber
	2.0pF( <b>2R0</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R0WB01D	GJM1555C1H2R0WB01E
	2.001 (21(0)	±0.1pF( <b>B</b> )	GJM0335C1E2R0BB01D	GJM1555C1H2R0BB01D
		±0.25pF( <b>C</b> )	GJM0335C1E2R0CB01D	GJM1555C1H2R0CB01E
s	2.1pF( <b>2R1</b> )	±0.25pf ( <b>C</b> ) ±0.05pF( <b>W</b> )	GJM0335C1E2R1WB01D	GJM1555C1H2R1WB01E
GNM Series	2.1pr( <b>2R1</b> )		GJM0335C1E2R1WB01D	
N Si		±0.1pF( <b>B</b> )		GJM1555C1H2R1BB01D
NN5	0.0	±0.25pF( <b>C</b> )	GJM0335C1E2R1CB01D	GJM1555C1H2R1CB01E
Ŭ	2.2pF( <b>2R2</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R2WB01D	GJM1555C1H2R2WB01I
		±0.1pF( <b>B</b> )	GJM0335C1E2R2BB01D	GJM1555C1H2R2BB01E
		±0.25pF( <b>C</b> )	GJM0335C1E2R2CB01D	GJM1555C1H2R2CB01E
	2.3pF( <b>2R3</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R3WB01D	GJM1555C1H2R3WB01
es		±0.1pF( <b>B</b> )	GJM0335C1E2R3BB01D	GJM1555C1H2R3BB01D
L Series		±0.25pF( <b>C</b> )	GJM0335C1E2R3CB01D	GJM1555C1H2R3CB01E
	2.4pF( <b>2R4</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R4WB01D	GJM1555C1H2R4WB01I
' 🚽		±0.1pF( <b>B</b> )	GJM0335C1E2R4BB01D	GJM1555C1H2R4BB01E
		±0.25pF( <b>C</b> )	GJM0335C1E2R4CB01D	GJM1555C1H2R4CB01E
	2.5pF( <b>2R5</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R5WB01D	GJM1555C1H2R5WB01I
		±0.1pF( <b>B</b> )	GJM0335C1E2R5BB01D	GJM1555C1H2R5BB01[
		±0.25pF( <b>C</b> )	GJM0335C1E2R5CB01D	GJM1555C1H2R5CB01E
ries	2.6pF( <b>2R6</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R6WB01D	GJM1555C1H2R6WB01I
Se		±0.1pF( <b>B</b> )	GJM0335C1E2R6BB01D	GJM1555C1H2R6BB01D
NC		±0.25pF( <b>C</b> )	GJM0335C1E2R6CB01D	GJM1555C1H2R6CB01[
0	2.7pF( <b>2R7</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R7WB01D	GJM1555C1H2R7WB01I
		±0.1pF( <b>B</b> )	GJM0335C1E2R7BB01D	GJM1555C1H2R7BB01E
		±0.25pF( <b>C</b> )	GJM0335C1E2R7CB01D	GJM1555C1H2R7CB01E
	2.8pF( <b>2R8</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R8WB01D	GJM1555C1H2R8WB01I
es	• • •	±0.1pF( <b>B</b> )	GJM0335C1E2R8BB01D	GJM1555C1H2R8BB01D
GOM Series		±0.25pF( <b>C</b> )	GJM0335C1E2R8CB01D	GJM1555C1H2R8CB01D
Ξ	2.9pF( <b>2R9</b> )	±0.05pF( <b>W</b> )	GJM0335C1E2R9WB01D	GJM1555C1H2R9WB01I
gg		±0.1pF( <b>B</b> )	GJM0335C1E2R9BB01D	GJM1555C1H2R9BB01[
		±0.25pF( <b>C</b> )	GJM0335C1E2R9CB01D	GJM1555C1H2R9CB01E
	3.0pF( <b>3R0</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R0WB01D	GJM1555C1H3R0WB01I
2	3.0pt ( <b>51(0</b> )	±0.1pF( <b>B</b> )	GJM0335C1E3R0BB01D	GJM1555C1H3R0BB01E
			GJM0335C1E3R0BB01D	
ries	2.1mF(2D4)	±0.25pF( <b>C</b> )		GJM1555C1H3R0CB01E
GMA Serie	3.1pF( <b>3R1</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R1WB01D	GJM1555C1H3R1WB01I
GMA Series		±0.1pF( <b>B</b> )	GJM0335C1E3R1BB01D	GJM1555C1H3R1BB01D
G		±0.25pF( <b>C</b> )	GJM0335C1E3R1CB01D	GJM1555C1H3R1CB01E
	3.2pF( <b>3R2</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R2WB01D	GJM1555C1H3R2WB01I
		±0.1pF( <b>B</b> )	GJM0335C1E3R2BB01D	GJM1555C1H3R2BB01D
		±0.25pF( <b>C</b> )	GJM0335C1E3R2CB01D	GJM1555C1H3R2CB01E
ς Ω	3.3pF( <b>3R3</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R3WB01D	GJM1555C1H3R3WB01I
GMD Series		±0.1pF( <b>B</b> )	GJM0335C1E3R3BB01D	GJM1555C1H3R3BB01E
DS		±0.25pF( <b>C</b> )	GJM0335C1E3R3CB01D	GJM1555C1H3R3CB01E
M	3.4pF( <b>3R4</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R4WB01D	GJM1555C1H3R4WB01I
. 0		±0.1pF( <b>B</b> )	GJM0335C1E3R4BB01D	GJM1555C1H3R4BB01E
		±0.25pF( <b>C</b> )	GJM0335C1E3R4CB01D	GJM1555C1H3R4CB01E
	3.5pF( <b>3R5</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R5WB01D	GJM1555C1H3R5WB01D
		+0.1pE( <b>B</b> )	GJM0335C1E3R5BB01D	GJM1555C1H3R5BB01D
		±0.1pF( <b>B</b> )	COMPOSED FEETED	

The part number code is shown in () and Unit is shown in []. <>: EIA [inch] Code

(Part Number) **GJ M 03 3 5C 1E 2R0 W B01 D** 0 0 0 0 0 0 **7**8 9

Packaging Code in Part Number shows STD 180mm Reel Taping.

Product ID 2 Series **5**Temperature Characteristics 8Capacitance Tolerance

3Dimensions (LxW) 6 Rated Voltage Individual Specification Code

**4** Dimension (T) Dimension (1)CapacitancePackaging

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Product Information

LxW [mm]		0.6x0.3( <b>03</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
Rated Volt. [Vdc]	-	25( <b>1E</b> )	50( <b>1H</b> )
Capacitance	Tolerance		umber
3.6pF( <b>3R6</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R6WB01D	GJM1555C1H3R6WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E3R6BB01D	GJM1555C1H3R6BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E3R6CB01D	GJM1555C1H3R6CB01D
3.7pF( <b>3R7</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R7WB01D	GJM1555C1H3R7WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E3R7BB01D	GJM1555C1H3R7BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E3R7CB01D	GJM1555C1H3R7CB01D
3.8pF( <b>3R8</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R8WB01D	GJM1555C1H3R8WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E3R8BB01D	GJM1555C1H3R8BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E3R8CB01D	GJM1555C1H3R8CB01D
3.9pF( <b>3R9</b> )	±0.05pF( <b>W</b> )	GJM0335C1E3R9WB01D	GJM1555C1H3R9WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E3R9BB01D	GJM1555C1H3R9BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E3R9CB01D	GJM1555C1H3R9CB01D
4.0pF( <b>4R0</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R0WB01D	GJM1555C1H4R0WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R0BB01D	GJM1555C1H4R0BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R0CB01D	GJM1555C1H4R0CB01D
4.1pF( <b>4R1</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R1WB01D	GJM1555C1H4R1WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R1BB01D	GJM1555C1H4R1BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R1CB01D	GJM1555C1H4R1CB01D
4.2pF( <b>4R2</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R2WB01D	GJM1555C1H4R2WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R2BB01D	GJM1555C1H4R2BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R2CB01D	GJM1555C1H4R2CB01D
4.3pF( <b>4R3</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R3WB01D	GJM1555C1H4R3WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R3BB01D	GJM1555C1H4R3BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R3CB01D	GJM1555C1H4R3CB01D
4.4pF( <b>4R4</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R4WB01D	GJM1555C1H4R4WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R4BB01D	GJM1555C1H4R4BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R4CB01D	GJM1555C1H4R4CB01D
4.5pF( <b>4R5</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R5WB01D	GJM1555C1H4R5WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R5BB01D	GJM1555C1H4R5BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R5CB01D	GJM1555C1H4R5CB01D
4.6pF( <b>4R6</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R6WB01D	GJM1555C1H4R6WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R6BB01D	GJM1555C1H4R6BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R6CB01D	GJM1555C1H4R6CB01D
4.7pF( <b>4R7</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R7WB01D	GJM1555C1H4R7WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R7BB01D	GJM1555C1H4R7BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R7CB01D	GJM1555C1H4R7CB01D
4.8pF( <b>4R8</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R8WB01D	GJM1555C1H4R8WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R8BB01D	GJM1555C1H4R8BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R8CB01D	GJM1555C1H4R8CB01D
4.9pF( <b>4R9</b> )	±0.05pF( <b>W</b> )	GJM0335C1E4R9WB01D	GJM1555C1H4R9WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E4R9BB01D	GJM1555C1H4R9BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E4R9CB01D	GJM1555C1H4R9CB01D
5.0pF( <b>5R0</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R0WB01D	GJM1555C1H5R0WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E5R0BB01D	GJM1555C1H5R0BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E5R0CB01D	GJM1555C1H5R0CB01D
5.1pF( <b>5R1</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R1WB01D	GJM1555C1H5R1WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E5R1BB01D	GJM1555C1H5R1BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E5R1CB01D	GJM1555C1H5R1CB01D
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The part number code is shown in ( ) and Unit is shown in [ ].  $\hfill <>:$  EIA [inch] Code





ies	Tempera	ture Com	pensating Type C	0G(5C) Characte
<b>GRM Series</b>	LxW [mm]		0.6x0.3( <b>03</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
SRN	Rated Volt. [Vdc	]	25( <b>1E</b> )	50( <b>1H</b> )
0	Capacitance	Tolerance	Part N	umber
	5.2pF( <b>5R2</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R2WB01D	GJM1555C1H5R2WB010
		±0.1pF( <b>B</b> )	GJM0335C1E5R2BB01D	GJM1555C1H5R2BB01D
		±0.25pF( <b>C</b> )	GJM0335C1E5R2CB01D	GJM1555C1H5R2CB01D
es		±0.5pF( <b>D</b> )	GJM0335C1E5R2DB01D	GJM1555C1H5R2DB01D
<b>GNM Series</b>	5.3pF( <b>5R3</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R3WB01D	GJM1555C1H5R3WB010
Σ		±0.1pF( <b>B</b> )	GJM0335C1E5R3BB01D	GJM1555C1H5R3BB01E
5		±0.25pF( <b>C</b> )	GJM0335C1E5R3CB01D	GJM1555C1H5R3CB01
		±0.5pF( <b>D</b> )	GJM0335C1E5R3DB01D	GJM1555C1H5R3DB01[
	5.4pF( <b>5R4</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R4WB01D	GJM1555C1H5R4WB01I
		±0.1pF( <b>B</b> )	GJM0335C1E5R4BB01D	GJM1555C1H5R4BB01[
(0		±0.25pF( <b>C</b> )	GJM0335C1E5R4CB01D	GJM1555C1H5R4CB01E
L Series		±0.5pF( <b>D</b> )	GJM0335C1E5R4DB01D	GJM1555C1H5R4DB01D
]Se	5.5pF( <b>5R5</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R5WB01D	GJM1555C1H5R5WB010
		±0.1pF( <b>B</b> )	GJM0335C1E5R5BB01D	GJM1555C1H5R5BB01E
_		±0.25pF( <b>C</b> )	GJM0335C1E5R5CB01D	GJM1555C1H5R5CB01D
		±0.5pF( <b>D</b> )	GJM0335C1E5R5DB01D	GJM1555C1H5R5DB01E
	5.6pF( <b>5R6</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R6WB01D	GJM1555C1H5R6WB010
		±0.1pF( <b>B</b> )	GJM0335C1E5R6BB01D	GJM1555C1H5R6BB010
ies		±0.25pF( <b>C</b> )	GJM0335C1E5R6CB01D	GJM1555C1H5R6CB010
Ser		±0.5pF( <b>D</b> )	GJM0335C1E5R6DB01D	GJM1555C1H5R6DB010
MU	5.7pF( <b>5R7</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R7WB01D	GJM1555C1H5R7WB01
വ്	on pr (erri)	±0.1pF( <b>B</b> )	GJM0335C1E5R7BB01D	GJM1555C1H5R7BB01I
		±0.25pF( <b>C</b> )	GJM0335C1E5R7CB01D	GJM1555C1H5R7CB01I
		±0.5pF( <b>D</b> )	GJM0335C1E5R7DB01D	GJM1555C1H5R7DB01I
	5.8pF( <b>5R8</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R8WB01D	GJM1555C1H5R8WB01
S		±0.1pF( <b>B</b> )	GJM0335C1E5R8BB01D	GJM1555C1H5R8BB01I
erie		±0.25pF( <b>C</b> )	GJM0335C1E5R8CB01D	GJM1555C1H5R8CB01I
GOM Series		±0.5pF( <b>D</b> )	GJM0335C1E5R8DB01D	GJM1555C1H5R8DB01I
GQM Series	5.9pF( <b>5R9</b> )	±0.05pF( <b>W</b> )	GJM0335C1E5R9WB01D	GJM1555C1H5R9WB01
-	5.7pr ( <b>610</b> )	±0.1pF( <b>B</b> )	GJM0335C1E5R9BB01D	GJM1555C1H5R9BB01I
		±0.25pF( <b>C</b> )	GJM0335C1E5R9CB01D	GJM1555C1H5R9CB01
			GJM0335C1E5R9DB01D	GJM1555C1H5R9DB01I
	6.0pF( <b>6R0</b> )	±0.5pF( <b>D</b> ) ±0.05pF( <b>W</b> )	GJM0335C1E6R0WB01D	GJM1555C1H6R0WB01
ries	0.0pr ( <b>01.0</b> )	±0.1pF( <b>B</b> )	GJM0335C1E6R0BB01D	GJM1555C1H6R0BB01E
Se				
GMA Series		±0.25pF( <b>C</b> )	GJM0335C1E6R0CB01D	GJM1555C1H6R0CB01
G	6.1pF( <b>6R1</b> )	±0.5pF( <b>D</b> )	GJM0335C1E6R0DB01D	GJM1555C1H6R0DB011 GJM1555C1H6R1WB011
	0. TPF( <b>0K I</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R1WB01D	
		±0.1pF( <b>B</b> )	GJM0335C1E6R1BB01D	GJM1555C1H6R1BB01I
		±0.25pF( <b>C</b> )	GJM0335C1E6R1CB01D	GJM1555C1H6R1CB01
SS	( )mF( <b>CD</b> 2)	±0.5pF( <b>D</b> )	GJM0335C1E6R1DB01D	GJM1555C1H6R1DB01
Serie	6.2pF( <b>6R2</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R2WB01D	GJM1555C1H6R2WB01I
D S		±0.1pF( <b>B</b> )	GJM0335C1E6R2BB01D	GJM1555C1H6R2BB01E
<b>GMD</b> Series		±0.25pF( <b>C</b> )	GJM0335C1E6R2CB01D	GJM1555C1H6R2CB01E
		±0.5pF( <b>D</b> )	GJM0335C1E6R2DB01D	GJM1555C1H6R2DB01D
	6.3pF( <b>6R3</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R3WB01D	GJM1555C1H6R3WB01I
		±0.1pF( <b>B</b> )	GJM0335C1E6R3BB01D	GJM1555C1H6R3BB011
		±0.25pF( <b>C</b> )	GJM0335C1E6R3CB01D	GJM1555C1H6R3CB01
		±0.5pF( <b>D</b> )	GJM0335C1E6R3DB01D	GJM1555C1H6R3DB01E

90

08

Product ID 2 Series **5**Temperature Characteristics 8Capacitance Tolerance

3 Dimensions (LxW) 6 Rated Voltage Individual Specification Code

**4** Dimension (T) Dimension (1)CapacitancePackaging

0 0 0 0 0 0 Packaging Code in Part Number shows STD 180mm Reel Taping.

(Part Number) **GJ M 03 3 5C 1E 5R2 W B01 D** 

92



LxW [mm]		0.6x0.3( <b>03</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
Rated Volt. [Vdc]	-	25( <b>1E</b> )	50( <b>1H</b> )
Capacitance	Tolerance	Part N	
6.4pF( <b>6R4</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R4WB01D	GJM1555C1H6R4WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E6R4BB01D	GJM1555C1H6R4BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E6R4CB01D	GJM1555C1H6R4CB01D
	±0.5pF( <b>D</b> )	GJM0335C1E6R4DB01D	GJM1555C1H6R4DB01D
6.5pF( <b>6R5</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R5WB01D	GJM1555C1H6R5WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E6R5BB01D	GJM1555C1H6R5BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E6R5CB01D	GJM1555C1H6R5CB01D
	±0.5pF( <b>D</b> )	GJM0335C1E6R5DB01D	GJM1555C1H6R5DB01D
6.6pF( <b>6R6</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R6WB01D	GJM1555C1H6R6WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E6R6BB01D	GJM1555C1H6R6BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E6R6CB01D	GJM1555C1H6R6CB01D
	±0.5pF( <b>D</b> )	GJM0335C1E6R6DB01D	GJM1555C1H6R6DB01D
6.7pF( <b>6R7</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R7WB01D	GJM1555C1H6R7WB01D
	±0.1pF( <b>B</b> )	GJM0335C1E6R7BB01D	GJM1555C1H6R7BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E6R7CB01D	GJM1555C1H6R7CB01D
	±0.5pF( <b>D</b> )	GJM0335C1E6R7DB01D	GJM1555C1H6R7DB01D
6.8pF( <b>6R8</b> )	±0.05pF( <b>W</b> )	GJM0335C1E6R8WB01D	GJM1555C1H6R8WB01D
0.80F( <b>0K8</b> )			
	±0.1pF( <b>B</b> )	GJM0335C1E6R8BB01D	GJM1555C1H6R8BB01D
	±0.25pF( <b>C</b> )	GJM0335C1E6R8CB01D	GJM1555C1H6R8CB01D
	±0.5pF( <b>D</b> )	GJM0335C1E6R8DB01D	GJM1555C1H6R8DB01D
6.9pF( <b>6R9</b> )	±0.05pF( <b>W</b> )	GJM0336C1E6R9WB01D	GJM1555C1H6R9WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E6R9BB01D	GJM1555C1H6R9BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E6R9CB01D	GJM1555C1H6R9CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E6R9DB01D	GJM1555C1H6R9DB01D
7.0pF( <b>7R0</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R0WB01D	GJM1555C1H7R0WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E7R0BB01D	GJM1555C1H7R0BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E7R0CB01D	GJM1555C1H7R0CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E7R0DB01D	GJM1555C1H7R0DB01D
7.1pF( <b>7R1</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R1WB01D	GJM1555C1H7R1WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E7R1BB01D	GJM1555C1H7R1BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E7R1CB01D	GJM1555C1H7R1CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E7R1DB01D	GJM1555C1H7R1DB01D
7.2pF( <b>7R2</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R2WB01D	GJM1555C1H7R2WB01D
,	±0.1pF( <b>B</b> )	GJM0336C1E7R2BB01D	GJM1555C1H7R2BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E7R2CB01D	GJM1555C1H7R2CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E7R2DB01D	GJM1555C1H7R2DB01D
7.3pF( <b>7R3</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R3WB01D	GJM1555C1H7R3WB01D
7.3pr ( <b>713</b> )	±0.1pF( <b>B</b> )	GJM0336C1E7R3BB01D	GJM1555C1H7R3BB01D
		GJM0336C1E7R3CB01D	GJM1555C1H7R3CB01D
	±0.25pF( <b>C</b> )		
7 400 / 70 /	±0.5pF( <b>D</b> )	GJM0336C1E7R3DB01D	GJM1555C1H7R3DB01D
7.4pF( <b>7R4</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R4WB01D	GJM1555C1H7R4WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E7R4BB01D	GJM1555C1H7R4BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E7R4CB01D	GJM1555C1H7R4CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E7R4DB01D	GJM1555C1H7R4DB01D
7.5pF( <b>7R5</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R5WB01D	GJM1555C1H7R5WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E7R5BB01D	GJM1555C1H7R5BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E7R5CB01D	GJM1555C1H7R5CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E7R5DB01D	GJM1555C1H7R5DB01D
7.6pF( <b>7R6</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R6WB01D	GJM1555C1H7R6WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E7R6BB01D	GJM1555C1H7R6BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E7R6CB01D	GJM1555C1H7R6CB01D
	+		

The part number code is shown in ( ) and Unit is shown in [ ].  $\hfill <>:$  EIA [inch] Code

muRata

For General GRM Series

Array GNM Series

Low ESL LL□ Series

SS	Tempera	ture Com	pensating Type C	0G(5C)/C0H(6C)
GRM Series	LxW [mm]		0.6x0.3( <b>03</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
Ž	Rated Volt. [Vdc]	1	25( <b>1E</b> )	50( <b>1H</b> )
5	Capacitance	Tolerance	. ,	umber
	7.7pF( <b>7R7</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R7WB01D	GJM1555C1H7R7WB01I
	7.7 pr ( <b>111</b> )	±0.1pF( <b>B</b> )	GJM0336C1E7R7BB01D	GJM1555C1H7R7BB01I
		±0.25pF( <b>C</b> )	GJM0336C1E7R7CB01D	GJM1555C1H7R7CB01I
s		±0.5pF( <b>D</b> )	GJM0336C1E7R7DB01D	GJM1555C1H7R7DB011
<b>GNM Series</b>	7.8pF( <b>7R8</b> )		GJM0336C1E7R8WB01D	GJM1555C1H7R8WB01
N S	7.opr( <b>7KO</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R8BB01D	GJM1555C1H7R8BB01I
NN		±0.1pF( <b>B</b> )		
0		±0.25pF( <b>C</b> )	GJM0336C1E7R8CB01D	GJM1555C1H7R8CB01I
	7.0	±0.5pF( <b>D</b> )	GJM0336C1E7R8DB01D	GJM1555C1H7R8DB01
	7.9pF( <b>7R9</b> )	±0.05pF( <b>W</b> )	GJM0336C1E7R9WB01D	GJM1555C1H7R9WB01
		±0.1pF( <b>B</b> )	GJM0336C1E7R9BB01D	GJM1555C1H7R9BB01I
es		±0.25pF( <b>C</b> )	GJM0336C1E7R9CB01D	GJM1555C1H7R9CB01I
L		±0.5pF( <b>D</b> )	GJM0336C1E7R9DB01D	GJM1555C1H7R9DB01
	8.0pF( <b>8R0</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R0WB01D	GJM1555C1H8R0WB01
1		±0.1pF( <b>B</b> )	GJM0336C1E8R0BB01D	GJM1555C1H8R0BB01I
		±0.25pF( <b>C</b> )	GJM0336C1E8R0CB01D	GJM1555C1H8R0CB01I
		±0.5pF( <b>D</b> )	GJM0336C1E8R0DB01D	GJM1555C1H8R0DB01I
	8.1pF( <b>8R1</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R1WB01D	GJM1555C1H8R1WB01
		±0.1pF( <b>B</b> )	GJM0336C1E8R1BB01D	GJM1555C1H8R1BB01I
ries		±0.25pF( <b>C</b> )	GJM0336C1E8R1CB01D	GJM1555C1H8R1CB01I
Se		±0.5pF( <b>D</b> )	GJM0336C1E8R1DB01D	GJM1555C1H8R1DB011
MU	8.2pF( <b>8R2</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R2WB01D	GJM1555C1H8R2WB01
G		±0.1pF( <b>B</b> )	GJM0336C1E8R2BB01D	GJM1555C1H8R2BB01I
		±0.25pF( <b>C</b> )	GJM0336C1E8R2CB01D	GJM1555C1H8R2CB01I
		±0.5pF( <b>D</b> )	GJM0336C1E8R2DB01D	GJM1555C1H8R2DB01I
	8.3pF( <b>8R3</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R3WB01D	GJM1555C1H8R3WB01
es		±0.1pF( <b>B</b> )	GJM0336C1E8R3BB01D	GJM1555C1H8R3BB01I
GOM Series		±0.25pF( <b>C</b> )	GJM0336C1E8R3CB01D	GJM1555C1H8R3CB01I
Σ		±0.5pF( <b>D</b> )	GJM0336C1E8R3DB01D	GJM1555C1H8R3DB01I
g	8.4pF( <b>8R4</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R4WB01D	GJM1555C1H8R4WB01
	- 1 <sup>-</sup> (- )	±0.1pF( <b>B</b> )	GJM0336C1E8R4BB01D	GJM1555C1H8R4BB01I
		±0.25pF( <b>C</b> )	GJM0336C1E8R4CB01D	GJM1555C1H8R4CB01I
		±0.5pF( <b>D</b> )	GJM0336C1E8R4DB01D	GJM1555C1H8R4DB01I
	8.5pF( <b>8R5</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R5WB01D	GJM1555C1H8R5WB01
ries	0.5pr ( <b>013</b> )	±0.1pF( <b>B</b> )	GJM0336C1E8R5BB01D	GJM1555C1H8R5BB01E
GMA Serie				GJM1555C1H8R5CB01E
MA		±0.25pF( <b>C</b> )	GJM0336C1E8R5CB01D	
G		±0.5pF( <b>D</b> )	GJM0336C1E8R5DB01D	GJM1555C1H8R5DB01
	8.6pF( <b>8R6</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R6WB01D	GJM1555C1H8R6WB01I
		±0.1pF( <b>B</b> )	GJM0336C1E8R6BB01D	GJM1555C1H8R6BB01I
		±0.25pF( <b>C</b> )	GJM0336C1E8R6CB01D	GJM1555C1H8R6CB01I
S		±0.5pF( <b>D</b> )	GJM0336C1E8R6DB01D	GJM1555C1H8R6DB01
GMD Series	8.7pF( <b>8R7</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R7WB01D	GJM1555C1H8R7WB01
DS		±0.1pF( <b>B</b> )	GJM0336C1E8R7BB01D	GJM1555C1H8R7BB01[
M		±0.25pF( <b>C</b> )	GJM0336C1E8R7CB01D	GJM1555C1H8R7CB01I
0		±0.5pF( <b>D</b> )	GJM0336C1E8R7DB01D	GJM1555C1H8R7DB011
	8.8pF( <b>8R8</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R8WB01D	GJM1555C1H8R8WB01
		±0.1pF( <b>B</b> )	GJM0336C1E8R8BB01D	GJM1555C1H8R8BB01I
		±0.25pF( <b>C</b> )	GJM0336C1E8R8CB01D	GJM1555C1H8R8CB01D
		±0.20pr ( <b>0</b> )		

(Part Number) **GJ M 03 3 6C 1E 7R7 W B01 D** 0 0 0 0 0 0 08 90 Product ID 2 Series **5**Temperature Characteristics 8Capacitance Tolerance

3 Dimensions (LxW) 6 Rated Voltage Individual Specification Code

**4**Dimension (T) Dimension (1)CapacitancePackaging

Packaging Code in Part Number shows STD 180mm Reel Taping.

94

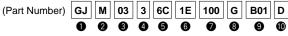
Product Information

LxW [mm]		0.6x0.3( <b>03</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
Rated Volt. [Vdc	-	25( <b>1E</b> )	50( <b>1H</b> )
Capacitance	Tolerance	Part N	umber
8.9pF( <b>8R9</b> )	±0.05pF( <b>W</b> )	GJM0336C1E8R9WB01D	GJM1555C1H8R9WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E8R9BB01D	GJM1555C1H8R9BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E8R9CB01D	GJM1555C1H8R9CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E8R9DB01D	GJM1555C1H8R9DB01D
9.0pF( <b>9R0</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R0WB01D	GJM1555C1H9R0WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E9R0BB01D	GJM1555C1H9R0BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R0CB01D	GJM1555C1H9R0CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R0DB01D	GJM1555C1H9R0DB01D
9.1pF( <b>9R1</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R1WB01D	GJM1555C1H9R1WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E9R1BB01D	GJM1555C1H9R1BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R1CB01D	GJM1555C1H9R1CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R1DB01D	GJM1555C1H9R1DB01D
9.2pF( <b>9R2</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R2WB01D	GJM1555C1H9R2WB01D
,	±0.1pF( <b>B</b> )	GJM0336C1E9R2BB01D	GJM1555C1H9R2BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R2CB01D	GJM1555C1H9R2CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R2DB01D	GJM1555C1H9R2DB01D
9.3pF( <b>9R3</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R3WB01D	GJM1555C1H9R3WB01D
(erre)	±0.1pF( <b>B</b> )	GJM0336C1E9R3BB01D	GJM1555C1H9R3BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R3CB01D	GJM1555C1H9R3CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R3DB01D	GJM1555C1H9R3DB01D
9.4pF( <b>9R4</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R4WB01D	GJM1555C1H9R4WB01D
7.4pi ( <b>31(4</b> )	±0.1pF( <b>B</b> )	GJM0336C1E9R4BB01D	GJM1555C1H9R4BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R4CB01D	GJM1555C1H9R4CB01D
		GJM0336C1E9R4DB01D	GJM1555C1H9R4DB01D
9.5pF( <b>9R5</b> )	±0.5pF( <b>D</b> )		
9.5pr( <b>9R5</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R5WB01D	GJM1555C1H9R5WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E9R5BB01D	GJM1555C1H9R5BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R5CB01D	GJM1555C1H9R5CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R5DB01D	GJM1555C1H9R5DB01D
9.6pF( <b>9R6</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R6WB01D	GJM1555C1H9R6WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E9R6BB01D	GJM1555C1H9R6BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R6CB01D	GJM1555C1H9R6CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R6DB01D	GJM1555C1H9R6DB01D
9.7pF( <b>9R7</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R7WB01D	GJM1555C1H9R7WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E9R7BB01D	GJM1555C1H9R7BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R7CB01D	GJM1555C1H9R7CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R7DB01D	GJM1555C1H9R7DB01D
9.8pF( <b>9R8</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R8WB01D	GJM1555C1H9R8WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E9R8BB01D	GJM1555C1H9R8BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R8CB01D	GJM1555C1H9R8CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R8DB01D	GJM1555C1H9R8DB01D
9.9pF( <b>9R9</b> )	±0.05pF( <b>W</b> )	GJM0336C1E9R9WB01D	GJM1555C1H9R9WB01D
	±0.1pF( <b>B</b> )	GJM0336C1E9R9BB01D	GJM1555C1H9R9BB01D
	±0.25pF( <b>C</b> )	GJM0336C1E9R9CB01D	GJM1555C1H9R9CB01D
	±0.5pF( <b>D</b> )	GJM0336C1E9R9DB01D	GJM1555C1H9R9DB01D

The part number code is shown in ( ) and Unit is shown in [ ].  $\hfill <>:$  EIA [inch] Code



LxW [mm]		0.6x0.3( <b>0</b>	<b>3</b> )<0201>	1.0x0.5( <b>15</b> )<0402>
Rated Volt. [Vdc]	]	25( <b>1E</b> )	6.3 <b>(0J</b> )	50( <b>1H</b> )
Capacitance	Tolerance		Part Number	
10pF( <b>100</b> )	±2%( <b>G</b> )	GJM0336C1E100GB01D		GJM1555C1H100GB01
	±5%( <b>J</b> )	GJM0336C1E100JB01D		GJM1555C1H100JB01
11pF( <b>110</b> )	±2%( <b>G</b> )	GJM0336C1E110GB01D		GJM1555C1H110GB01
	±5%( <b>J</b> )	GJM0336C1E110JB01D		GJM1555C1H110JB01
12pF( <b>120</b> )	±2%( <b>G</b> )	GJM0336C1E120GB01D		GJM1555C1H120GB01
	±5%( <b>J</b> )	GJM0336C1E120JB01D		GJM1555C1H120JB01
13pF( <b>130</b> )	±2%( <b>G</b> )	GJM0336C1E130GB01D		GJM1555C1H130GB01
	±5%( <b>J</b> )	GJM0336C1E130JB01D		GJM1555C1H130JB01
15pF( <b>150</b> )	±2%( <b>G</b> )	GJM0336C1E150GB01D		GJM1555C1H150GB01
	±5%( <b>J</b> )	GJM0336C1E150JB01D		GJM1555C1H150JB01
16pF( <b>160</b> )	±2%( <b>G</b> )	GJM0336C1E160GB01D		GJM1555C1H160GB01
	±5%( <b>J</b> )	GJM0336C1E160JB01D		GJM1555C1H160JB01
18pF( <b>180</b> )	±2%( <b>G</b> )	GJM0336C1E180GB01D		GJM1555C1H180GB01
	±5%( <b>J</b> )	GJM0336C1E180JB01D		GJM1555C1H180JB01
20pF( <b>200</b> )	±2%( <b>G</b> )	GJM0336C1E200GB01D		GJM1555C1H200GB01
	±5%( <b>J</b> )	GJM0336C1E200JB01D		GJM1555C1H200JB01
22pF( <b>220</b> )	±2%( <b>G</b> )		GJM0335C0J220GB01D	
	±5%( <b>J</b> )	1	GJM0335C0J220JB01D	
24pF( <b>240</b> )	±2%( <b>G</b> )		GJM0335C0J240GB01D	
	±5%( <b>J</b> )	1	GJM0335C0J240JB01D	
27pF( <b>270</b> )	±2%( <b>G</b> )		GJM0335C0J270GB01D	
	±5%( <b>J</b> )		GJM0335C0J270JB01D	
30pF( <b>300</b> )	±2%( <b>G</b> )		GJM0335C0J300GB01D	
	±5%( <b>J</b> )		GJM0335C0J300JB01D	
33pF( <b>330</b> )	±2%( <b>G</b> )		GJM0335C0J330GB01D	
	±5%( <b>J</b> )	1	GJM0335C0J330JB01D	]



Packaging Code in Part Number shows STD 180mm Reel Taping.

Product ID 2 Series **5**Temperature Characteristics 8 Capacitance Tolerance

3 Dimensions (LxW) 6 Rated Voltage Individual Specification Code

**4**Dimension (T) Capacitance Packaging

Monolithic Microchip GMA Series

For Bonding GMD Series

Product Information

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 This PDF catalog has only typical specifications because there is no space for detailed specifications. Therefore, please approve our product specifications or transact the approval sheet for product specifications before ordering.
 10.12.20

## GJM Series Specifications and Test Methods

			Specifications				
No. Item		em Temperature Compensating Type		Test Method			
1	Operating Temperati	ure Range	−55 to +125℃	Reference Temperature: 25℃ (2C, 3C, 4C: 20℃)			
2	Rated Voltage		See the previous pages.	be applied continuou When AC voltage is	defined as the maximum voltage that may usly to the capacitor. superimposed on DC voltage, $V^{P,P}$ or $V^{O,P}$ , should be maintained within the rated		
3	Appeara	earance No defects or abnormalities Visual inspection					
4	Dimensions		Within the specified dimensions	Using calipers			
5	Dielectric Strength		No defects or abnormalities	No failure should be observed when 300% of the rated voltage is applied between the terminations for 1 to 5 seconds, provided the charge/discharge current is less than 50mA.			
6	Insulation Resistance (I.R.)		10,000M $\Omega$ min. or 500 $\Omega$ · F min. (whichever is smaller)	The insulation resistance should be measured with a DC voltage not exceeding the rated voltage at $25^{\circ}$ C and $75^{\circ}$ RH max. and within 2 minutes of charging.			
7	Capacita	vacitance Within the specified tolerance The capacitance/Q should be measured at 25°C at					
			30pF and over: Q≧1000		ge shown in the table.		
8	Q		30pF and below: Q≧400+20C	Frequency	1±0.1MHz		
			C: Nominal Capacitance (pF)	Voltage	0.5 to 5Vrms		
	Temperature Coefficient		Within the specified tolerance (Table A)	The capacitance change should be measured after 5 min. at each specified temperature stage. Temperature Compensating Type			
9	Capacitance Temperature Characteristics Drift	ure Capacitance Within ±0.2% or ±0.05pF	· ·	capacitance measur When cycling the ter 5, (5C: +25 to 125°C capacitance should temperature coefficie The capacitance drif between the maximu 1, 3 and 5 by the cap	efficient is determined using the red in step 3 as a reference. mperature sequentially from step 1 through to ther temp. coeffs.: +20 to 125°C) the be within the specified tolerance for the ent and capacitance change as in Table A. It is calculated by dividing the differences um and minimum measured values in steps pacitance value in step 3.		
				Step	Temperature (°C)		
			<u> </u>	Reference Temp. ±2 -55±3			
				3	Reference Temp. ±2		
				4	125±3		
				5	Reference Temp. ±2		
					to the test jig (glass epoxy board) shown in c solder. Then apply a 5N* force in parallel 0±1 sec. The soldering should be done either the reflow method and should be conducted soldering is uniform and free of defects such *2N (GJM03)		
10		Adhesive Strength of Termination No removal of the terminations or other defect should occur.		rmination No removal of the terminations of other defect should occur.		a     b     c	
					(in mm)		
					Fig. 1		
_					Continued on the following page.		

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## GJM Series Specifications and Test Methods

#### Continued from the preceding page

	Gom Series Specifications and Test Methods									
		Continued from the preceding page.								
				Specifications	NA-H	-1				
	No.	Ite	em	Temperature Compensating Type	Test Method					
			Appearance		Solder the capacitor to the test jig (glass epoxy board) in the same manner and under the same conditions as (10). The capacitor should be subjected to a simple harmonic motio having a total amplitude of 1.5mm, the frequency being varied uniformly between the approximate limits of 10 and 55Hz. The frequency range, from 10 to 55Hz and return to 10Hz, should be traversed in approximately 1 minute. This motion should be applied for a period of 2 hours in each of 3 mutually perpendicular directions (total of 6 hours).					
	11		Capacitance	within the specified tolerance						
		Vibration Resistance	Q	30pF and over: Q≥1000having a total amplitude of 1.530pF and below: Q≥400+20Cuniformly between the approx30pF and below: Q≥400+20CThe frequency range, from 10Should be traversed in approxshould be traversed in approxshould be applied for a period						
		Appearance Capacitance Change			Solder the capacitor to the test jig (glass epoxy boards) showr in Fig. 2 using a eutectic solder. Then apply a force in the direction shown in Fig. 3.					
				Then apply a force in the direct						
	Change		(whichever is larger) The soldering should be done be conducted with care so that of defects such as heat shock	t the so						
	12	2 Deflection		Type         a         b         c           GJM03         0.3         0.9         0.3		surizing d: 1.0mm/sec. rize Flexure : ≤1				
				GJM03         0.3         0.9         0.3           GJM15         0.4         1.5         0.5         Capacitance	e meter					
				(in mm)	<mark>- 45 + 45 +</mark> (in m		m)			
				Fig. 2 Fig. 3						
	13	Solderabi Terminati	2	75% of the terminations are to be soldered evenly and continuously. rosin (JIS-K-5902) (25% rosin i Preheat at 80 to 120°C for 10 to immerse in eutectic solder solu	Immerse the capacitor in a solution of ethanol (JIS-K-8101) and rosin (JIS-K-5902) (25% rosin in weight proportion). Preheat at 80 to 120°C for 10 to 30 seconds. After preheating, immerse in eutectic solder solution for 2±0.5 seconds at 230±5 or Sn-3.0Ag-0.5Cu solder solution for 2±0.5 seconds at 245±5°					
				The measured and observed characteristics should satisfy the specifications in the following table.						
			Appearance	No marking defects						
		Resistance to Soldering Heat	Capacitance Change		Preheat the capacitor at 120 to 150°C for 1 minute. Immerse the capacitor in a eutectic solder or Sn-3.0Ag-0.5Cu solder solution at 270±5°C for 10±0.5 seconds. Let sit at room temperature for 24±2 hours.					
	14		Q	30pF and over: Q≥1000 solder solution at 270±5°C for						
			I.R.	More than 10,000M $\Omega$ or 500 $\Omega$ · F (whichever is smaller)	_					
			Dielectric Strength	No failure						
		Strength		The measured and observed characteristics should satisfy the specifications in the following table.						
			Appearance	No marking defects Fix the capacitor to the support	Fix the capacitor to the supporting jig in the same manner and under the same conditions as (10). Perform the five cycles according to the four heat treatments listed in the following table					
			Capacitance	Within ±2.5% or ±0.25pF according to the four heat treat						
	15	Temperature Cycle	Change	(whichever is larger)         Let sit for 24±2 hours at room           30pF and over: Q≥1000         Step         1	tempera 2	ature, then mea	sure.			
			Q	30pF and below: Q≧400+20C	Room	Max. Operating	Room			
			I.R.	C: Nominal Capacitance (pF)Temp. (C)Temp. $+0/-3$ More than 10,000MΩ or 500Ω · F (whichever is smaller)Time (min.) $30\pm3$	Temp. 2 to 3	Temp.+3/-0 30±3	Temp. 2 to 3			
			Dielectric Strength	No failure						
		Jueigut		The measured and observed characteristics should satisfy the specifications in the following table.						
			Appearance	No marking defects						
	16	Humidity, Steady	Capacitance Change	Within $\pm 5\%$ or $\pm 0.5 pF$ Let the capacitor sit at $40\pm 2\%$ (whichever is larger) $500\pm 12$ hours.						
		State	Q	30pF and below:       Q≥350       Remove and let sit for 24±2 h         10pF and over, 30pF and below:       Q≥275+ 5 C       type) at room temperature, the         10pF and below:       Q≥200+10C       type)         C: Nominal Capacitance (pF)       the		•	npensatin			
			I.R.	More than 10,000M $\Omega$ or 500 $\Omega \cdot F$ (whichever is smaller)						



### **GJM Series Specifications and Test Methods**

### Continued from the preceding page

			eding page. Specifications		For General GRM Series
No.	lte	em	Temperature Compensating Type	- Test Method	For ( GRN
		The measured and observed characteristics should satisfy the specifications in the following table.			
		Appearance	No marking defects		
17	Humidity Load	Capacitance Change	Within $\pm$ 7.5% or $\pm$ 0.75pF (whichever is larger)	Apply the rated voltage at 40±2℃ and 90 to 95% humidity for 500±12 hours. Remove and let sit for 24±2 hours at room temperature, then	y eries
	LUUU		measure. The charge/discharge current is less than 50mA.	Array GNM Series	
		I.R.	More than 500M\Omega or $25\Omega \cdot F$ (whichever is smaller)		
			The measured and observed characteristics should satisfy the specifications in the following table.		
	High Temperature Load	Appearance	No marking defects		Low ESL LL Series
18		Capacitance Change	Within $\pm 3\%$ or $\pm 0.3$ pF (whichever is larger)	Apply 200% of the rated voltage for 1000±12 hours at the maximum operating temperature ±3°C. Let sit for 24±2 hours (temperature compensating type) at room temperature, then	
10		30pF and over:	10pF and over, 30pF and below:         Q≥275+ ½ C           10pF and below:         Q≥200+10C	The charge/discharge current is less than 50mA.	
		I.R.	More than 1,000M $\Omega$ or 50 $\Omega \cdot F$ (whichever is smaller)		
19	ESR		0.1pF≦C≦1pF: 350mΩ · pF below 1pF <c≦5pf: 300mω="" below<br="">5pF<c≦10pf: 250mω="" below<="" td=""><td>The ESR should be measured at room temperature, and frequency 1±0.2GHz with the equivalent of BOONTON Model 34A.</td><td>l-Q eries</td></c≦10pf:></c≦5pf:>	The ESR should be measured at room temperature, and frequency 1±0.2GHz with the equivalent of BOONTON Model 34A.	l-Q eries
			10pF <c≦33pf: 400mω="" below<="" td=""><td>The ESR should be measured at room temperature, and frequency 500±50MHz with the equivalent of HP8753B.</td><td>High-Q GJM Series</td></c≦33pf:>	The ESR should be measured at room temperature, and frequency 500±50MHz with the equivalent of HP8753B.	High-Q GJM Series

### Table A

#### (1) Capacitance Change from 25℃ Value (%) Temp. Coeff. \_55℃ \_30℃ \_10℃ Char. Code . (ppm/℃) \*1 Max. Min. Max. Min. Max. Min. 5C 0±30 0.58 -0.24 0.40 -0.17 0.25 -0.11 -0.21 0.38 6C $0\pm60$ 0.87 -0.48 0.60 -0.33

\*1: Nominal values denote the temperature coefficient within a range of 25 to 125°C.

(2)

	Nominal Values (ppm/℃) *2	Capacitance Change from 20°C Value (%)					
Char.		_55℃		-25°C		_10℃	
	(ppm/c) · z	Max.	Min.	Max.	Min.	Max.	Min.
2C	0±60	0.82	-0.45	0.49	-0.27	0.33	-0.18
3C	0±120	1.37	-0.90	0.82	-0.54	0.55	-0.36
4C	0±250	2.56	-1.88	1.54	-1.13	1.02	-0.75

High Frequency GOM Series

**GMA** Series

