

Precision Rods (Tolerance h7/g6)

1045 Carbon Steel or Equivalent, 303 Stainless Steel, 304 Stainless Steel

Precision Rods – 1045 Carbon Steel or Equivalent, 303 Stainless Steel, 304 Stainless Steel

Type	D Tolerance	Material	Surface Treatment
RGOC	h7	1045 Carbon Steel or Equivalent	—
RGBOB			Black Oxide
RGOM			Electroless Nickel Plating
RGOF			—
RGOS	g6	303 Stainless Steel	—
RGOCG		304 Stainless Steel	—
RGOFG		1045 Carbon Steel or Equivalent	—

L Dimension Tolerance		
More Than	or Less	Tolerance
10	30	±0.2
31	120	±0.3
121	400	±0.5
401	1000	±0.8

C Dimension		
More Than	or Less	C
D3	D16	0.5
D17	D30	1.0

Precision Rod

Part Number	D	L
Type	D	Specify in 1mm increment
RGOC RGBOB RGOM RGOF RGOS RGOCG RGOFG	3	10-250
	4	
	5	
	6	
	7	
	8	10-500
	9	
	10	
	11	
	12	
13	10-750	
14		
15		
16		
17		
18	10-900	
19		
20		
25		
30		20-1000

Part Number Example

Part Number - L

RGOC15 - 700

For the maximum L dimension in each D dimension, refer to the specification table shown above right.

For the Tolerance g6 304 Stainless Steel and 1045 Carbon Steel or Equivalent materials (black oxide and electroless nickel plating) refer to the Rotary Shaft Straight Type on P.854

Part Number Alterations

Part Number - L - (MC / WMC / LKC)

RGOC20 - 535 - MC8
RGOM18 - 200 - LKC

Alterations	One End Tapped	Both Ends Tapped	L Dimension Tolerance																																
Code	MC	WMC	LKC																																
Spec.	Adds a tap on one end. Ordering Code: MC8 6 ≤ D ≤ 30 When L ≤ Mx2, the tap goes through.	Adds taps on both ends. Ordering Code: WMC12 6 ≤ D ≤ 30 When L ≤ Mx4, the tap goes through.	Changes L Dimension Tolerance within ±0.05 Ordering Code: LKC																																
	<table border="1"> <thead> <tr> <th>D</th> <th>MC (Selection Range)</th> </tr> </thead> <tbody> <tr><td>6</td><td>3</td></tr> <tr><td>7, 8</td><td>3, 4</td></tr> <tr><td>9, 10</td><td>3, 4, 5</td></tr> <tr><td>11, 12, 13</td><td>3, 4, 5, 6</td></tr> <tr><td>14-18</td><td>3, 4, 5, 6, 8</td></tr> <tr><td>19, 20</td><td>3, 4, 5, 6, 8, 10, 12</td></tr> <tr><td>25, 30</td><td>3, 4, 5, 6, 8, 10, 12, 16</td></tr> </tbody> </table>	D	MC (Selection Range)	6	3	7, 8	3, 4	9, 10	3, 4, 5	11, 12, 13	3, 4, 5, 6	14-18	3, 4, 5, 6, 8	19, 20	3, 4, 5, 6, 8, 10, 12	25, 30	3, 4, 5, 6, 8, 10, 12, 16	<table border="1"> <thead> <tr> <th>D</th> <th>WMC (Selection Range)</th> </tr> </thead> <tbody> <tr><td>6</td><td>3</td></tr> <tr><td>7, 8</td><td>3, 4</td></tr> <tr><td>9, 10</td><td>3, 4, 5</td></tr> <tr><td>11, 12, 13</td><td>3, 4, 5, 6</td></tr> <tr><td>14-18</td><td>3, 4, 5, 6, 8</td></tr> <tr><td>19, 20</td><td>3, 4, 5, 6, 8, 10, 12</td></tr> <tr><td>25, 30</td><td>3, 4, 5, 6, 8, 10, 12, 16</td></tr> </tbody> </table>	D	WMC (Selection Range)	6	3	7, 8	3, 4	9, 10	3, 4, 5	11, 12, 13	3, 4, 5, 6	14-18	3, 4, 5, 6, 8	19, 20	3, 4, 5, 6, 8, 10, 12	25, 30	3, 4, 5, 6, 8, 10, 12, 16	
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Mini Rods

Mini Rods

Type	D Tolerance	Material	Hardness	Surface Treatment
MRS	0 -0.005	M2 Tool Steel	60 HRC min.	—
MRSB				Black Oxide
MRSM				Electroless Nickel Plating
MRSK				—
MRSD		W1-9 Tool Steel Hardened	60 HRC min.	—
MRSS		D2 Tool Steel		—
MRSF		440C Stainless Steel	56 HRC min.	—
MRSG		304 Stainless Steel	—	—
		P / M High-Speed Steel	65-68 HRC min.	—
MRSC		C 36000 Brass	—	—
		C 36000 Brass with Low Cadmium	—	—

Discoloration may occur on rod ends.

Part Number	D	L
Type	D	0.1 mm Increment
MRS MRSB MRSM MRSK MRSD MRSS MRSF MRSG MRSC	0.5	5.0-50.0
	0.6	
	0.7	
	0.8	
	0.9	
	1.0	
	1.1	
	1.2	
	1.3	
	1.4	
	1.5	5.0-70.0
	1.6	5.0-75.0
	1.7	5.0-80.0
	1.8	5.0-90.0
	1.9	5.0-100.0
	2.0	
	2.1	
	2.2	
	2.3	
	2.4	
	2.5	
	2.6	
	2.7	
	2.8	
	2.9	5.0-150.0
	3.0	
	3.1	
	3.2	
	3.3	
	3.4	
3.5		
3.6		
3.7		
3.8		
3.9		
4.0		
4.1		
4.2		
4.3		
4.4		
4.5		
4.6		
4.7		
4.8		
4.9		
5.0		

Part Number Example

Part Number - L

MRS1.2 - 60.0

Application Example

Part Number Alterations

Part Number - L - (AC)

MRS1.2 - 60.0 - AC1.0

Alteration	Code	Spec.
Point Taper	AC	Adds a 15° taper on the point. AC = Specify in 0.1 mm increment. 0.5 ≤ AC ≤ 10 D - 2(AC tan 15°) ≥ 0.2