# John Guest®

# Cartridge Systems



A simple, cost-effective way of securing tubes within your product

June 2011

# John Guest®

# **Tube OD Size Plastic Half Cartridges**

Plastic Half Cartridges have been designed to provide a simple, cost-effective method of integrating the *Super Speedfit*<sup>®</sup> technology into a wide variety of original equipment. The cartridge requires low insert loads, making it suitable for many different housing materials.

Plastic Half Cartridges consist of three components: a collet gripper, an O-ring of food grade materials and a plastic body with stainless steel teeth molded into the circumference.

Customers should ensure cartridges are suitable for their applications, materials and operating conditions.

For additional information consult our Technical Support Department.

Prices are subject to change without notice.

### **INCH SERIES**







GRAY ACETAL COLLET GRAY ACETAL BODY NITRILE O-ring

PART NO.	TUBE OD	BOX QTY
PM2804S	5/32"	1000
PI2806S	3/16"	1000
PI2808S	1/4"	1000
PM2808S	5/16"	1000
PI2812S	3/8"	1000
PI2816S	1/2"	500

Most sizes available with Blue, Red or White Collet, suffix B,R or W (Ex. Pl2808S-B)

Also available with double O-rings, please use suffix 2 (Ex. Pl2808S2).





GRAY ACETAL COLLET GRAY ACETAL BODY EPDM O-ring

PART NO.	TUBE OD	BOX QTY
PCI2808S	1/4"	1000
PCM2808S	5/16"	1000
PCI2812S	3/8"	1000
PCI2816S	1/2"	500





WHITE POLYPROPYLENE COLLET
WHITE POLYPROPYLENE BODY
FPDM O-ring

PARI NO.	OD	QTY		
PP2808W	1/4"	1000		
PP2812W	3/8"	1000		

PI2808W PM2808W	1/4" 5/16"	1000 1000	
	OD	QTY	
PART NO.	TUBE	вох	
<b>1000</b>			NITRILE O-rin
Ass			WHITE ACETAL COLLE

Also available with Blue or Red Collet, suffix B or R (Ex. Pl2808W-B).
Also available with double o-rings, please use

1000

3/8"

### HALF CARTRIDGE KIT



GRAY ACETAL COLLET GRAY ACETAL BODY

PART NO.	TUBE OD	BOX QTY	
NC2007-02S	1/4"	1000	
NC2007-03S	5/16"	1000	
NC2007-04S	3/8"	1000	

### **METRIC SERIES**



BLACK ACETAL COLLET BLACK ACETAL BODY NITRILE O-ring

TUBE OD	BOX QTY
6mm	1000
8mm	1000
10mm	1000
	6mm 8mm

Also available with double o-rings, please use suffix 2 (Ex. PM2806E2).

# **CTS Size Plastic Half Cartridges**

John Guest Copper Tube Size Plastic Half Cartridges have been designed for use in Plumbing, Recreational Vehicle and Marine Applications.

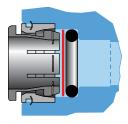
Half Cartridge bodies and collets are produced from high quality Engineered Thermoplastic materials with EPDM O-rings.

### **INCH SERIES**

PI2812W

suffix 2 (Ex. PI2808W2).





CTS Cartridge incorporate a spacer and an o-ring.

# **Tube OD Size Metal Half Cartridges**

Metal Half Cartridges are designed with the same Super Speedfit® technology as our Plastic Half Cartridges. As with Plastic Half Cartridges, Metal Half Cartridges are designed to provide a simple, cost-effective method of securing tubing into taps, manifolds, flow direction splitters and many other types of components, which can be produced in a wide variety of metals.

Metal Half Cartridges consist of three components: a collet gripper, an O-ring of food grade materials, and a metal body.

Customers should ensure cartridges are suitable for their applications, materials and operating conditions.

For additional information consult our Technical Support Department.

Prices are subject to change without notice.

#### **INCH SERIES**

93	<b>@</b> 0		GRAY ACETAL COLLET BRASS BODY NITRILE O-ring
PART NO.	TUBE OD	BOX QTY	
MM2804N	5/32"	1000	
MI2806N	3/16"	1000	
MI2808N	1/4"	1000	
MM2808N	5/16"	1000	
MI2812N	3/8"	1000	
MI2816N	1/2"	500	

Also available with double O-rings, please use suffix 2 (Ex. MM2804N2)



WHITE ACETAL COLLET ON 1/4"
BLACK ACETAL COLLET ON 5/8"
GRAY ACETAL COLLET ON 3/8" AND 5/8"
BRASS BODY
EPDM O-ring

PART NO.	TUBE	BOX	
	OD	QTY	
CM2804N	5/32"	1000	
CI2808W	1/4"	1000	
CI2812N	3/8"	1000	
CI2820N	5/8"	1000	





GRAY ACETAL COLLET STAINLESS STEEL BODY NITRILE O-ring

TUBE OD	BOX QTY
3/16"	1000
1/4"	1000
5/16"	1000
3/8"	1000
	3/16" 1/4" 5/16"

### **METRIC SERIES**

BLACK ACETAL COLLET ON 5, 6, 10 AND 12MM

GRAY ACETAL COLLET ON 4 AND 8MM

BRASS BODY

NITRILE O-ring

Also available with double O-rings, please use suffix 2 (Ex. MM2804N2)



# GRAY ACETAL COLLET ON 15 AND 22MM BRASS BODY EPDM O-ring ART NO. TUBE BOX OD QTY

1000

300

100

8mm

15mm

22mm

CM2808N

CM2815N

CM2822N

BLACK ACETAL COLLET ON 8MM

# **CTS Size Metal Half Cartridges**

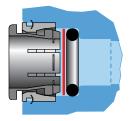
CTS size Metal Half Cartridges have also been designed for use in Plumbing, Recreational Vehicle and Marine Applications.

Bodies are produced from brass, Collets from high quality Engineered Thermoplastic materials with EPDM O-rings.

#### **INCH SERIES**



PART NO.	CTS	BOX QTY	
MWI2820	1/2"	250	
MWI2828	3/4"	100	
MWI2836	1"	100	



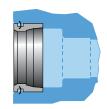
CTS Cartridge incorporate a spacer and an o-ring.

# **Half Cartridges**

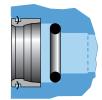
# **CARTRIDGE ASSEMBLY**



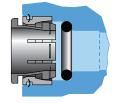
 Ensure that the cavity is clean and free from debris, burrs, score marks, etc.



2. Insert the cartridge down into the housing; ensure the cartridge is flush with the housing.

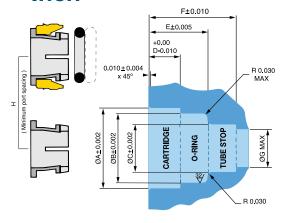


3. Insert the O-ring.



4. Insert Collet to complete assembly.

# Inch



### **Cavity Dimensional Detail (Inch)**

Tube OD	ØA	ØB	ØC	D	E1	<b>E2</b>	F1	F2	ØG	Н
5/32" *	0.492	0.327	0.163	0.193	0.350	0.445	0.504	0.598	0.13	0.59
5/32" **	0.472	0.327	0.163	0.193	0.350	0.445	0.504	0.598	0.13	0.59
3/16"	0.472	0.348	0.193	0.193	0.340	0.440	0.490	0.590	0.16	0.59
1/4"	0.528	0.424	0.255	0.181	0.386	0.480	0.555	0.650	0.23	0.67
5/16"	0.544	0.470	0.320	0.215	0.400	0.500	0.590	0.690	0.29	0.67
3/8"	0.632	0.547	0.380	0.270	0.465	0.565	0.720	0.815	0.35	0.79
1/2"	0.777	0.671	0.506	0.304	0.561	0.659	0.797	0.896	0.48	0.93
5/8"	0.935	0.836	0.638	0.335	0.703	-	1.093	-	0.50	1.06

All dimensions in inches

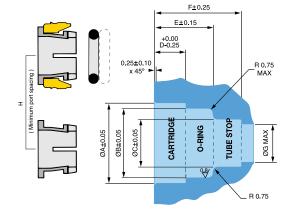
- \* Metal Half Cartridges.
- \*\* Plastic Half Cartridges.

E1 and F1 relate to one o-ring. E2 and F2 relate to two o-rings.

## **Cavity Dimensional Detail (CTS)**

Tube OD	ØA	ØB	ØC	D	E1	<b>E2</b>	F1	F2	ØG	Н	
1/2" CTS*	0.935	0.836	0.638	0.335	0.693	-	1.057		0.546	1.060	
1/2" CTS**	0.967	0.836	0.638	0.392	0.693	-	1.057	-	0.546	1.060	
3/4" CTS*	1.222	1.102	0.886	0.427	0.831	-	1.362		0.776	1.358	
3/4" CTS**	1.222	1.102	0.886	0.447	0.831	-	1.362	-	0.776	1.358	
1" CTS*	1.480	1.398	1.141	0.429	0.791	-	1.386	-	1.003	1.628	

## **Metric**



## **Cavity Dimensional Detail (Metric)**

Tube OD	ØA	ØB	ØC	D	E1	<b>E2</b>	F1	F2	ØG	Н
4mm *	12.50	8.30	4.14	4.90	8.90	11.30	12.80	15.20	3.30	15.0
4mm **	11.98	8.30	4.14	4.90	8.90	11.30	12.80	15.20	3.30	15.0
5mm	11.98	9.06	5.13	4.90	8.63	11.17	12.44	14.98	4.30	15.0
6mm	13.41	10.00	6.12	4.60	9.80	12.20	14.00	16.50	5.30	16.5
8mm	13.82	11.94	8.13	5.46	10.15	12.70	15.00	17.50	7.40	17.0
10mm	16.05	14.00	10.15	6.86	11.81	14.35	18.17	20.71	9.20	19.0
12mm*	19.10	16.54	12.15	8.65	15.50	19.00	23.50	27.00	11.20	22.0
12mm**	19.74	16.54	12.15	7.72	15.90	-	23.90	-	11.20	24.0
15mm	22.86	20.32	15.19	9.50	17.50	21.00	26.90	30.40	14.20	27.0
22mm	31.05	27.80	22.20	10.85	21.10	24.70	31.60	35.20	21.20	34.5

All dimensions in mm

- \* Metal Half Cartridges.
- \*\* Plastic Half Cartridges.

E1 and F1 relate to one o-ring. E2 and F2 relate to two o-rings.



### John Guest USA Inc.

180 Passaic Avenue PO Box 11085 Fairfield, NJ 07004
Tel: 973-808-5600 Toll Free: 1-800-94-JG USA Fax: 973-808-5036 Toll Free Fax: 1-877-77-JG FAX
Web: www.johnguest.com Email: info@jgusa.com