



# PN LINE



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PN 40

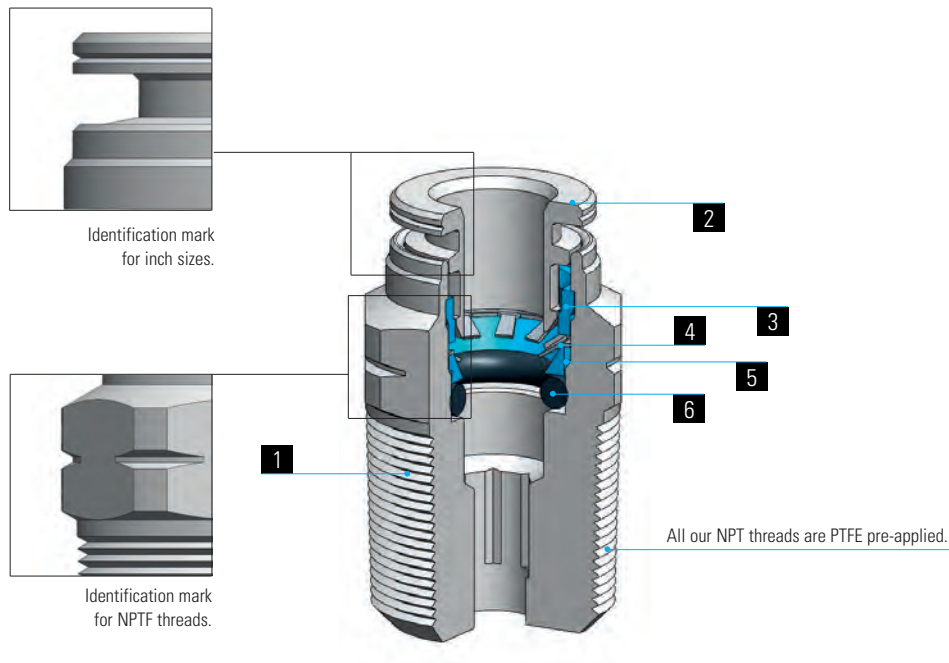
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1 - 2	3	4	5	6
Body and Release Ring	Tightness Ring	Gripping collet	Protection Ring	Seals
Brass UNI EN 12164 CW614N - UNI EN 12165 CW617N Nickel Plated	Acetal Resin (POM)	Stainless steel AISI 301	Acetal Resin (POM)	NBR (FPM on request)



## THE PN LINE

PN is C.MATIC highly performing, extremely compact push-in full metal fitting.

Our PN fittings are ready for use as all threads are PTFE pre-applied and no tools are requested to guarantee tight and pressure resistant assemblies.

The hose connection is made possible by the presence of a stainless steel gripper and by an O-ring inside of the fitting. To connect, simply push the tubing until it bottoms; the stainless steel teeth grip onto the tubing and holds it captive.

The great advantage of our special PTFE coating on threads makes sure that the fitting can be used several times without peeling off.

It is a full metal fitting and this makes of it the suitable fitting for the heaviest duty pneumatic applications.

## DATA SHEET

### Recommended tubings:

PA 6, PA 11, PA 12, Polyethylene PE, Polyurethane PU (95 durometer or above)

### Acceptable Tolerances on the tubings:

+/- .003

### Working Temperature:

from -4 °F up to 160°F

### Working Pressure:

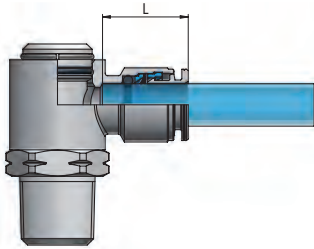
Pressure varies depending on the kind of tubing used and in any case it never has to exceed 261 psi.

Vacuum rating: to 28" Hg

### Application fields:

Pneumatic circuits.

## Tubing insertion depth



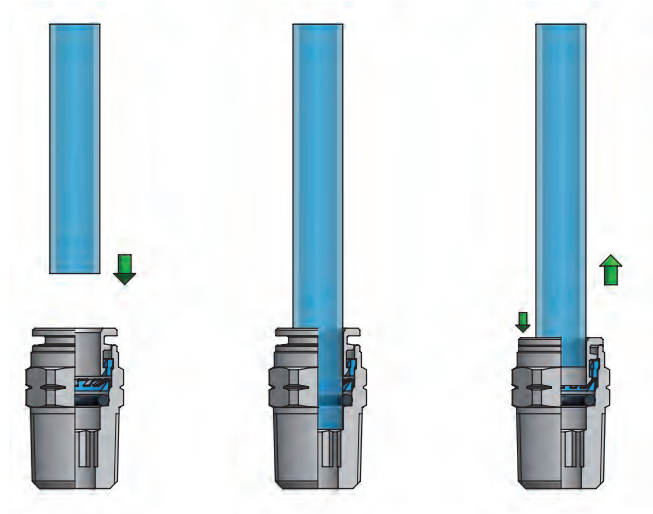
Tube OD	L
1/8	.386
5/32	.512
1/4	.622
5/16	.630
3/8	.720
1/2	.768

## ASSEMBLY INSTRUCTIONS

1. Cut the tube square (by means of a tube cutter i.e. our PA 34) making sure that no burrs are left and that the tube is not oval.
2. Insert the tube into the fitting until it bottoms.

### Tube release

While pressing on the release ring, pull out the tube from the fitting.



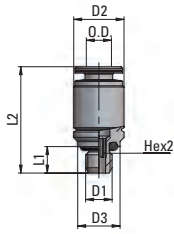
Our tapered male straight connector is provided with an inner hex allowing for easy assembly when no space is available.



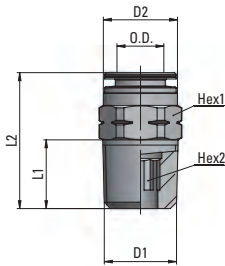
Once the tubing is connected to the fitting, make sure that the tubing is not subject to any tensile strength and that the min. recommended bending radius stated in the tubing section of this catalogue is complied with (see page 54). To prevent any accidental tube release, no components have to come in touch with the release ring and exercise any unwanted pressure on the same that. Indeed however lateral, any load on the release ring may cause the tube disconnection. To tighten threads, please check out our tightening torque chart illustrated at page 4.

## PN 11

### Taper Straight, male



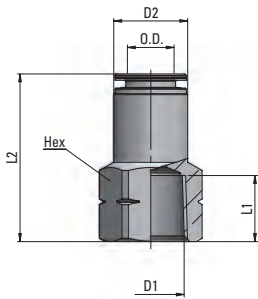
Part Number	Tube OD	D1 UNF	D2	D3	L1	L2	HEX2	oz $\triangle$
11 1/8 10-32	1/8	10-32	.276	.315	.197	.657	3/32	.088
11 5/32 10-32	5/32	10-32	.374	.315	.197	.787	3/32	.159
11 1/4 10-32	1/4	10-32	.472	.315	.197	.925	3/32	.300



Part Number	Tube OD	D1 NPTF	D2	L1	L2	HEX1	HEX2	oz $\triangle$
11 1/8 1/8	1/8	1/8	.276	.335	.728	7/16	3/32	.335
11 5/32 1/8	5/32	1/8	.374	.335	.728	7/16	1/8	.318
11 5/32 1/4	5/32	1/4	.374	.512	.945	9/16	1/8	.706
11 1/4 1/8	1/4	1/8	.472	.335	.866	1/2	5/32	.371
11 1/4 1/4	1/4	1/4	.472	.512	.965	9/16	5/32	.653
11 1/4 3/8	1/4	3/8	.472	.512	1.004	11/16	5/32	-
11 5/16 1/8	5/16	1/8	.551	.335	1.043	9/16	3/16	.529
11 5/16 1/4	5/16	1/4	.551	.512	1.004	9/16	1/4	.565
11 5/16 3/8	5/16	3/8	.551	.512	.984	11/16	1/4	.988
11 3/8 1/8	3/8	1/8	.630	.335	1.122	11/16	3/16	.794
11 3/8 1/4	3/8	1/4	.630	.512	1.260	11/16	1/4	.953
11 3/8 3/8	3/8	3/8	.630	.512	1.004	11/16	5/16	.900
11 3/8 1/2	3/8	1/2	.630	.669	1.201	7/8	5/16	1.976
11 1/2 1/4	1/2	1/4	.787	.512	1.358	13/16	5/16	1.253
11 1/2 3/8	1/2	3/8	.787	.512	1.161	13/16	13/32	.970
11 1/2 1/2	1/2	1/2	.787	.669	1.201	7/8	13/32	1.606

## PN 13

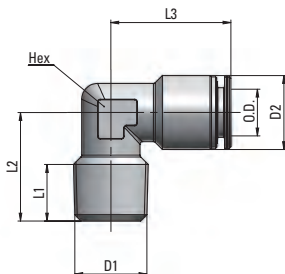
### Female Straight



Part Number	Tube OD	D1 NPTF	D2	L1	L2	HEX	oz $\triangle$
13 5/32 1/8	5/32	1/8	.374	.335	.984	1/2	.406
13 1/4 1/8	1/4	1/8	.472	.335	1.063	1/2	.494
13 1/4 1/4	1/4	1/4	.472	.492	1.240	11/16	.935
13 5/16 1/8	5/16	1/8	.551	.335	1.063	9/16	.706
13 5/16 1/4	5/16	1/4	.551	.492	1.240	11/16	1.006
13 3/8 1/4	3/8	1/4	.630	.492	1.339	11/16	1.147
13 3/8 3/8	3/8	3/8	.630	.492	1.339	13/16	1.323

## PN 14

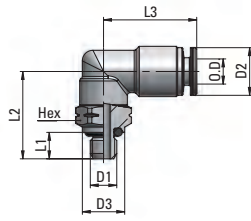
### Taper Elbow Fitting, male



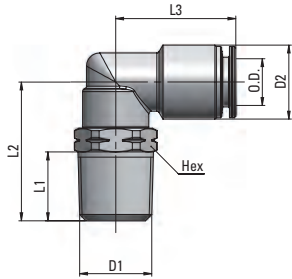
Part Number	Tube OD	D1 NPTF	D2	L1	L2	L3	HEX (mm)	oz $\triangle$
14 5/32 1/8	5/32	1/8	.374	.335	.630	.689	10	.318
14 1/4 1/8	1/4	1/8	.472	.335	.630	.807	10	.459
14 1/4 1/4	1/4	1/4	.472	.433	.787	.807	10	.600
14 5/16 1/8	5/16	1/8	.551	.335	.748	.886	12	.723
14 5/16 1/4	5/16	1/4	.551	.433	.807	.886	12	.794
14 3/8 1/4	3/8	1/4	.630	.472	.886	.984	14	1.041
14 3/8 3/8	3/8	3/8	.630	.433	.886	.984	14	1.182

## PN 15

### Taper Swivelling Elbow Fitting, male



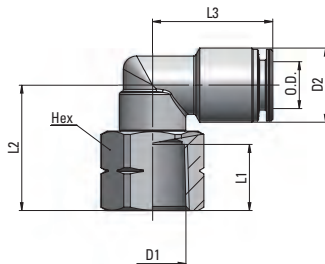
Part Number	Tube OD	D1 UNF	D2	D3	L1	L2	L3	HEX	oz
15 1/8 10-32	1/8	10-32	.276	.315	.197	.650	.539	3/8	.282
15 5/32 10-32	5/32	10-32	.374	.315	.197	.650	.689	3/8	.353



Part Number	Tube OD	D1 NPTF	D2	L1	L2	L3	HEX	oz
15 1/8 1/8	1/8	1/8	.276	.335	.728	.539	7/16	.371
15 5/32 1/8	5/32	1/8	.374	.335	.728	.689	7/16	.441
15 5/32 1/4	5/32	1/4	.374	.512	1.024	.748	9/16	.794
15 1/4 1/8	1/4	1/8	.472	.335	.827	.866	1/2	.688
15 1/4 1/4	1/4	1/4	.472	.512	1.024	.866	9/16	.865
15 1/4 3/8	1/4	3/8	.472	.512	1.043	.866	11/16	-
15 5/16 1/8	5/16	1/8	.551	.335	.827	.886	1/2	.812
15 5/16 1/4	5/16	1/4	.551	.512	.945	.886	9/16	.970
15 5/16 3/8	5/16	3/8	.551	.512	1.122	.886	11/16	1.411
15 3/8 1/8	3/8	1/8	.630	.335	.945	1.024	11/16	1.376
15 3/8 1/4	3/8	1/4	.630	.512	1.122	1.024	11/16	1.500
15 3/8 3/8	3/8	3/8	.630	.512	1.122	1.024	11/16	1.535
15 3/8 1/2	3/8	1/2	.630	.669	1.339	1.024	7/8	2.188
15 1/2 1/4	1/2	1/4	.787	.512	1.260	1.122	13/16	2.382
15 1/2 3/8	1/2	3/8	.787	.512	1.260	1.122	13/16	2.258
15 1/2 1/2	1/2	1/2	.787	.669	1.437	1.122	7/8	2.699

## PN 17

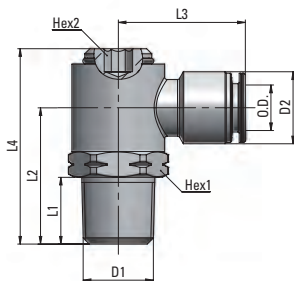
### Swivelling Elbow fitting, female



Part Number	Tube OD	D1 NPTF	D2	L1	L2	L3	HEX	oz
17 5/32 1/8	5/32	1/8	.374	.335	.768	.748	9/16	.741
17 1/4 1/8	1/4	1/8	.472	.335	.768	.866	9/16	.794
17 1/4 1/4	1/4	1/4	.472	.492	.925	.866	11/16	1.129
17 5/16 1/8	5/16	1/8	.551	.335	.768	.886	9/16	.935
17 5/16 1/4	5/16	1/4	.551	.492	.925	.886	11/16	1.288
17 3/8 1/4	3/8	1/4	.630	.492	.925	1.024	11/16	1.570
17 3/8 3/8	3/8	3/8	.630	.492	.925	1.024	13/16	1.711

## PN 18

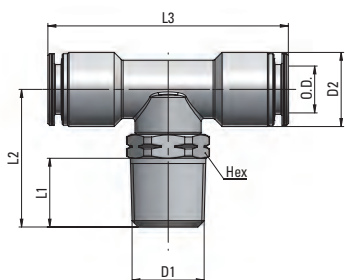
### Swivelling fitting with banjo ring



Part Number	Tube OD	D1 NPTF	D2	L1	L2	L3	L4	HEX1	HEX2	oz
18 5/32 1/8	5/32	1/8	.374	.335	.807	.807	1.220	9/16	1/8	1.006
18 1/4 1/8	1/4	1/8	.472	.335	.807	.886	1.220	9/16	1/8	1.059
18 1/4 1/4	1/4	1/4	.472	.512	1.043	.945	1.496	11/16	3/16	1.711
18 5/16 1/8	5/16	1/8	.551	.335	.807	.886	1.220	9/16	1/8	1.076
18 5/16 1/4	5/16	1/4	.551	.512	1.043	.965	1.496	11/16	3/16	1.747
18 5/16 3/8	5/16	3/8	.551	.512	1.142	1.043	1.654	13/16	1/4	-
18 3/8 1/4	3/8	1/4	.630	.512	1.043	1.043	1.496	11/16	3/16	1.835
18 3/8 3/8	3/8	3/8	.630	.512	1.142	1.142	1.654	13/16	1/4	2.964

## PN 20

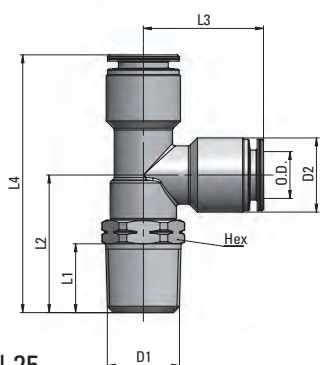
### Swivelling Tee fitting, taper



Part Number	Tube OD	D1 NPTF	D2	L1	L2	L3	HEX	oz
20 1/8 1/8	1/8	1/8	.276	.335	.827	1.260	1/2	.670
20 5/32 1/8	5/32	1/8	.374	.335	.827	1.535	1/2	.776
20 5/32 1/4	5/32	1/4	.374	.512	1.024	1.535	9/16	.953
20 1/4 1/8	1/4	1/8	.472	.335	.827	1.732	1/2	.900
20 1/4 1/4	1/4	1/4	.472	.512	1.024	1.732	9/16	1.076
20 5/16 1/8	5/16	1/8	.551	.335	.827	1.772	1/2	1.112
20 5/16 1/4	5/16	1/4	.551	.512	1.024	1.772	9/16	1.306
20 3/8 1/4	3/8	1/4	.630	.512	1.122	2.047	11/16	1.905
20 3/8 3/8	3/8	3/8	.630	.512	1.122	2.047	11/16	1.941
20 1/2 3/8	1/2	3/8	.787	.512	1.260	2.244	13/16	2.752
20 1/2 1/2	1/2	1/2	.787	.669	1.437	2.244	7/8	3.299

## PN 23

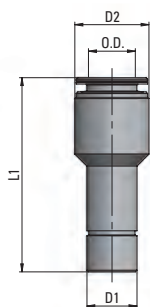
### Lateral Swivelling Tee fitting, taper



Part Number	Tube OD	D1 NPTF	D2	L1	L2	L3	L4	HEX	oz
23 1/8 1/8	1/8	1/8	.276	.335	.827	.630	1.457	1/2	.670
23 5/32 1/8	5/32	1/8	.374	.335	.827	.768	1.594	1/2	.812
23 5/32 1/4	5/32	1/4	.374	.512	1.024	.768	1.791	9/16	.953
23 1/4 1/8	1/4	1/8	.472	.335	.827	.866	1.693	1/2	.900
23 1/4 1/4	1/4	1/4	.472	.512	1.024	.866	1.890	9/16	1.076
23 5/16 1/8	5/16	1/8	.551	.335	.827	.886	1.713	1/2	1.112
23 5/16 1/4	5/16	1/4	.551	.512	1.024	.886	1.909	9/16	1.323
23 3/8 1/4	3/8	1/4	.630	.512	1.122	1.024	2.146	11/16	1.905
23 3/8 3/8	3/8	3/8	.630	.512	1.122	1.024	2.146	11/16	1.941
23 1/2 3/8	1/2	3/8	.787	.512	1.260	1.122	2.382	13/16	2.735
23 1/2 1/2	1/2	1/2	.787	.669	1.437	1.122	2.559	7/8	3.176

## PN 25

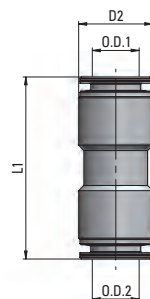
### Reducer



Part Number	Tube OD	D1	D2	L1	oz
25 1/8 5/32	1/8	5/32	.276	1.051	.088
25 5/32 1/4	5/32	1/4	.374	1.240	.265
25 1/4 5/16	1/4	5/16	.472	1.358	.406
25 1/4 3/8	1/4	3/8	.472	1.378	.476
25 1/4 1/2	1/4	1/2	.512	1.378	.882
25 5/16 3/8	5/16	3/8	.551	1.437	.547
25 3/8 1/2	3/8	1/2	.630	1.575	.865

## PN 26

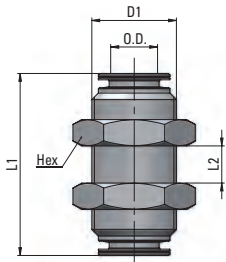
### Union



Part Number	Tube OD1	Tube OD2	D2	L1	oz
26 1/8 1/8	1/8	1/8	.276	.843	.106
26 5/32 5/32	5/32	5/32	.374	1.102	.265
26 1/4 1/4	1/4	1/4	.472	1.323	.476
26 5/16 5/16	5/16	5/16	.551	1.339	.635
26 3/8 3/8	3/8	3/8	.630	1.520	.882
26 1/2 1/2	1/2	1/2	.787	1.614	1.112

## PN 27

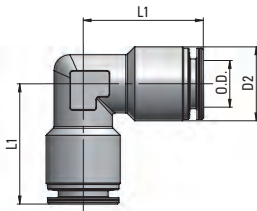
### Bulkhead union



Part Number	Tube OD	D1	L1	L2	HEX (mm)	oz
27 1/8 1/8	1/8	M10x1	.827	.177	14	.476
27 5/32 5/32	5/32	M12x1	1.102	.315	16	.812
27 1/4 1/4	1/4	M14x1	1.339	.571	18	1.147
27 5/16 5/16	5/16	M16x1	1.339	.571	20	1.376
27 3/8 3/8	3/8	M18x1	1.417	.689	22	1.888
27 1/2 1/2	1/2	M22x1,5	1.614	.728	26	1.941

## PN 28

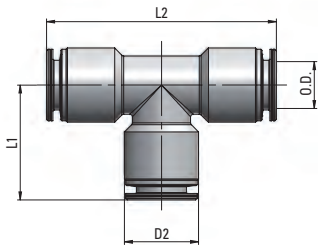
### Union Elbow



Part Number	Tube OD	D2	L1	oz
28 1/8 1/8	1/8	.276	.461	.159
28 5/32 5/32	5/32	.374	.689	.335
28 1/4 1/4	1/4	.472	.807	.547
28 5/16 5/16	5/16	.551	.886	.829
28 3/8 3/8	3/8	.630	.984	1.129
28 1/2 1/2	1/2	.787	1.063	1.817

## PN 29

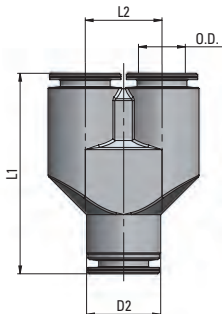
### Union Tee



Part Number	Tube OD	D2	L1	L2	oz
29 1/8 1/8	1/8	.276	.461	.921	.194
29 5/32 5/32	5/32	.374	.689	1.378	.441
29 1/4 1/4	1/4	.472	.787	1.575	.706
29 5/16 5/16	5/16	.551	.886	1.772	.988
29 3/8 3/8	3/8	.630	.965	1.929	1.500
29 1/2 1/2	1/2	.787	1.063	2.126	2.435

## PN 37

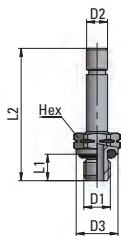
### Y Fitting



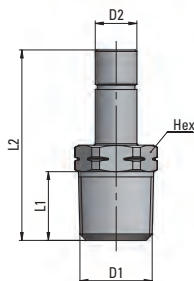
Part Number	Tube OD	D2	L1	L2	oz
37 1/8 1/8	1/8	.354	1.083	.374	.670
37 5/32 5/32	5/32	.354	1.161	.374	.476
37 1/4 1/4	1/4	.472	1.421	.492	1.076
37 5/16 5/16	5/16	.551	1.476	.571	1.482

## PN 38

### Stem adaptor



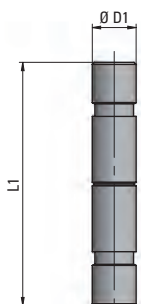
Part Number	D1 UNF	D2	D3	L1	L2	HEX	oz
38 5/32 10-32	10-32	5/32	.311	.197	.984	5/16	.088



Part Number	D1 NPTF	D2	L1	L2	HEX	oz
38 5/32 1/8	1/8	5/32	.335	1.142	7/16	.247
38 5/32 1/4	1/4	5/32	.512	1.339	9/16	.494
38 1/4 1/8	1/8	1/4	.335	1.220	7/16	.300
38 1/4 1/4	1/4	1/4	.512	1.417	9/16	.529
38 5/16 1/8	1/8	5/16	.335	1.220	7/16	.318
38 5/16 1/4	1/4	5/16	.512	1.417	9/16	.547
38 3/8 1/4	1/4	3/8	.512	1.496	9/16	.582
38 3/8 3/8	3/8	3/8	.512	1.516	11/16	.812
38 1/2 3/8	3/8	1/2	.512	1.634	11/16	.900
38 1/2 1/2	1/2	1/2	.669	1.831	7/8	1.517

## PN 39

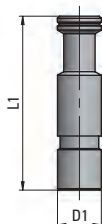
### Extention Piece



Part Number	D1	L1	oz
39 5/32 5/32	5/32	1.181	.099
39 1/4 1/4	1/4	1.378	.176
39 5/16 5/16	5/16	1.378	.194
39 3/8 3/8	3/8	1.575	.300
39 1/2 1/2	1/2	1.732	.494

## PN 40

### Plug

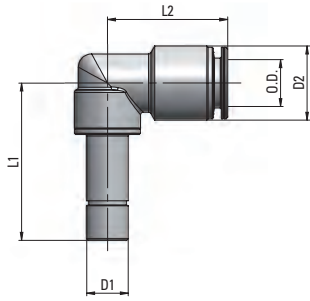



Part Number	D1	L1	oz
40 1/8 1/8	1/8	.787	.046
40 5/32 5/32	5/32	.984	.088
40 1/4 1/4	1/4	.984	.159
40 5/16 5/16	5/16	1.181	.441
40 3/8 3/8	3/8	1.378	.723
40 1/2 1/2	1/2	1.575	1.482



# PN 43

## Plug-in Elbow

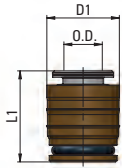


Part Number	Tube OD	D1	D2	L1	L2	oz 
43 5/32 00	5/32	5/32	.374	1.004	.748	.494
43 1/4 00	1/4	1/4	.427	1.161	.866	.600
43 5/16 00	5/16	5/16	.551	1.161	.886	.723
43 3/8 00	3/8	3/8	.630	1.319	1.024	1.059

The new construction features of the cartridge PN10 allow for one single cartridge version to be assembled in plastic, aluminium as well as brass bodies.

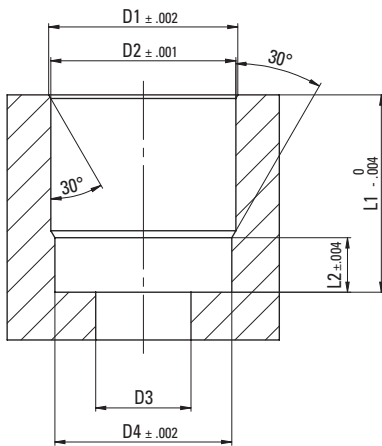
## PN 10

### Press-in Cartridge



Part Number	Tube OD	D1	L1	oz
10 5/32 00	5/32	.366	.571	.127
10 1/4 00	1/4	.472	.650	.201
10 5/16 00	5/16	.539	.669	.279
10 3/8 00	3/8	.602	.748	.363

### Cartridges seat drilling plan



Tube OD	D1	D2	D3	D4	L1	L2
5/32	.374	.362	.118	.339	.472	.126
1/4	.480	.469	.217	.445	.551	.157
5/16	.547	.535	.276	.512	.571	.157
3/8	.610	.598	.335	.575	.630	.157