

Series 10-KJ

Miniature one-touch fittings
Applicable tubing: $\varnothing 3.2$, $\varnothing 4$, $\varnothing 6$,
Connection thread: M3, M5, R1/8

Construction

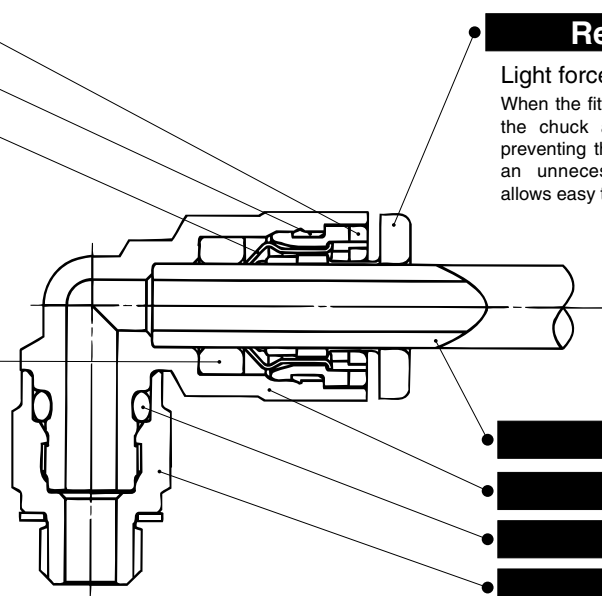


Guide 1 Guide 2 Chuck

Large retaining force
Has large retaining force while holding force is increased by the collet.

Seal

Can be used for a wide range of pressures from a low vacuum up to a pressure of 1.0 MPa.
The use of a special profile ensures sealing and reduces resistance when the tube is inserted.



Release button

Light force for removal
When the fitting is removed from the tubing, the chuck and collet are released, thus preventing them from biting into the tube to an unnecessary degree. Unique shape allows easy tube release.

Tube

Body

O-ring

Stud

Effective when piping in a confined space

- The body and the threaded portion can rotate (for positioning to some extent).
- Stud is electroless nickel plated.
- R1/8 with seal for thread

Specifications

Fluid	Air, water Note 1)
Maximum operating pressure	1.0MPa
Operating vacuum pressure	-100kPa
Proof pressure	3.0MPa
Ambient and fluid temperature	-5 to 60°C (No freezing)
Thread seal	With thread seal (Standard)
Grease	Fluorine grease
Particle generation grade (Refer to front matter pages 13 to 22 for details.)	Grade 3

Note 1) Applicable for general industrial water. Please consult with SMC if using for other kinds of fluid.
Also, the surge pressure must be under the maximum operating pressure.

Principal Parts Material

Model	10-KJ
Body	Stainless steel 303, C3604BD with electroless nickel plated, PBT
Stud	C3604BD (Thread portion) with electroless nickel plated
Chuck, Guide 2	Stainless steel 304
Release button, Guide 1	POM
Seal, O-ring	NBR
Gasket	Stainless steel 304, NBR

Applicable tubing

Tubing material	Polyurethane
Tubing O.D.	$\varnothing 3.2$, $\varnothing 4$, $\varnothing 6$

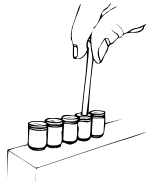
Model

Hex. socket head male connector

10-KJS



Internal hex. allows thread connection by using an allen wrench for confined spaces.

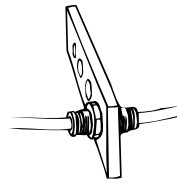


Bulkhead union

10-KJE



Use to connect tubes through a panel.

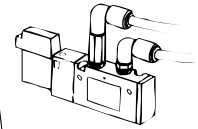


Extended male elbow

10-KJW



Basically, it is used together with male elbow. Different point is that it is used for fittings to avoid from interfering with each other by making the piping two-level.



Male connector

10-KJH



Use to pipe in the same direction from female thread. Most general style

Plug-in elbow

10-KJL



Use to change by 90° in a tube fetching direction from One-touch fittings.

Union "Y"

10-KJU



Use to branch line in the same direction.

Female connector

10-KJF



Use to pipe from male thread such as pressure gauge.

Reducer elbow

10-KJL



Use to change by 90° in tube fetching direction from One-touch fittings and to size down.

Different diameter union "Y"

10-KJU



Use to branch line with size down in the same direction.

Straight union

10-KJH



Use to connect tubes in the same direction.

Male branch tee

10-KJT



Use to branch line from female thread in both 90° directions.

Plug-in "Y"

10-KJU



Use to branch line in the same direction from One-touch fittings.

Different diameter straight

10-KJH



Use to connect different sized tubes.

Union tee

10-KJT



Use to connect tubes in both 90° directions.

Different diameter plug-in "Y"

10-KJX



Use to branch line with size down in the same direction from One-touch fittings.

Male elbow

10-KJL



Use to pipe at right angles to female threaded. Most general styles.

Different diameter tee

10-KJT



Use to connect tubes with size down in both 90° directions.

Branch "Y"

10-KJU



Use to branch line in the same direction from female thread.

Union elbow

10-KJL



Use to connect tubes at right angles.

Male run tee

10-KJY



Use to branch line in the same direction from female thread and in 90° direction.

Plug-in reducer

10-KJR



Use to size down One-touch fittings.

Air cylinder

Rotary actuator

Air gripper

Directional control valve

Flow control equipment

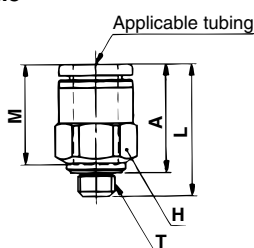
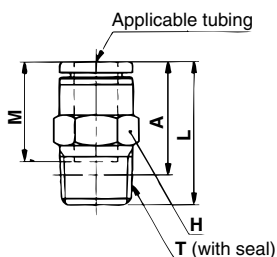
Filter, Pressure control equipment

Fittings & Tubing

Air preparation equipment

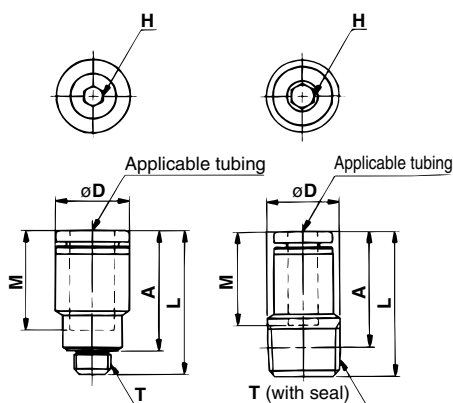
Pressure switch

Clean gas filter

Male connector: 10-KJH
M3, M5

R 1/8


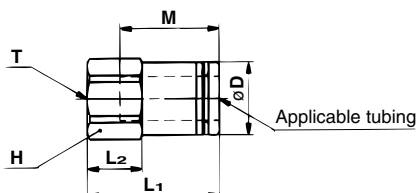
Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	L	A	M	Effective area (mm ²)	Weight (g)
							Urethane	
3.2	M3 x 0.5	10-KJH23-M3	7	16.3	13.7	12.7	0.9	1.6
	M5 x 0.8	10-KJH23-M5		16.7	13.6		2.5	2
	R1/8	10-KJH23-01S	10	13.8	9.8*			4.7
4	M3 x 0.5	10-KJH04-M3	8	16.3	13.7	12.7	0.9	1.9
	M5 x 0.8	10-KJH04-M5		17	13.9		4	2.4
	R1/8	10-KJH04-01S	10	14.8	10.8*			4.6
6	M5 x 0.8	10-KJH06-M5	10	17.8	14.7	13.5	4	3.3
	R1/8	10-KJH06-01S		19.4	15.4*		10	5.2

* Reference dimensions after R thread installation

Hexagon socket head male connector: 10-KJS
M3, M5
R 1/8


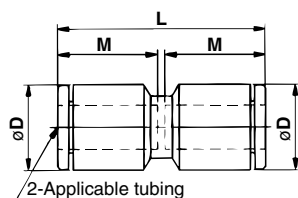
Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	D (Note)	L	A	M	Effective area (mm ²)	Weight (g)
								Urethane	
3.2	M3 x 0.5	10-KJS23-M3	1.5	7	16.3	13.7	12.7	1.4	1.3
	M5 x 0.8	10-KJS23-M5	2		19.7	16.6		2.5	2.8
4	M3 x 0.5	10-KJS04-M3	1.5	8	16.3	13.7	12.7	1.4	1.6
	M5 x 0.8	10-KJS04-M5	2.5		18.7	15.6		4	2.7
	R1/8	10-KJS04-01S	3	9.8	19.7	15.7*			5.4
6	M5 x 0.8	10-KJS06-M5	2.5	10	19.5	16.4	13.5	4	3.3
	R1/8	10-KJS06-01S	4		20	16*		10	5.2

* Reference dimensions after R thread installation
Note) øD indicates the maximum diameter.

Female connector: 10-KJF


Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	D (Note)	L1	L2	M	Effective area (mm ²)	Weight (g)
								Urethane	
3.2	M3 x 0.5	10-KJF23-M3	7	7	16.5	6.8	12.7	2.5	2.6
	M5 x 0.8	10-KJF23-M5			18.8	7.9			2.8
4	M3 x 0.5	10-KJF04-M3	8	8	16.1	6.4	12.7	4	3.2
	M5 x 0.8	10-KJF04-M5			18.7	7.8			3.8
6	M5 x 0.8	10-KJF06-M5	10	10	18	7.5	13.5	10	5.3

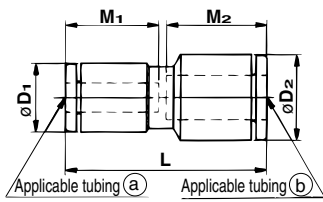
Note) øD indicates the maximum diameter.

Straight union: 10-KJH


Applicable tubing O.D. (mm)	Model	D (Note)	L	M	Effective area (mm ²)	Weight (g)
3.2	10-KJH23-00	8.4	26.3	12.7	2.5	1.4
4	10-KJH04-00	9.3	26.3	12.7	4	1.7
6	10-KJH06-00	11.6	28	13.5	10	2.5

Note) øD indicates the maximum diameter.

Different diameter straight: 10-KJH

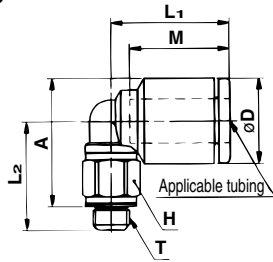


Applicable tubing O.D. (mm)		Model	D_1 (Note)	D_2 (Note)	L	M_1	M_2	Effective area (mm ²)	Weight (g)
(a)	(b)							Urethane	
3.2	4	10-KJH23-04	8.4	9.3	26.3	12.7	12.7	2.5	1.6
	6	10-KJH23-06		11.6	27.2		13.5		2
4	6	10-KJH04-06	9.3	11.6	27.2	12.7	13.5	4	2.2

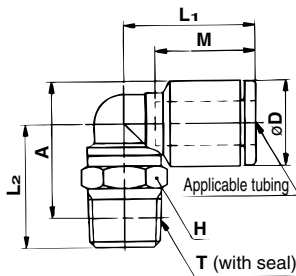
Note) ϕD_1 , ϕD_2 indicate the maximum diameter.

Male elbow: 10-KJL

M3, M5



R 1/8

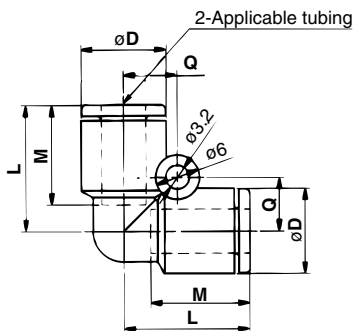


Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	D (Note)	L_1	L_2	A	M	Effective area (mm ²)	Weight (g)
									Urethane	
3.2	M3 x 0.5	10-KJL23-M3	7	8.4	15.3	12.5	14.1	12.7	0.8	2.1
	M5 x 0.8	10-KJL23-M5	7			13.2	14.3		2.2	2.5
	R1/8	10-KJL23-01S	10			15.2	15.4*			6.7
4	M3 x 0.5	10-KJL04-M3	7	9.3	15.6	13	15.1	12.7	0.8	2.2
	M5 x 0.8	10-KJL04-M5	7			13.7	15.3		3.5	2.7
	R1/8	10-KJL04-01S	10			15.7	16.4*			6.8
6	M5 x 0.8	10-KJL06-M5	7	11.6	16.1	14.7	17.4	13.5	3.5	3.2
	R1/8	10-KJL06-01S	10			17.8	18.5*		9	6.4

* Reference dimensions after R thread installation

Note) ϕD indicates the maximum diameter.

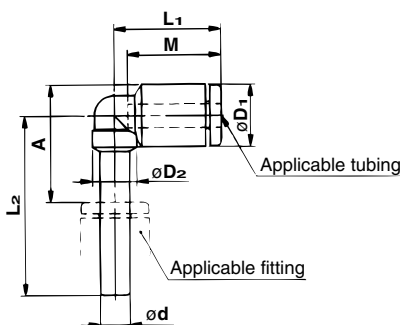
Union elbow: 10-KJL



Applicable tubing O.D. (mm)	Model	D (Note)	L	Q	M	Effective area (mm ²)	Weight (g)
						Urethane	
3.2	10-KJL23-00	8.4	15	5.8	12.7	2.2	1.6
4	10-KJL04-00	9.3	15.8	6.3	12.7	3.5	2
6	10-KJL06-00	11.6	17.1	7.3	13.5	9	3.1

Note) ϕD indicates the maximum diameter.

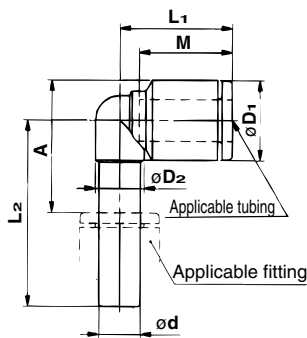
Plug-in elbow: 10-KJL



Applicable tubing O.D. (mm)	Applicable fitting size ϕd	Model	D_1 (Note)	D_2	L_1	L_2	A	M	Effective area (mm ²)	Weight (g)
3.2	3.2	10-KJL23-99	8.4	6	14.5	23.8	15.3	12.7	2.2	1
4	4	10-KJL04-99	9.3	6	15.6	24.7	16.7	12.7	3.5	1.2
6	6	10-KJL06-99	11.6	7	16.3	26.8	19.1	13.5	9	2

Note) ϕD_1 indicates the maximum diameter.

Reducer elbow: 10-KJL

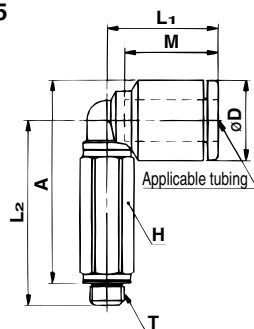


Applicable tubing O.D. (mm)	Applicable fitting size ϕd	Model	D ₁ Note	D ₂	L ₁	L ₂	A	M	Effective area (mm ²) Urethane	Weight g
3.2	4	10-KJL23-04	8.4	6	14.5	24.3	15.8	12.7	2.2	1.1
	6	10-KJL23-06				25.3	16			1.2
4	6	10-KJL04-06	9.3	6	15.6	25.7	16.9	12.7	3.5	1.4

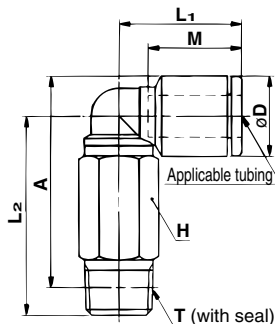
Note) ϕD_1 indicates the maximum diameter.

Extended Male Elbow: 10-KJW

M3, M5



R 1/8

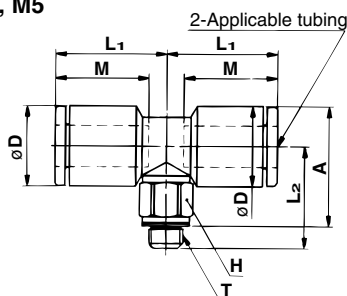


Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	D Note	L ₁	L ₂	A	M	Effective area (mm ²) Urethane	Weight (g)
3.2	M3 x 0.5	10-KJW23-M3	7	8.4	15.3	22.5	24.1	12.7	0.8	5
	M5 x 0.8	10-KJW23-M5	7			25.2	26.3		2.2	6.2
	R1/8	10-KJW23-01S	10			25.4*	25.4*		13.4	13.4
4	M3 x 0.5	10-KJW04-M3	7	9.3	15.6	23	25.1	12.7	0.8	5.1
	M5 x 0.8	10-KJW04-M5	7			25.7	27.3		3.5	6.4
	R1/8	10-KJW04-01S	10			26.4*	26.4*		13.6	13.6
6	M5 x 0.8	10-KJW06-M5	7	11.6	17.8	26.7	29.4	13.5	3.5	6.9
	R1/8	10-KJW06-01S	10			28.7	30.5*		9	13.2

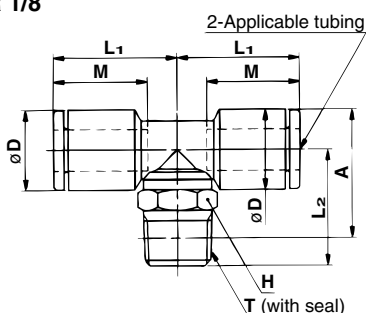
* Reference dimensions after R thread installation
Note) ϕD indicates the maximum diameter.

Male branch tee: 10-KJT

M3, M5



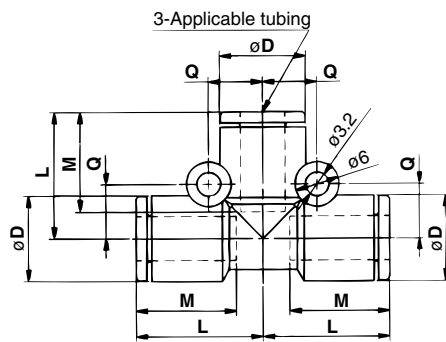
R 1/8



Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	D Note	L ₁	L ₂	A	M	Effective area (mm ²) Urethane	Weight (g)
3.2	M3 x 0.5	10-KJT23-M3	7	8.4	15.3	12.5	14.1	12.7	0.9	2.8
	M5 x 0.8	10-KJT23-M5	7			13.2	14.3		2.7	3.2
	R1/8	10-KJT23-01S	10			15.2	15.4*		7.4	7.4
4	M3 x 0.5	10-KJT04-M3	7	9.3	15.6	13	15.1	12.7	0.9	3.1
	M5 x 0.8	10-KJT04-M5	7			13.7	15.3		4.5	3.5
	R1/8	10-KJT04-01S	10			15.7	16.4*		7.7	7.7
6	M5 x 0.8	10-KJT06-M5	7	11.6	17.8	16.1	17.4	13.5	4.5	4.4
	R1/8	10-KJT06-01S	10			16.7	18.5*		11	7.6

* Reference dimensions after R thread installation
Note) ϕD indicates the maximum diameter.

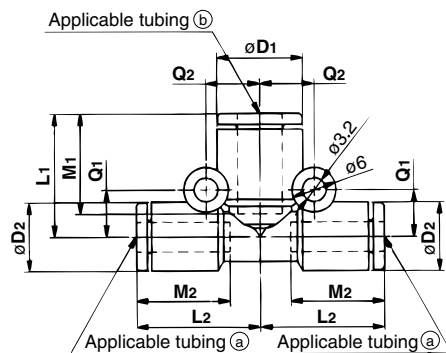
Union tee: 10-KJT



Applicable tubing O.D. (mm)	Model	D ^{Note)}	L	Q	M	Effective area (mm ²)	Weight (g)
						Urethane	
3.2	10-KJT23-00	8.4	15	5.8	12.7	2.7	2.5
4	10-KJT04-00	9.3	15.8	6.3	12.7	4.5	3
6	10-KJT06-00	11.6	17.1	7.3	13.5	11	4.6

Note) ØD indicates the maximum diameter.

Different diameter tee: 10-KJT

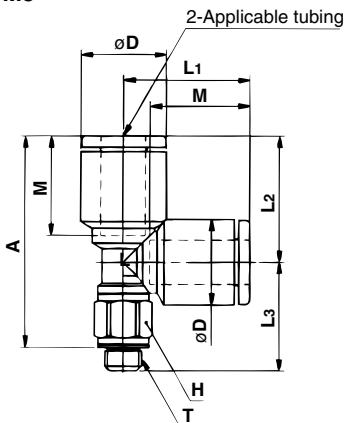


Applicable tubing O.D. (mm)		Model	D ^{Note)}	D ^{Note)}	L ₁	L ₂	Q ₁	Q ₂	M ₁	M ₂	Effective area (mm ²)	Weight (g)
a	b										Urethane	
3.2	4	10-KJT23-04	9.3	8.4	15.3	15.8	5.8	6.3	12.7	12.7	4.5	2.8
4	6	10-KJT04-06	11.6	9.3	16.6	16.8	6.3	7.3	13.5	12.7	8	3.7

Note) ØD1, ØD2 indicate the maximum diameter.

Male run tee: 10-KJY

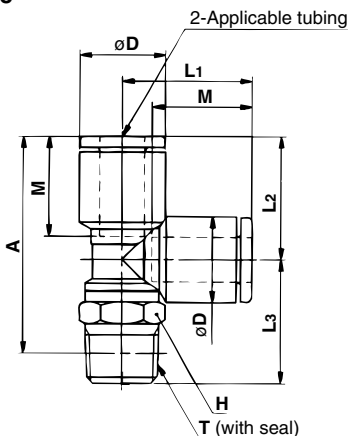
M3, M5



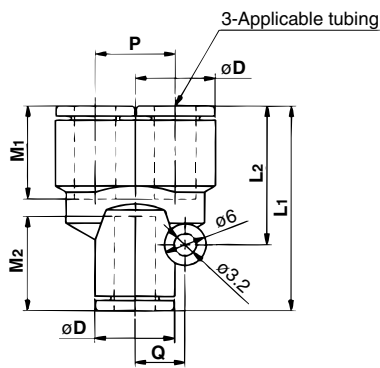
Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	D ^{Note)}	L ₁	L ₂	L ₃	A	M	Effective area (mm ²)	Weight (g)
3.2	M3 x 0.5	10-KJY23-M3	7	8.4	15.4	14.8	12.5	24.7	12.7	0.9	2.8
	M5 x 0.8	10-KJY23-M5	7				13.2	24.9		2.7	3.2
	R1/8	10-KJY23-01S	10				15.2	26*		7.4	7.4
4	M3 x 0.5	10-KJY04-M3	7	9.3	15.6	14.8	13	25.2	12.7	0.9	3.1
	M5 x 0.8	10-KJY04-M5	7				13.7	25.4		4.5	3.5
	R1/8	10-KJY04-01S	10				15.7	26.5*		7.7	7.7
6	M5 x 0.8	10-KJY06-M5	7	11.6	17.1	17.1	14.7	28.7	13.5	4.5	4.5
	R1/8	10-KJY06-01S	10				16.7	29.3*		11	7.5

* Reference dimensions after R thread installation
Note) ØD indicates the maximum diameter.

R 1/8



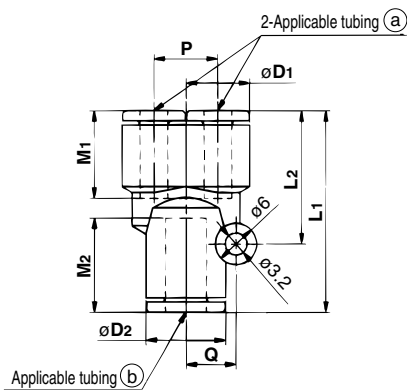
Union “Y”: 10-KJU



Applicable tubing O.D. (mm)	Model	D ^{Note)}	L1	L2	P	Q	M1	M2	Effective area (mm ²)		Weight (g)
									Urethane		
3.2	10-KJU23-00	8.4	28.5	19	8.4	5.8	12.7	12.9	2.7		2.6
4	10-KJU04-00	9.3	27.9	18.3	9.3	6.3	12.7	12.9	4.5		3
6	10-KJU06-00	11.6	31.2	21.6	11.6	7.3	13.5	13.7	11		4.7

Note) ØD indicates the maximum diameter.

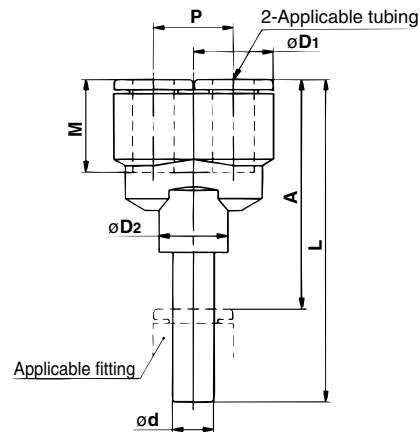
Different diameter union “Y”: 10-KJU



Applicable tubing O.D. (mm)		Model	D ^{Note)}		L1	L2	P	Q	M1	M2	Effective area (mm ²)		Weight (g)
(a)	(b)		D1	D2							Urethane		
3.2	4	10-KJU23-04	8.4	9.3	27.5	18.3	8.4	6.3	12.7	12.9	4.5		2.7
4	6	10-KJU04-06	9.3	11.6	29.2	19.3	9.3	7.3	12.7	13.7	8		3.7

Note) ØD1, ØD2 indicate the maximum diameter.

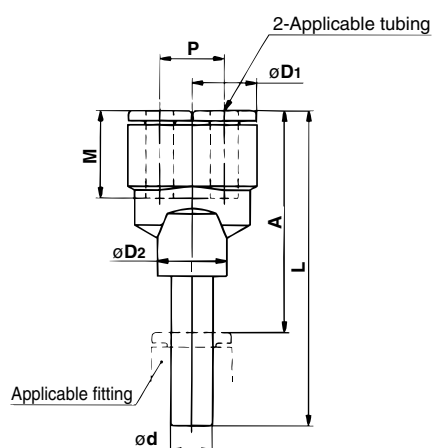
Plug-in “Y”: 10-KJU



Applicable tubing O.D. (mm)	Applicable fitting size d	Model	D ^{Note)}		L	P	A	M	Effective area (mm ²)		Weight (g)
			D1	D2					Urethane		
3.2	3.2	10-KJU23-99	8.4	10	43.5	8.4	34.1	12.7	2.7		2.7
4	4	10-KJU04-99	9.3	10	44.7	9.3	35.3	12.7	4.5		3.2
6	6	10-KJU06-99	11.6	10	47.8	11.6	37.6	13.5	11		4.5

Note) ØD1 indicates the maximum diameter.

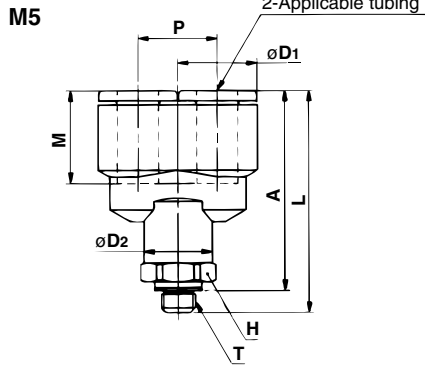
Different diameter plug-in “Y”: 10-KJX



Applicable tubing O.D. (mm)	Applicable fitting size d	Model	D ^{Note)}		L	P	A	M	Effective area (mm ²)		Weight (g)
			D1	D2					Urethane		
3.2	4	10-KJX23-04	8.4	10	44	8.4	34.6	12.7	4.5		2.8
4	6	10-KJX04-06	9.3	10	45.7	9.3	35.5	12.7	8		3.5

Note) ØD1 indicates the maximum diameter.

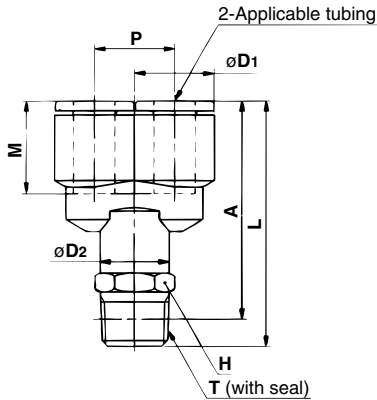
Branch: 10-KJU



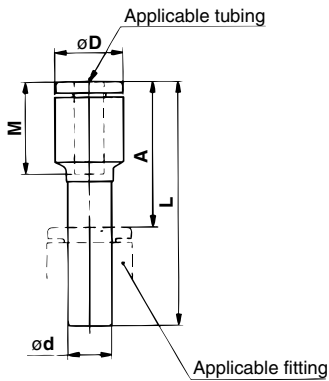
Applicable tubing O.D. (mm)	Connection thread T	Model	H (Width across flats)	D1 ^{Note)}	D2	L	P	A	M	Effective area (mm ²)		Weight (g)
										Urethane		
3.2	M5 x 0.8	10-KJU23-M5	10	8.4	10	30.6	8.4	27.5	12.7	2.2		5.9
	R1/8	10-KJU23-01S				34.1		30.1*		2.7		8.3
4	M5 x 0.8	10-KJU04-M5	10	9.3	10	31.3	9.3	28.2	12.7	2.2		6.4
	R1/8	10-KJU04-01S				34.8		30.8*		4.5		8.8
6	M5 x 0.8	10-KJU06-M5	10	11.6	10	33.4	11.6	30.3	13.5	2.2		7.4
	R1/8	10-KJU06-01S				36.9		32.9*		11		9.9

* Reference dimensions after R thread installation
Note) øD1 indicates the maximum diameter.

R 1/8



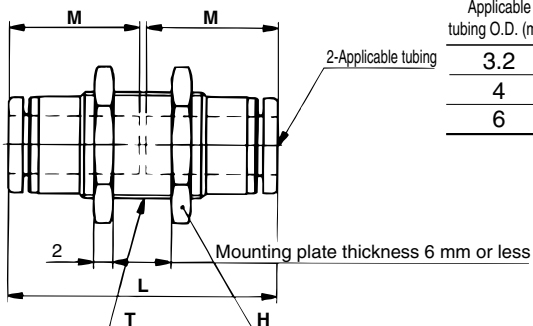
Plug-in reducer: 10-KJR



Applicable tubing O.D. (mm)	Applicable fitting size d	Model	D ^{Note)}	L	A	M	Effective area (mm ²)		Weight (g)
							Urethane		
3.2	4	10-KJR23-04	8.4	32	19.3	12.7	2.5		0.9
	6	10-KJR23-06		33	19.5				1.1
4	6	10-KJR04-06	9.3	33.5	20	12.7	4		1.3

Note) øD indicates the maximum diameter.

Bulkhead union: 10-KJE



Applicable tubing O.D. (mm)	Model	T	H (Width across flats)	L	Mounting hole	M	Effective area (mm ²)		Weight (g)
							Urethane		
3.2	10-KJE23-00	M8 x 0.75	10	26	9	12.7	2.5		4.6
4	10-KJE04-00	M9 x 0.75	11	26	10	12.7	4		5.6
6	10-KJE06-00	M11 x 0.75	14	27.7	12	13.5	10		8.5