

For Air

Purge Hi Cupla

Air line coupling with residual pressure release function

Working pressure



1.0 MPa
(10 kgf/cm²)

Valve structure

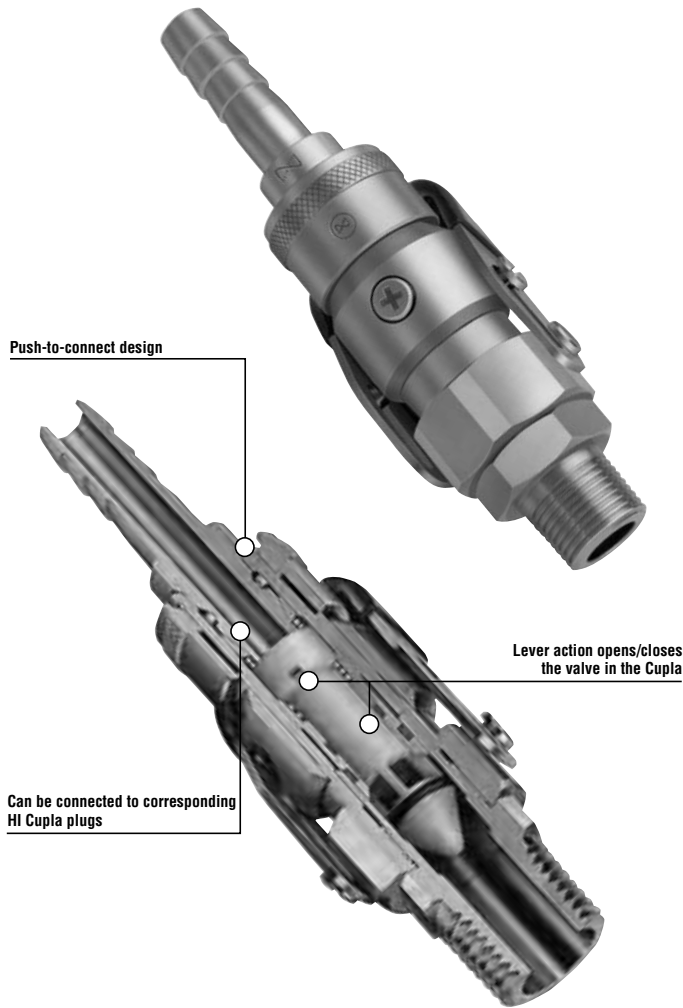


One-way shut-off

Applicable fluid



Air



**Push-to-connect operation even with existing internal pressure!
Eliminates unpleasant noise and kick back on disconnection.**

- Just push in the plug for connection. We take pride that this is single hand operation, regardless of internal pressure in socket.
- Even after connection, lever operation gives perfect control over valve opening/closing.
- In disconnection, lever action releases residual air in the plug without unpleasant noise and kick.
- Safe design prevents lever-operated valve from opening when plug is not connected.

Specifications

Body material	Brass (Chrome-plated)			
Size	1/4" (20 type) • 3/8" (30 type) • 1/2" (40 type, 400 type) • 3/4" (600 type)			
Working pressure MPa (kgf/cm ²)	1.0 (10)			
Pressure resistance MPa (kgf/cm ²)	1.5 (15)			
Seal material	Seal material	Mark	Working temperature range	Remarks
Working temperature range	Nitrile rubber	NBR (SG)	-5°C~+60°C	Standard material

Max. Tightening Torque

N·m (kgf·cm)

Model	PV-20SM	PV-30SM	PV-40SM	PV-400SM	PV-600SM
Torque	9 (92)	11 (112)	30 (306)	30 (306)	50 (510)

Flow Direction

Fluid must run from socket to plug.



Interchangeability

Models 20, 30 and 40 can be connected to plugs of Hi Cupla Models 20, 30 and 40.
Models 400, 600 and 800 can be connected to plugs of Hi Cupla Models 400, 600 and 800.

Min. Cross-Sectional Area

(mm²)

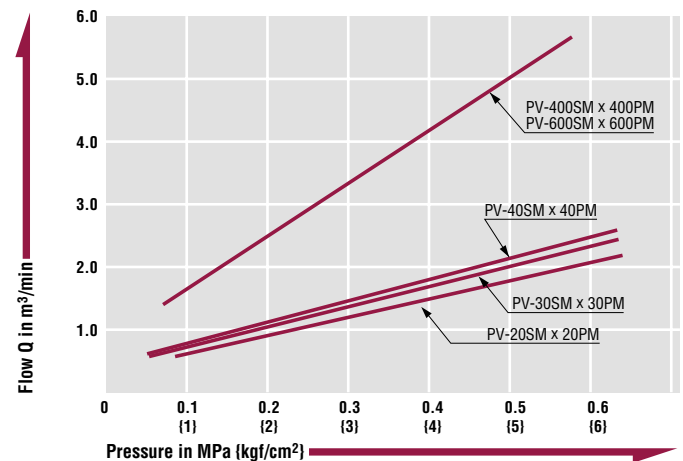
Model	PV-20SM	PV-30SM	PV-40SM	PV-400SM	PV-600SM
Min. Cross-sectional Area	38	41	41	94	94

Suitability for Vacuum

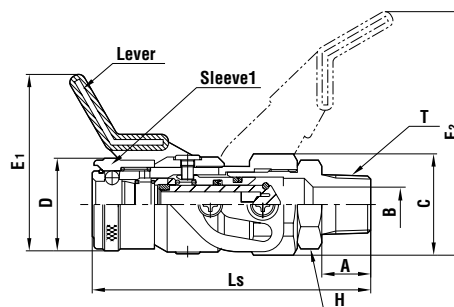
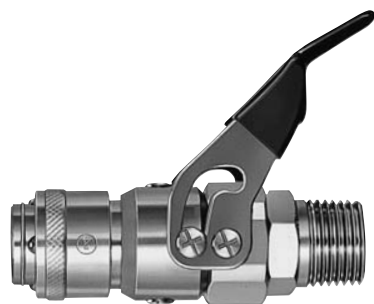
Not suitable for vacuum application in either connected or disconnected condition.

Pressure - Flow Characteristics

[Test conditions] • Fluid : Air • Temperature : Room temperature



Socket



Model	Application	Mass (g)	Dimensions (mm)									
			Ls	øD	E ₁	E ₂	H(WAF)	øC	A	T	øB	
PV-20SM	Rc 1/4	225	79	26.5	50.5	70	Hex.22	29	13	R 1/4	7	
PV-30SM	Rc 3/8	229	80	26.5	50.5	70	Hex.22	29	14	R 3/8	10	
PV-40SM	Rc 1/2	235	82	26.5	50.5	70	Hex.22	29	16	R 1/2	14	
PV-400SM	Rc 1/2	411	94	35	61.5	82	Hex.30	37.5	16	R 1/2	13	
PV-600SM	Rc 3/4	424	97	35	61.5	82	Hex.30	37.5	19	R 3/4	18	

How to operate

1

Push-to-connect operation. (In this stage the valve of the socket is not open.)

2

Turning down the lever opens the valve and allows the fluid to flow. (The turned-down lever works as a sleeve stopper and prevents disconnection.)

3

When the lever is pulled up, residual air in the plug is purged without unpleasant noise and kick back on disconnection. In this stage, the socket valve is still closed.

Application example

