FOSTER®
An Ideal Tridon Group Brand

UNIVERSAL QUICK DISCONNECTS (UQD)

FAST, LEAK-FREE CONNECTIONS FOR DATA CENTERS

Built for the future of liquid cooling, Foster Manufacturing's color-coded Universal Quick Disconnect (UQD) simplifies service and protects uptime. This flat face, no-spill coupling features color rings on each half for easy identification, an automatic locking sleeve for secure operation, and a compact design for reliable performance in demanding environments.

OCP ACCEPTED™





Key Features

- **OCP-compliant** and interchangeable with standard products
- Color-coded design (blue for supply, red for return) ensures quick visual identification
- Built from UNS S31603/AISI 316L stainless steel for strength and corrosion resistance
- Available in sizes 1/8", 1/4", 3/8", and 1/2"
- Modular design supports scalable system growth

Performance & Safety

- Two-way shut-off valve prevents spills when disconnected
- Leak-free sealing protects sensitive electronics
- Easily connect by pushing plug into socket and disconnect by pulling socket sleeve

Applications

- Thermal management
- Liquid cooling
- Data center
- AI server cooling application

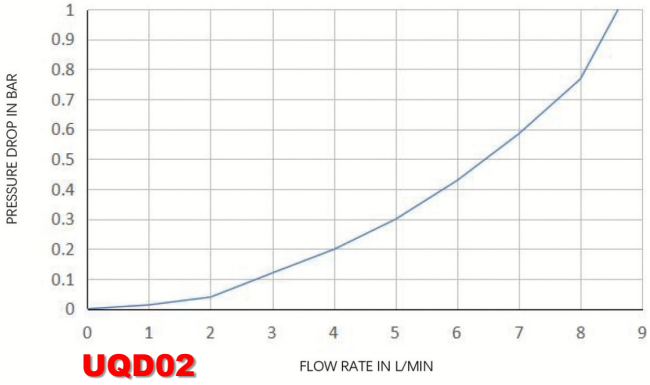
UQD Information

Size		Nominal Flow Diameter	Force to Connect (at no pressure)		Install Torque		Rated Flow		CV Value	Fluid Loss
OCP Designation	(in)	(mm)	(N)	(lb)	(N·m)	(in-lb)	(lpm)	(gpm)		(ml)
UQD02	1/8″	3.2	38	8.5	15	133	8.6	2.3	0.25	<0.025
UQD04	1/4″	6.4	44	9.9	25	221	20	5.3	2.01	<0.025
UQD06	3/8″	9.5	54	12.1	25	221	46.5	12.3	2.98	<0.025
UQD08	1/2″	12.7	70	15.7	35	310	84	22.2	5.15	<0.025

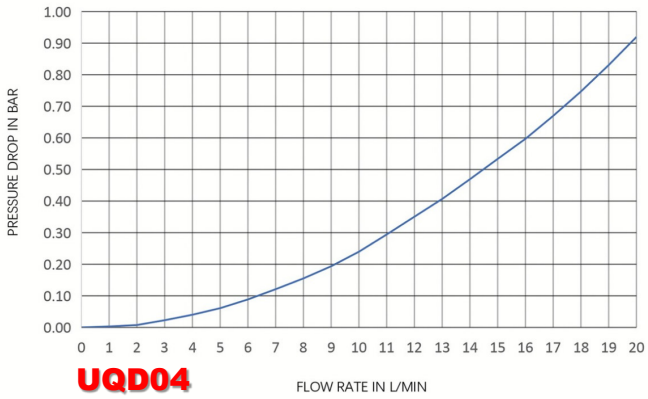
Max. Operating Pressure	20 bar (290 PSI)
Min. Burst Pressure	80 bar (1160 PSI)
Seal Material	EDPM (HNBR / FVMQ may be specified)
Operating Temperature Range	-40°C to 120°C (-40°F to 248°F)
Fluid	Deionized water / purified water / glycol water propanediol water / fluorinated liquid

Flow Chart

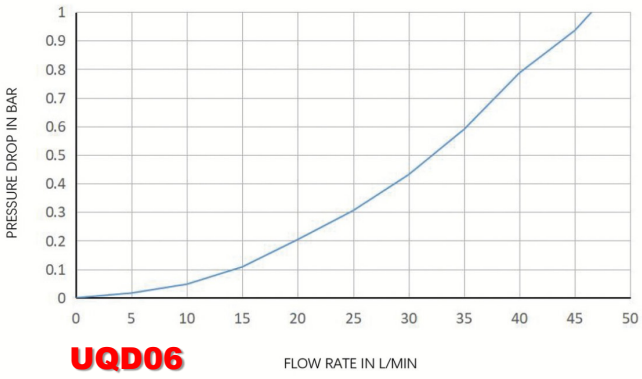
Condition: From Plug to Socket
Media: Water



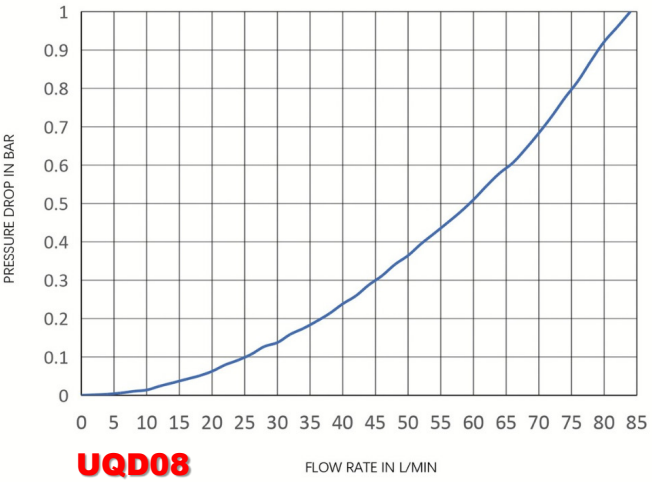
UQD02



UQD04



UQD06



UQD08

UQD Product Number Key

UQD 04 F - S M35U - B

Coupler Size	Coupler Gender	Material *	Mating End Connection	Color Coding
02	M = Male Plug	S = Stainless Steel	**02H** = 1/4" ID Push-On Hose Barb	R = Red
04	**F = Female Socket**		**03H** = 3/8" ID Push-On Hose Barb	**B = Blue**
06			**04H** = 1/2" ID Push-On Hose Barb	
08			**05H** = 5/8" ID Push-On Hose Barb	
			M35U = Male ORB 7/16-20	
			M45U = Male ORB 9/16-18	
			M60U = Male ORB 3/4-16	
			M70U = Male ORB 7/8-14	

* Seal Material is EPDM

Dimensions

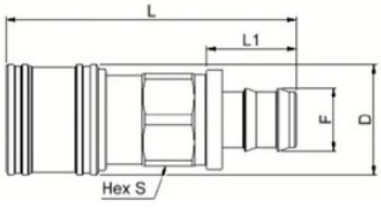
Universal Quick Disconnect Socket

Hose Barb OCP ACCEPTED

Material
Stainless Steel







Part Number	Size	Connection (F)	D		L1		L		S (Hex)	
			(in)	(mm)	(in)	(mm)	(in)	(mm)	(in)	(mm)
UQD02F-S02H-B (BLUE RING)	1/8"	1/4" Hose Barb	0.79	20.0	0.85	21.5	2.16	54.8	0.63	16.0
UQD02F-S02H-R (RED RING)	1/8"	1/4" Hose Barb	0.79	20.0	0.85	21.5	2.16	54.8	0.63	16.0
UQD04F-S02H-B	1/4"	1/4" Hose Barb	0.99	25.2	0.96	24.5	2.76	70.1	0.75	19.0
UQD04F-S02H-R	1/4"	1/4" Hose Barb	0.99	25.2	0.96	24.5	2.76	70.1	0.75	19.0
UQD04F-S03H-B	1/4"	3/8" Hose Barb	0.99	25.2	0.96	24.5	2.76	70.1	0.75	19.0
UQD04F-S03H-R	1/4"	3/8" Hose Barb	0.99	25.2	0.96	24.5	2.76	70.1	0.75	19.0
UQD06F-S04H-B	3/8"	1/2" Hose Barb	1.0	28.0	1.06	27.0	3.11	79.1	0.94	24.0
UQD06F-S04H-R	3/8"	1/2" Hose Barb	1.0	28.0	1.06	27.0	3.11	79.1	0.94	24.0
UQD08F-S05H-B	1/2"	5/8" Hose Barb	1.26	3.2	1.06	27.0	3.43	87.1	1.06	27.0
UQD08F-S05H-R	1/2"	5/8" Hose Barb	1.26	3.2	1.06	27.0	3.43	87.1	1.06	27.0

Dimensions (Continued)

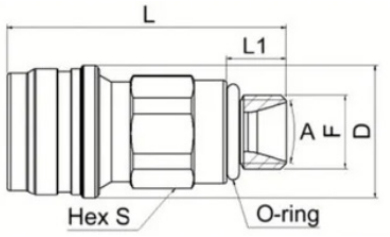
Universal Quick Disconnect Socket

Male Thread/ORB OCP ACCEPTED™

Material
Stainless Steel







Part Number	Size	Connection (F)	A	D		L1		L		S (Hex)	
				(in)	(mm)	(in)	(mm)	(in)	(mm)	(in)	(mm)
UQD02F-5M35U-B (BLUE RING)	1/8"	ORB 7/16-20	32°	0.79	20.0	0.36	9.1	1.67	42.4	0.63	16.0
UQD02F-5M35U-R (RED RING)	1/8"	ORB 7/16-20	32°	0.79	20.0	0.36	9.1	1.67	42.4	0.63	16.0
UQD04F-5M45U-B	1/4"	ORB 9/16-18	17°	0.99	25.2	0.39	10.0	2.2	56	0.75	19.0
UQD04F-5M45U-R	1/4"	ORB 9/16-18	17°	0.99	25.2	0.39	10.0	2.2	56	0.75	19.0
UQD06F-5M60U-B	3/8"	ORB 3/4-16	30°	0.81	20.5	0.43	11.0	2.45	62.2	0.94	24.0
UQD06F-5M60U-R	3/8"	ORB 3/4-16	30°	0.81	20.5	0.43	11.0	2.45	62.2	0.94	24.0
UQD08F-5M70U-B	1/2"	ORB 7/8-14	40°	0.99	25.2	0.5	12.7	2.87	72.8	1.06	27.0
UQD08F-5M70U-R	1/2"	ORB 7/8-14	40°	0.99	25.2	0.5	12.7	2.87	72.8	1.06	27.0

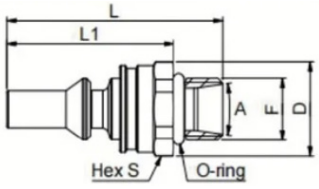
Universal Quick Disconnect Plug

Male Thread/ORB OCP ACCEPTED™

Material
Stainless Steel







Part Number	Size	Connection (F)	A	D		L1		L		S (Hex)	
				(in)	(mm)	(in)	(mm)	(in)	(mm)	(in)	(mm)
UQD02M-SM35U-B (BLUE RING)	1/8"	ORB 7/16-20	16°	0.67	17.0	1.22	31.0	1.58	40.1	0.63	16.0
UQD02M-SM35U-R (RED RING)	1/8"	ORB 7/16-20	16°	0.67	17.0	1.22	31.0	1.58	40.1	0.63	16.0
UQD04M-SM45U-B	1/4"	ORB 9/16-18	19°	0.71	18.0	1.39	35.4	1.77	45.0	0.63	16.0
UQD04M-SM45U-R	1/4"	ORB 9/16-18	19°	0.71	18.0	1.39	35.4	1.77	45.0	0.63	16.0
UQD06M-SM60U-B	3/8"	ORB 3/4-16	20°	0.94	24.0	1.53	38.9	1.97	50.0	0.87	22.0
UQD06M-SM60U-R	3/8"	ORB 3/4-16	20°	0.94	24.0	1.53	38.9	1.97	50.0	0.87	22.0
UQD08M-SM70U-B	1/2"	ORB 7/8-14	20°	1.16	29.5	1.69	42.9	2.19	55.6	1.06	27.0
UQD08M-SM70U-R	1/2"	ORB 7/8-14	20°	1.16	29.5	1.69	42.9	2.19	55.6	1.06	27.0