

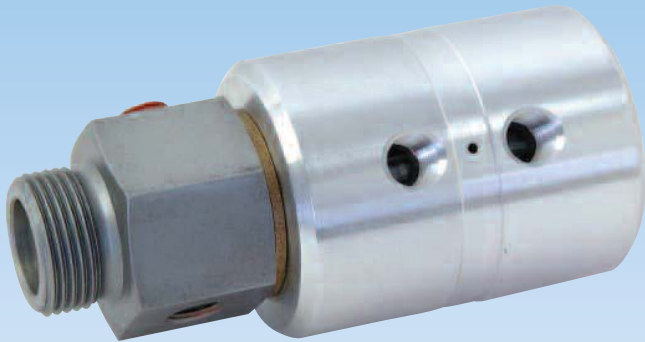
# DEUBLIN

## Deu-Plex Low Speed Air-Hydraulic Unions

- duoflow design
- self-supported rotating union
- composite bearing
- vent holes between passages
- special seals
- hardened sealing surface
- aluminum housing
- steel rotor

### Optional:

- tandem model as triple-passage design

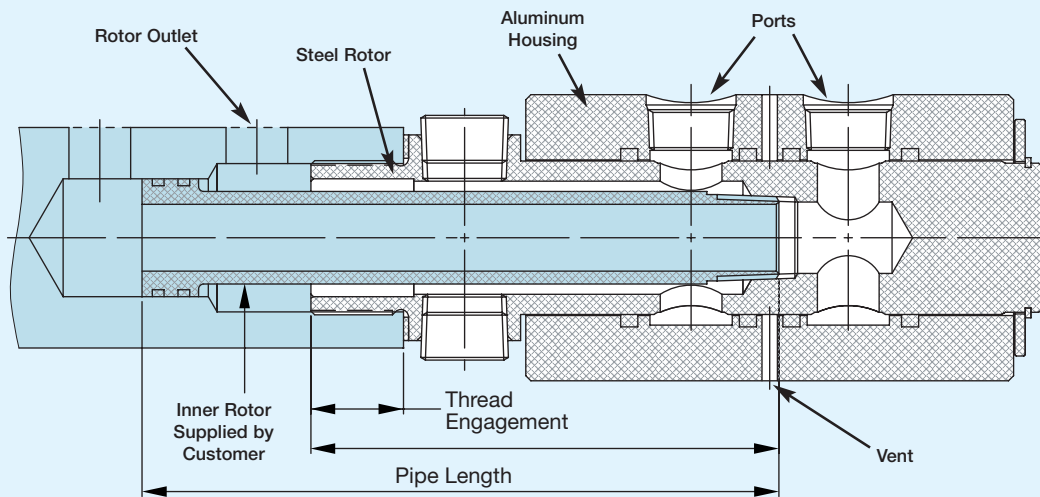


### Operating Data

Maximum Air Pressure	150 PSI	10 bar
Maximum Vacuum Pressure	28" Hg	6.7 kPa
Maximum Hydraulic Pressure <sup>①</sup>	3,000 PSI	204 bar
Maximum Speed <sup>③</sup>	250 RPM	250/min
Torque for		
Model 1690	7 ft.lbs	9.5 Nm
Model 1790	18 ft.lbs	24 Nm
Model 1890	22 ft.lbs	29.8 Nm
Maximum Temperature	250°F	120°C

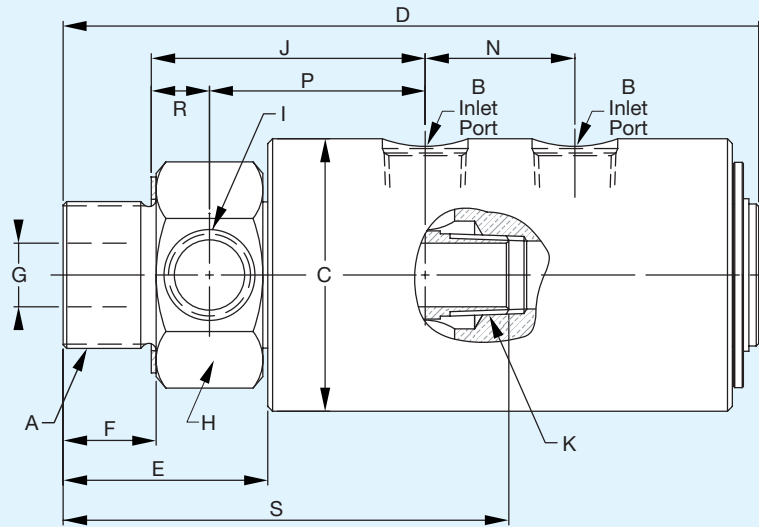
<sup>①</sup> Union is designed for continuous operation at either maximum speed or maximum pressure. If operating conditions are close to maximum pressure and speed simultaneously, consult **DEUBLIN**.

**Models without inner rotors can be used for coaxial feed applications as shown below.**



**Illustration  
of mounting  
arrangement**

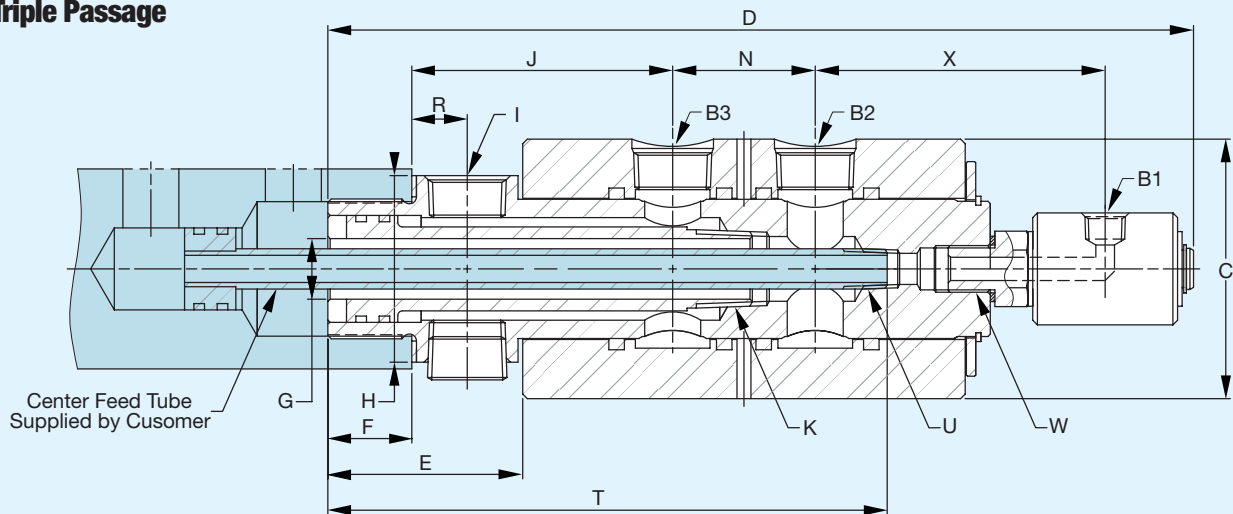
## Double Passage Models



① These models are supplied without inner rotors.

B Port NPT	Ordering No. Model	A Rotor Thread	C Dia.	D	E	F	G Rotor ID	H Across Flats	I Tap NPT	J Lock-up	K Tap NPT	N	P	R	S	Shpg Wt.
(2) x 1/4"	1690-000-115	1" NPT RH	2 5/8"	5 7/8"	2 3/16"	1 1/8"	5 7/16"	1 3/4"	1/4"	2 5/8"	1/4"	1 5/32"	1 11/16"	1/2"	-	3 1/2#
	1690-000-102 <sup>①</sup>	1" NPT RH	2 5/8"	5 7/8"	2 3/16"	1 1/8"	1 1/16"	1 3/4"	1/4"	2 5/8"	1/4"	1 5/32"	1 11/16"	1/2"	3 25/32"	3 1/2#
	1690-000-168	G1" (BSP) RH	66.6	150	55.5	18	7.9	44.4	1/4"	67.8	1/4"	29.4	42.9	17	-	1.6 Kg
	1690-000-105 <sup>①</sup>	G1" (BSP) RH	66.6	150	55.5	18	17.4	44.4	1/4"	67.8	1/4"	29.4	42.9	17	96	1.6 Kg
(2) x 1/2"	1790-001-113	1 1/4" NPT RH	3"	8 3/8"	2 15/32"	1 1/8"	5/8"	2"	1/2"	3 3/4"	1/2"	1 21/32"	2 5/8"	5/8"	-	6 1/2#
	1790-001-101 <sup>①</sup>	1 1/4" NPT RH	3"	8 3/8"	2 15/32"	1 1/8"	1 1/16"	2"	1/2"	3 3/4"	1/2"	1 21/32"	2 5/8"	5/8"	5 1/16"	6 1/2#
	1790-001-114	G1 1/4" (BSP) RH	76	208	63	28	16	55	1/2"	84.2	1/2"	42	67	15.5	-	3 Kg
	1790-001-112 <sup>①</sup>	G1 1/4" (BSP) RH	76	208	63	28	27	55	1/2"	84.2	1/2"	42	67	15.5	129	3 Kg
(2) x 3/4"	1890-100	1 1/2" NPT RH	3 1/2"	8 7/8"	2 5/8"	1 3/16"	1 3/16"	2 1/2"	3/4"	4 3/32"	3/4"	1 29/32"	2 3/4"	1 1/16"	-	9 3/4#
	1890-110 <sup>①</sup>	1 1/2" NPT RH	3 1/2"	8 7/8"	2 5/8"	1 3/16"	1 3/16"	2 1/2"	3/4"	4 3/32"	3/4"	1 29/32"	2 3/4"	1 1/16"	5 13/16"	9 3/4#
	1890-060	G1 1/2" (BSP) RH	88.9	225.4	66.6	30.2	20.6	63.5	3/4"	91.3	3/4"	48.4	69.8	17.5	-	4.4 Kg
	1890-063 <sup>①</sup>	G1 1/2" (BSP) RH	88.9	225.4	66.6	30.2	34.9	63.5	3/4"	91.3	3/4"	48.4	69.8	17.5	147.6	4.2 Kg

## Triple Passage



Inlet Ports NPT	Ordering No. Model	A Rotor Thread	C	D	E	F	G Rotor Hole	H Across Flats	I Tap NPT	J Lock-up	K Tap NPT	N	P	R	T	U Tap NPT	W Tap	X	Shpg. Wt.
B <sub>1</sub> B <sub>2</sub> B <sub>3</sub> 1/4" 3/4" 3/4"	1890-116	1 1/2" NPT RH	3 1/2"	11 17/32"	2 5/8"	1 3/16"	1 3/16"	2 1/2"	3/4"	4 3/32"	3/4"	1 29/32"	2 13/16"	1 1/16"	7 1/2"	1/4"	5/8"-18 UNF,RH	3 7/8"	10 3/4#
	1890-064	G1 1/2" (BSP) RH	88.9	293	66.6	30.2	20.6	63.5	3/4"	89	3/4"	48.4	69.8	17.5	190	1/4"	5/8"-18 UNF,RH	97.6	4.9 Kg