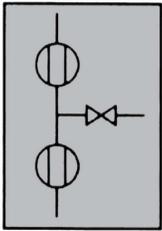


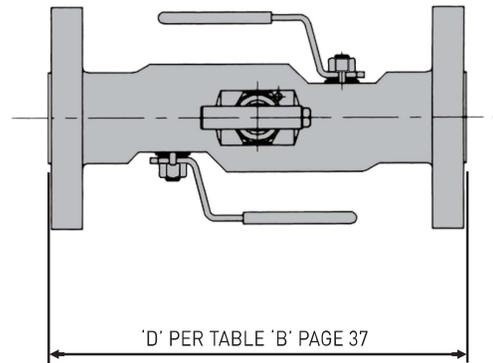
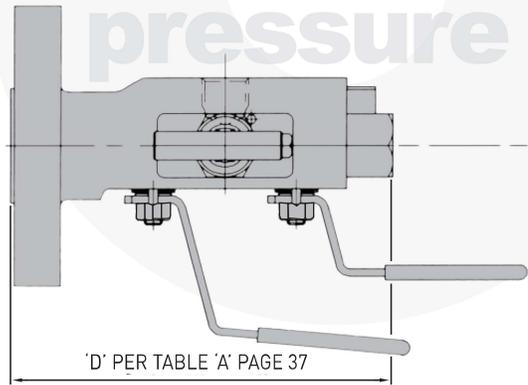
D TYPE DOUBLE BLOCK & BLEED



Machined from a single piece 'grain flow controlled' forging. This valve features two in-line ball pattern primary and secondary isolating valves with a heavy duty needle valve vent, in bore sizes from 10mm to 20mm (0.4" to 0.8").

This all forged manifold comprises two in-line ball primary and secondary isolating valves with a heavy duty needle valve vent. In bore sizes from 10mm to 14mm (0.4" to 0.55").

reliability
under
pressure



FLANGE TO PIPE – THREE BORES – THREE STANDARD MATERIALS

SIZE RANGES		
BALL VALVE BORE 0.40"/10mm CV 6.3	BALL VALVE BORE 0.55"/14mm CV 11.7	BALL VALVE BORE 0.80"/20mm CV 27.9
Flange size 1/2" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.	Flange size 3/4" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.	Flange size 1" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.
Outlet connection: 1/2" NPT Female standard. Vent connection: 1/2" NPT Female standard.	Outlet connection: 3/4" NPT Female standard. Vent connection: 1/2" NPT Female standard.	Option – 3" NB, 150 to 2500 Outlet connection: 1" NPT Female standard. Vent connection: 1/2" NPT Female standard.

CARBON STEEL

Standard specification – ASTM A350 LF2 body material with BS970 316 S11/S31 barstock stainless steel trims, Inserts. End adaptors with PTFE seats and PTFE/Graphite seals and gland packings. Standard 1/4 turn lever 1/2 turn to vent. All end adaptors have Oliver BLOK-LOK protection against accidental disassembly.

DUPLEX STAINLESS STEEL

Standard specification – ASTM A182 F51 body material with UNS S31803 barstock steel trims, Inserts, End adaptors with PTFE seats and PTFE/Graphite seals and gland packings. Standard 1/4 turn lever 1/2 turn to vent. All end adaptors have Oliver BLOK-LOK protection against accidental disassembly.

FLANGE TO FLANGE – THREE BORES – THREE STANDARD MATERIALS

SIZE RANGES		
BALL VALVE BORE 0.40"/10mm CV 6.3	BALL VALVE BORE 0.55"/14mm CV 11.7	BALL VALVE BORE 0.80"/20mm CV 27.9
Flange size 1/2" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.	Flange size 3/4" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.	Flange size 1" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.
Outlet connection: Flange size & Class can be different from inlet. Vent connection: 1/2" NPT Female standard.	Outlet connection: Flange size & Class can be different from inlet. Vent connection: 1/2" NPT Female standard.	Outlet connection: 1" NPT Female standard. Vent connection: 1/2" NPT Female standard.

STAINLESS STEEL

Standard specification – ASTM A182 F316 body material with BS970 316S11/S31 barstock stainless steel trims, Inserts, End adaptors with PTFE seats and PTFE/Graphite seals and gland packings. Standard 1/4 turn lever 1/2 turn to vent. All end adaptors have Oliver BLOK-LOK protection against accidental disassembly.

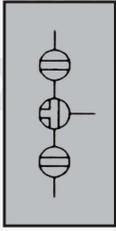
STANDARD	
NACE:	Conformance to NACE MR-01-75 (latest revision).
FIRESAFE:	Firesafe construction.

OPTIONS	
INJECTION:	Available for chemical injection service (page 43).
SAMPLING:	Available for sampling service (page 43).

F TYPE DOUBLE BLOCK & BLEED

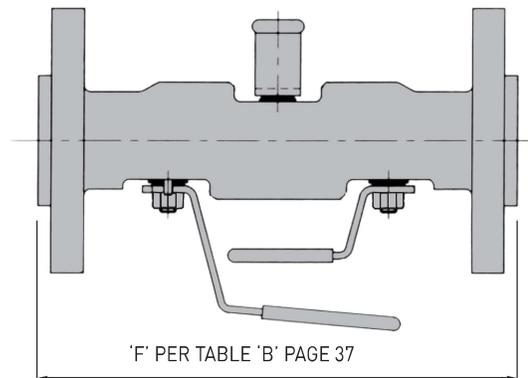
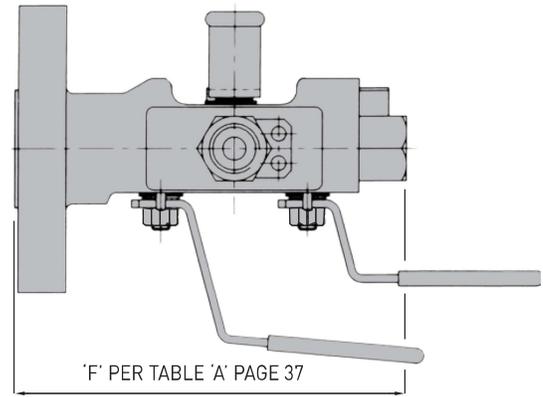


reliability
under
pressure



Machined from a single piece 'grain flow controlled' forging. This valve features two in-line ball pattern primary and secondary isolating valves with ball valve vent, in bore sizes from 10mm to 14mm (0.4" to 0.55").

This all forged manifold comprises two in-line ball primary and secondary isolating valves with ball valve vent. In bore sizes from 10mm to 14mm (0.4" to 0.55").



FLANGE TO PIPE – TWO BORES – THREE STANDARD MATERIALS

SIZE RANGES	
BALL VALVE BORE 0.40"/10mm CV 6.3	BALL VALVE BORE 0.55"/14mm CV 11.7
Flange size 1/2" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.	Flange size 3/4" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.
Outlet connection: 1/2" NPT Female standard. Vent connection: 1/2" NPT Female standard.	Outlet connection: 3/4" NPT Female standard. Vent connection: 1/2" NPT Female standard.

CARBON STEEL

Standard specification – ASTM A350 LF2 body material with BS970 316 S11/S31 barstock stainless steel trims, Inserts. End adaptors with PTFE seats and PTFE/Graphite seals and gland packings. Standard 1/4 turn lever 1/2 turn to vent. All end adaptors have Oliver BLOK-LOK protection against accidental disassembly.

DUPLEX STAINLESS STEEL

Standard specification – ASTM A182 F51 body material with UNS S31803 barstock steel trims, Inserts, End adaptors with PTFE seats and PTFE/Graphite seals and gland packings. Standard 1/4 turn lever 1/2 turn to vent. All end adaptors have Oliver BLOK-LOK protection against accidental disassembly.

Note: 20mm Bore available in Bolted construction only.

FLANGE TO FLANGE – TWO BORES – THREE STANDARD MATERIALS

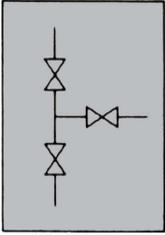
SIZE RANGES	
BALL VALVE BORE 0.40"/10mm CV 6.3	BALL VALVE BORE 0.55"/14mm CV 11.7
Flange size 1/2" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.	Flange size 3/4" NB to 2" NB, Flange Classes 150 to 2500 RF & RTJ. Also API 5K & API 10K.
Outlet connection: Flange size & Class can be different from inlet. Vent connection: 1/2" NPT Female standard.	Outlet connection: Flange size & Class can be different from inlet. Vent connection: 1/2" NPT Female standard.

STAINLESS STEEL

Standard specification – ASTM A182 F316 body material with BS970 316S11/S31 barstock stainless steel trims, Inserts, End adaptors with PTFE seats and PTFE/Graphite seals and gland packings. Standard 1/4 turn lever 1/2 turn to vent. All end adaptors have Oliver BLOK-LOK protection against accidental disassembly.

STANDARD	
NACE:	Conformance to NACE MR-01-75 (latest revision).
FIRESAFE:	Firesafe construction.
OPTIONS	
INJECTION:	Available for chemical injection service (page 43).
SAMPLING:	Available for sampling service (page 43).

N TYPE DOUBLE BLOCK & BLEED



Machined from a single piece 'grain flow controlled' forging. This valve features primary and secondary valve & vent with heavy duty needle valves, offering 5.4mm (0.23") bores and metal seated valves.

This all forged manifold comprises three heavy duty needle valves. Offering 5.4mm (0.23") bores and metal seated valves.

Valves have three heavy duty metal seated needle valves with 5.4mm (0.23") bores.

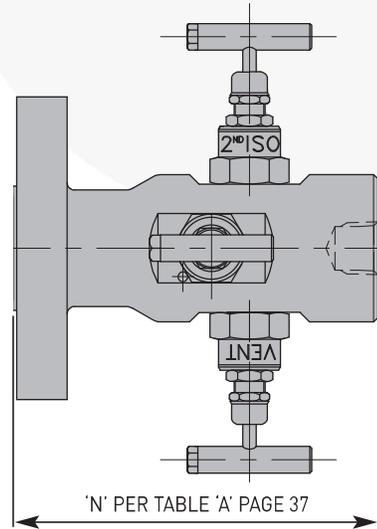
CARBON STEEL

Standard specification – ASTM A350 LF2 body material with BS970 316 S11/S31 barstock stainless steel trims and head units with Graphite seals and gland packings. Needle valves have non-rotating hard tip giving metal to metal closure and screw down tee bar operators.

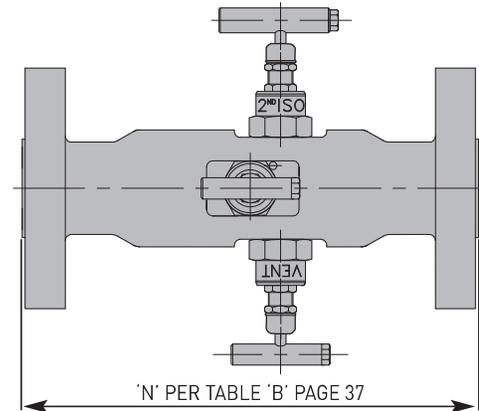
DUPLEX STAINLESS STEEL

Standard specification – ASTM A182 F51 body material with UNS S31803 barstock steel trims and head units with Graphite seals and gland packings. Needle valves have non-rotating hard tip giving metal to metal closures and screw down tee bar operators.

reliability
under
pressure



FLANGE TO PIPE – ONE BORE – THREE STANDARD MATERIALS



FLANGE TO FLANGE – ONE BORE – THREE STANDARD MATERIALS

STAINLESS STEEL

Standard specification – ASTM A182 F316 body material with BS970 316S11/S31 barstock stainless steel trims and head units with Graphite seals and gland packings. Needle valves have non-rotating hard tip giving metal to metal closure and screw down tee bar operators.

STANDARD	
NACE:	Conformance to NACE MR-01-75 (latest revision).
FIRESAFE:	Firesafe construction.

DOUBLE BLOCK & BLEED DIMENSION TABLES

FLANGE TO PIPE (TABLE A)

BORE			7/32"	5.5mm	3/8"	10mm	9/16"	14mm	13/16"	20mm				
SIZE	FLANGE CLASS	RF/RTJ FLANGE TYPE	N inch	mm	kg	D & F inch	mm	kg	D & F inch	mm	kg	D inch	mm	kg
1/2"	150	YN	5.88	149	3.4	6.69	170	3.4	—	—	—	—	—	—
	300	YY	5.88	149	4	6.69	170	4	—	—	—	—	—	—
	600	YY	5.88	149	4	6.69	170	4	—	—	—	—	—	—
	1500	YY	6.25	159	5.2	7.06	179	5.2	—	—	—	—	—	—
	2500	YY	6.5	165	6.4	7.31	186	6.4	—	—	—	—	—	—
3/4"	150	YN	5.88	149	4.2	6.69	170	4.2	8.19	208	7.2	—	—	—
	300	YY	5.88	149	4.7	6.69	170	4.7	8.19	208	7.7	—	—	—
	600	YY	5.88	149	4.7	6.69	170	4.7	8.19	208	7.7	—	—	—
	1500	YY	6.25	159	5.6	7.06	179	5.6	8.56	218	8.6	—	—	—
	2500	YY	6.5	165	6.7	7.31	186	6.7	8.81	224	9.7	—	—	—
1"	150	YY	5.88	149	4.4	6.69	170	4.4	8.19	208	7.4	9.25	235	8.2
	300	YY	5.88	149	4.8	6.69	170	4.8	8.19	208	7.8	9.25	235	8.6
	600	YY	6.25	159	5.3	7.06	179	5.3	8.56	218	8.3	9.62	244	9.1
	1500	YY	6.5	165	7.3	7.31	186	7.3	8.81	224	10.3	9.88	251	11.1
	2500	YY	6.5	165	10.1	7.31	186	10.1	8.94	227	13.1	9.88	251	14.1
1 1/2"	150	YY	5.88	149	5	6.69	170	5	8.19	208	8	9.25	235	8.8
	300	YY	6.25	159	7.4	7.06	179	7.4	8.56	218	10.4	9.62	244	11.2
	600	YY	6.25	159	7.4	7.06	179	7.4	8.56	218	10.4	9.62	244	11.2
	1500	YY	6.5	165	9.1	7.31	186	9.1	8.81	224	12.1	9.88	251	12.9
	2500	YY	7.06	179	13.5	7.87	200	13.5	9.38	238	16.5	10.43	265	17.3
2"	150	YY	6.25	159	7.2	7.06	179	7.2	8.56	218	10.2	9.62	244	11
	300	YY	6.25	159	7.4	7.06	179	7.4	8.56	218	10.4	9.62	244	11.2
	600	YY	6.5	165	7.7	7.31	186	7.7	8.81	224	10.7	9.88	251	11.5
	1500	YY	7.06	179	14.5	7.87	200	14.5	9.38	238	17.5	10.43	265	18.3
	2500	YY	7.38	187	20	8.19	208	20	9.68	246	22.1	10.75	273	22.9

— not available

FLANGE TO FLANGE (TABLE B)

BORE			3/8"	10mm	9/16"	14mm	9/16"	14mm	13/16"	20mm				
SIZE	FLANGE CLASS	RF/RTJ FLANGE TYPE	D & F inch	mm	kg	D inch	mm	kg	F inch	mm	kg	D inch	mm	kg
1/2"	150	YN	9.25	235	5.4	—	—	—	—	—	—	—	—	—
	300	YY	9.25	235	6.6	—	—	—	—	—	—	—	—	—
	600	YY	9.25	235	6.6	—	—	—	—	—	—	—	—	—
	1500	YY	10	254	9	—	—	—	—	—	—	—	—	—
	2500	YY	10.5	267	11.4	—	—	—	—	—	—	—	—	—
3/4"	150	YN	9.25	235	7	9.25	235	9	10.5	267	10	—	—	—
	300	YY	9.25	235	8	9.25	235	10	10.5	267	11	—	—	—
	600	YY	9.25	235	8	9.25	235	10	10.5	267	11	—	—	—
	1500	YY	10	254	9.8	10	254	11.8	10.5	267	12.8	—	—	—
	2500	YY	10.5	267	12	10.5	267	14	11	279	15	—	—	—
1"	150	YY	9.25	235	7.4	9.25	235	9.4	10.5	267	10.4	9.25	235	9.4
	300	YY	9.25	235	8.2	9.25	235	10.2	10.5	267	11.2	9.25	235	10.2
	600	YY	10	254	9.2	10	254	11.2	10.5	267	12.2	10	254	11.2
	1500	YY	10.5	267	13.2	10.5	267	15.2	11	279	16.2	10.5	267	15.2
	2500	YY	10.5	267	18.8	10.75	273	20.8	11	279	21.8	10.75	273	20.8
1 1/2"	150	YY	9.25	235	8.6	9.25	235	10.6	10.5	267	11.6	9.25	235	10.6
	300	YY	10	254	13.4	10	254	15.4	10.75	273	16.4	10	254	15.4
	600	YY	10	254	13.4	10	254	15.4	11	279	16.4	10	254	15.4
	1500	YY	10.5	267	16.8	10.5	267	18.8	11	279	19.8	10.5	267	18.8
	2500	YY	12.38	314	25.6	13.13	334	27.6	13.13	334	27.6	13.13	334	27.6
2"	150	YY	10	254	13	10	254	15	10.75	273	16	10	254	15
	300	YY	10	254	13.4	10	254	15.4	10.75	273	16.4	10	254	15.4
	600	YY	10.5	267	14	10.5	267	16	11	279	17	10.5	267	16
	1500	YY	12.38	314	27.6	13.13	334	29.6	13.13	334	29.6	13.13	334	29.6
	2500	YY	13.13	334	38	13.13	334	40	13.13	334	40	13.13	334	40

— not available