

DLINE DUO CHECK VALVES ARE DESIGN FROM THE STANDARDS INDUSTRIES TO THE HEAVIEST-REQUIRED INDUSTRIES SUCH AS:

WATER & WASTE WATER, PULP & PAPER, CHEMICAL & PETROCHEMICAL, POWER, MINING, PETROLEUM AND OIL & GAS.

DLINE DUO CHECK VALVES 2"-6" ARE DUAL PRESSURE SERVICES TO ANSI CLASS 150 & 300. THE SAME D-LINE VALVE CAN BE INSTALLED IN EITHER CLASS 150 OR CLASS 300 ANSI/ASME B16.5 FLANGES.



6" CV41B-DI

DESIGN FEATURES

DUCTILE IRON BODY

DUCTILE IRON BODY MAINTAINS THE ANTI-CORROSIVE PROPERTIES OF CAST IRON, WHILE ACHIEVING A YIELD STRENGTH COMPARABLE TO CARBON STEEL. DUCTILE IRON OFFERS HIGHER PRESSURE/TEMPERATURE RATINGS THAN CAST IRON.

QUICK CLOSURE TO REDUCE WATER HAMMER

SHUT-OFF IS ACHIEVED VIA THE FULLY AUTOMATIC, SPRING-ASSISTED DISCS THAT CLOSE NEAR ZERO FLOW VELOCITY. THE LIGHT WEIGHT, SPLIT THE DISC DESIGN CREATES A POSITIVE SHUTOFF PRIOR TO FLOW REVERSAL AND HELPS TO KEEP SLAMMING AND SURGES TO A MINIMUM.

MINIMAL HEAD LOSS

CONTOUR OF BODY PROVIDES A SHORT AND STRAIGHT FLOW PATH THAT GENERATES VERY LITTLE TURBULANCE. ADDITIONALLY, THE SPRING-LOADED DISCS ARE DESIGNED WITH VERY LOW CRACKING PRESSURE WICH REDUCES THE AMOUNT OF ENERGY REQUIRED TO OPEN THE VALVE.

RESILENT SOFT SEATS

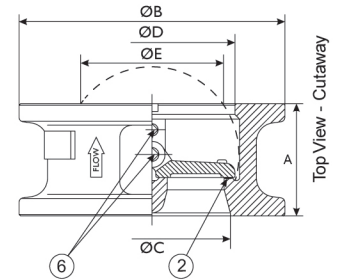
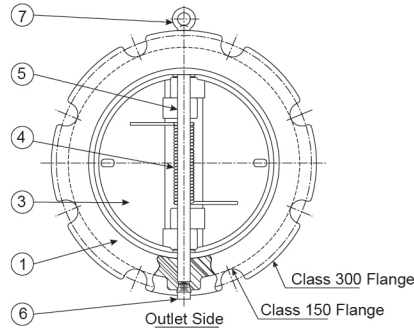
RESILENT SEATS (BUNA/EPDM/VITON) ENSURE A BUBBLE TIGHT SEAL. **BUNA-N SEAT** IS THE MOST WIDELY USED ELASTOMER. GOOD FOR MOST PETROLEUM OILS & FLUIDS, SILICONE GREASES AND OILS, AND COLD WATER. EXCELLENT COMPRESSION SET, TEAR AND ABRASION RESISTANCE. NOT RECCOMENDED FOR SEVERE OZONE-RESISTANT APPLICATIONS. **EPDM SEAT** IS THE MOST WATER RESISTANT RUBBER. IT HAS GOOD RESISTANCE TO MILD ACIDS, ALKALIS, SILICONE, OILS/GREASES, KETONES, ALCOHOLS AND OTHER POLAR SOLVENTS. IT IS NOT RECOMMENDED TO BE USED WITH PETROLEUM OILS, MINERAL OIL, DI-ESTER LUBRICANTS, NON-POLAR SOLVENTS OR AORMATIC FUELS. **VITON SEAT** OFFERS A BROAD RANGE OF CHEMICAL RESISTANCE AND EXCELLENT HEAT RESISTANCE. GOOD MECHANICAL PROPERTIES AND COMPRESSION SET RESISTANCE. OFTEN USED IN APPLICATION WHERE NOTHING ELSE WILL WORK. FAIR LOW TEMPERATURE RESISTANCE AND LIMITED HOT-WATER RESISTANCE AND SHRINKAGE.

PRESSURE-TEMPERATURE RATINGS (NON-SHOCK)		SEAT MATERIAL RATINGS		SPRING MATERIAL RATING
DI ASTM A-536 CLASS 150	250 PSI @ 100°F	BUNA	-20 TO 250 °F	SERIE 300 SS: 450 °F
DI ASTM A-536 CLASS 300*	640 PSI @ 100 °F			

* 2"-6" ONLY

MATERIAL LIST (1)

NO.	DESCRIPTION	CV41B SERIES
1	BODY(4)	DUCTILE IRON ASTM A-536
2	SEAT	BUNA-N
3	DISC	STAINLESS STEEL 316
4	SPRING(2)	SERIES 300 STAINLESS STEEL
5	SHAFT /STOP PIN	SERIES 300 STAINLESS STEEL
6	NPT PLUG	COMMERCIAL STEEL
7	EYE-BOLT (3)	COMMERCIAL STEEL



*WAFFER STYLES SIZES 2" THROUGH 6" ARE SCALLOPED FOR DUAL PRESSURE (ANSI CLASS 150 AND 300).

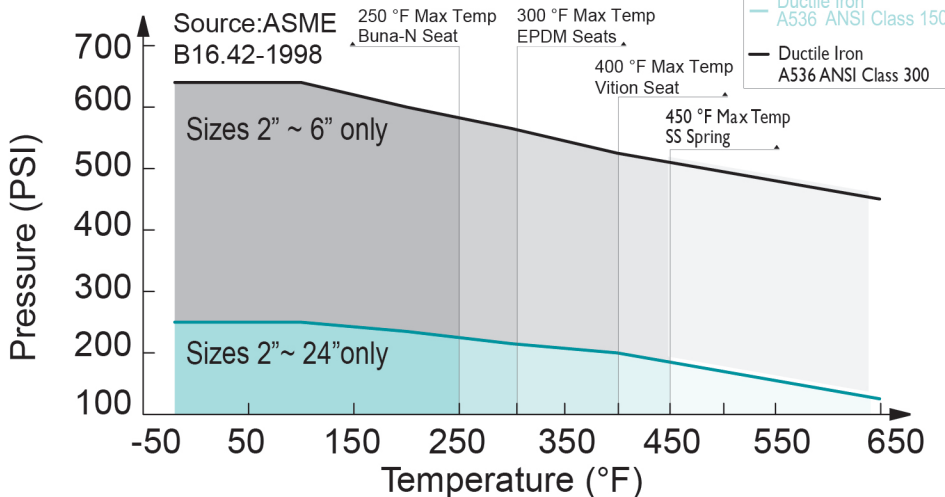
- 1.- MATERIAL LIST REPRESENTS STANDART MATERIALS EQUIVALENT OR BETTER MATERIALS MAYBE SUBSTITUTED AT THE MANUFACTURER'S DISCRETION.
- 2.- DENOTES RECOMMENDED SPARE PARTS.
- 3.- PART #7 EYE BOLT, IS ONLY FOR 8" & UP.
- 4.- DI BODY IS EPOXY PAINTED.

DIMENSIONS & PERFORMANCE DATA (1)

SIZE	IN	MM	A(2)	FACE TO FACE	ØB	OUTLET OUTSIDE DIAMETER	ØC	INLET INSIDE DIAMETER	ØD	OUTLET INSIDE DIAMETER	ØE	MINIMUM BORE DIAMETER	WEIGHT (KG)	CRACKING PRESSURE (3) (PSI)	FLOW COEFFICIENT(CV)
2"	50	2.12	4.37	2.00	2.62	0.00	1.80	≤ .25	62						
2 1/2"	65	2.12	5.12	2.50	3.12	1.26	2.30	≤ .25	110						
3"	80	2.25	5.75	3.00	3.87	2.36	3.20	≤ .25	175						
4"	100	2.50	7.12	4.00	4.75	3.43	6.30	≤ .25	350						
5"	125	2.75	8.50	5.00	6.00	4.57	8.20	≤ .25	550						
6"	150	3.00	9.87	6.00	7.00	5.32	12.0	≤ .25	850						
8"	200	3.75	11.00	8.00	9.00	7.48	19.50	≤ .25	1500						
10"	250	4.25	13.37	10.00	11.00	9.45	31.70	≤ .25	2400						
12"	300	5.62	16.12	12.00	13.25	11.26	48.90	≤ .25	3700						
14"	350	7.25	17.75	14.00	14.25	11.26	79.40	≤ .25	5400						
16"	400	7.50	20.25	16.00	16.25	13.70	90.70	≤ .25	8250						
18"	450	8.00	21.62	18.00	18.12	15.63	117.00	≤ .25	10400						
20"	500	8.37	23.87	20.00	20.12	17.64	156.50	≤ .25	14200						
24"	550	8.75	28.25	24.00	24.00	21.97	208.70	≤ .25	23000						

- 1.- DIMENSIONS ARE EXPRESSED IN INCHES AND WEIGHTS ARE EXPRESSED IN KG AND ARE FOR REFERENCE ONLY. WHEN REQUIRED CERTIFIED DRAWINGS.
- 2.- FACE TO FACE VALUES HAVE A TOLERANCE OF ±0.06 IN FOR SIZES 10" & LOWER, FOR SIZES 12" & UP ±.12 IN.
- 3.- CRACKING PRESSURE IS FOR HORIZONTAL INSTALLATIONS ONLY. FOR VERTICAL INSTALLATIONS CONSULT FACTORY.

PRESSURE - TEMPERATURE RATINGS (I)



REFERENCES STANDARDS & CODES

CODE	DESCRIPTION
ANSI/API 594	VALVE DESIGN & MANUFACTURE
ASME B16.42	VALVE PRESSURE-TEMPERATURE RATINGS
ANSI/ASME B16.5	FLANGE DIMENSIONS
ANSI/API 594	VALVE FACE TO FACE DIMENSION
API 598	VALVE INSPECTION & PRESSURE TEST