

LIV DBB  
Sampling Ball Valve

Type SB13

## Principle

The LIV DBB sampling ball valve extracts a sample of the process at full operating pressure and temperature. The LIV DBB sampling ball valve has 2 ball valves for isolation and 1 needle valve for bleed and a sampling probe. The size of the probe is ½" sch. 80. The length is determined by the customer, however it is recommended that the probe is inserted 1/3 of inner pipe diameter into the pipe.

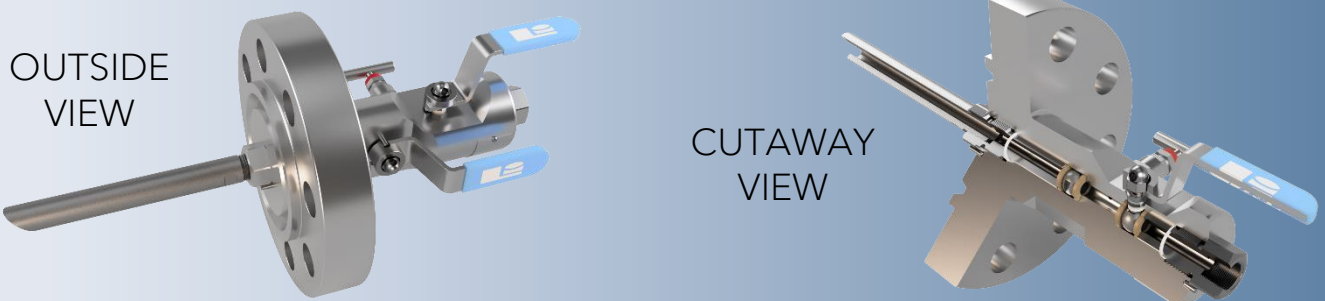
Wake frequency calculations according to the latest standards can be performed. If necessary, probe support or probe profiling can be supplied to overcome high frequencies. The LIV DBB sampling ball valve solutions offers cost, weight, and space saving.

## Construction

- The valve body is machined from a round bar stock material or from forged material standard.
- The raw material of the valve can be supplied according to NORSOK M 630 or to customer's specific requirements.
- The valve spindle is anti-blow out design with PTFE back seat gaskets.
- The sampling valve has a ball with 10 mm bore.
- The balls are polished for low friction. The ball valves have PEEK seats.
- The process connection is flanged, and sample outlet is ½" NPT int. with probe.
- The handle has a plastic sleeve for protection.
- The dust covers are coloured for application indication (vent)
- The valves are designed for PED 2014/68/EU.

## Technical Data

Flange size	1 - 2"
Pressure rating	150 lbs - 2500 lbs
Outlet connection	½" NPT int.
Material	AISI 316 (standard), A350LF2, 22Cr Duplex, 25Cr Duplex, 6Mo, Titanium, other materials on request.
Packing & Seats	PTFE, PEEK.
Temperature	÷ 40 to +260 °C
Operation	Handle, T-bar, or Anti tamper.
Coating	Standard offshore, to customer's spec., or none





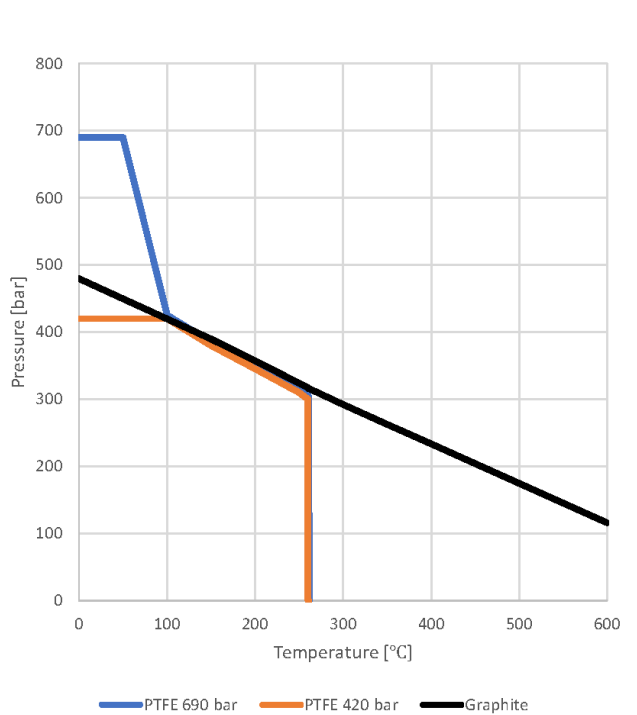
### Testing and Documentation

- Material certificate to EN 10204-3.1
- Certificate of compliance to NACE MR 01-75 or EN 15156
- Optional: cleaned for oxygen and hydrogen
- PMI test
- Pressure test certificate
- Fire safe tested acc. to EN 10497, API 607, BS 6755 part 2, ISO 5208
- Penetrant test on valve body to ASME BPV, ISO 3452-1 2021
- Fugitive emission to ISO 15848-1

### Accessories

- Plugs for the bleed connection
- Lockable handles

### Pressure and Temperature Rating



### HOW TO ORDER

lv-0-07-001-3e

Choose a code for each of the configuration steps. For special orders, please reach out to our sales team.

1 VALVE SIZE		2 VENT BONNET SELECTION		3 PRESSURE RATING (FLANGE)			
5	1"	2	Needle (SN)	01	150 lbs		
6	1 ½"	3	Anti-tamper (AN)	03	300 lbs		
7	2"	4	Needle, bolted	06	600 lbs		
		5	Anti-tamper	15	1500 lbs		
				25	2500 lbs		
4 MATERIAL							
	<i>Body material</i>			<i>Trim material</i>			
01	A350 LF2			AISI 316			
02	A182 316			AISI 316			
04	A182 22Cr. Duplex			22Cr. Duplex			
06	A182 25Cr. Duplex			25Cr. Duplex			
08	A182 6Mo			6Mo			
10	Titanium			Titanium			
11	Monel 400			Monel 400			
12	Hastelloy C-279			Hastelloy C-279			
13	Inconel 625			Inconel 625			
14	Inconel 825			Inconel 825			
5 FLANGE FACING		6 SEALS		7 BLEED CONNECTION		8 SAMPLE PROBE	
F	Raised face	T	PTFE	14	¼" NPT int.	1	½" sch. 80
T	Ring type joint	G	Graphite	12	½" NPT int.		
				13	½" BSPP int.		

**Example:** Type SB13-52.0302FT12.1-XXX

DBB sampling ball valve double block & bleed, valve size 1", Needle (SN T-bar), 300 lbs rating with RF facing, body in 316, needle packing in PTFE, 1/2" NPT int. bleed connection, 1/2" NPT sample probe, probe length in mm.