

Reliable seat seal

Design and Manufacture: Cast steel check valve to BS 1868, ASME B 16.34 and API 6D; Forged steel check valve to API 602.
 Inspection and Test: API 598 or API 6D.
 End flange dimension: ASME B 16.5 (for NPS ≤ 24);
 ASME B 16.47 series B, API 605 or ASME B 16.47 Series A, MSS SP-44 (for NPS > 24).
 BW end dimension: ASME B 16.25.
 Socket-weld dimension: ASME B 16.11.
 Face to face and end to end: ASME B 16.34.
 Pressure-temperature ratings: ASME B 16.34.
 Wall thickness dimension: API 600 and BS 1868.



Body and Bonnet Connection

The body and bonnet of Class 150~Class 900 check valves are usually with studs and nuts. And the body and bonnet of Class 1500~Class 2500 check valves are usually of pressurized seal design.

Body-To-Bonnet Joint

Stainless steel + flexible graphite wound gasket is used for Class 150 and Class 300 check valve, Stainless steel + flexible graphite wound gasket is used for Class 600 check valve, and joint gasket is also optional for Class 600 check valve: Ring joint gasket is used for Class 900 check valve: Pressurized seal design is used for Class 1500~Class 2500 check valves.

The features of check valve

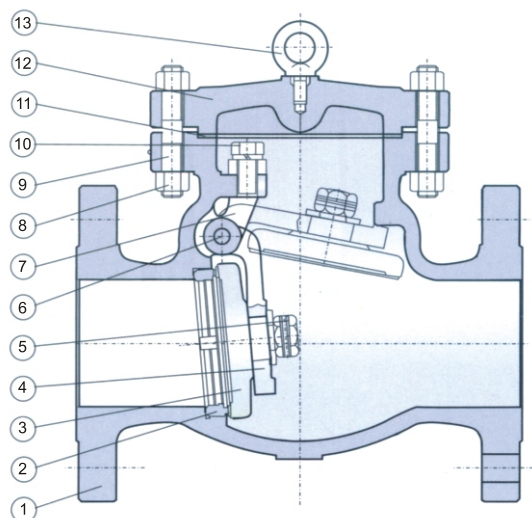
Bolted Bonnet;
 Swing and lift disc;
 Metallic seating surfaces.

Seat

For carbon steel check valve, the seat is usually forged steel. The sealing surface of the seat is spray welded with hard alloy Specified by the customer. Renewable threaded seat is used for NPS ≤ 10 check valves, and welded on seat can be also optional if being requested by the customer. Welded on seat is used for NPS ≥ 12 carbon steel gate valves. For stainless steel check Valve, integral seat is usually adopted, or to weld hard alloy directly integrally. Threaded or welded on seat is also optional for stainless steel check valve if being requested by the customer.



CAST STEEL SWING CHECK VALVE



Standards

Design and Manufacture: BS 1868 or API 6D
 Inspection and Test: API 598 or API 6D
 End flange dimension: ASME B 16.5;
 ASME B16.47 A, MSS SP-44;
 ASME B16.47B, API 605

BW end dimension: ASME B16.25
 Face to face (end to end): ASME B16.10
 Pressure-temperature ratings : ASME B16.34
 Wall thickness dimension: API 600 and BS 1868

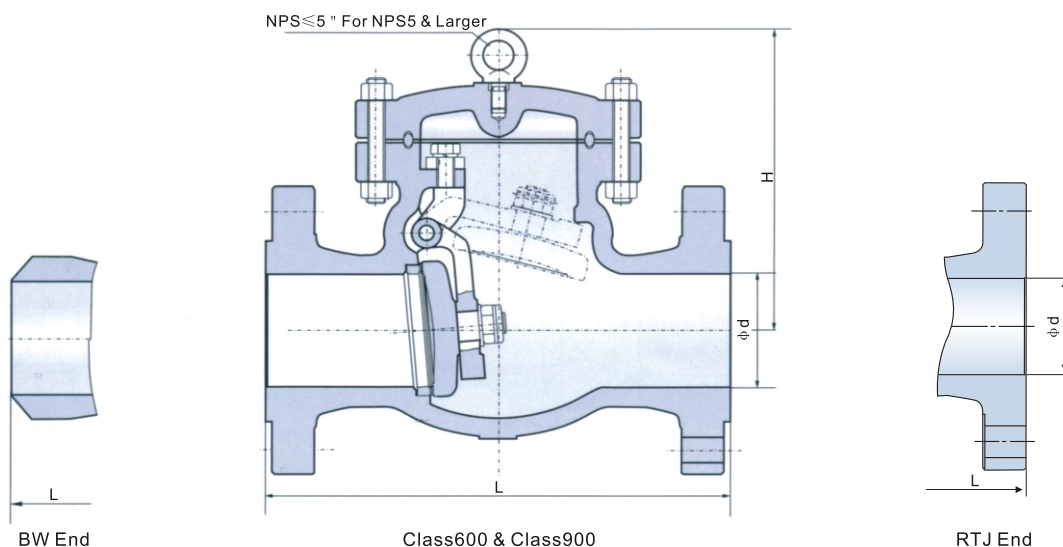
Parts and material list

Parts No.	Parts name	Materials				
		WCB/Trim1	WCB/Trim5	WCB/Trim8	CF8/304	CF8M/316
1	Body	ASTMA216 WCB	ASTMA216 WCB	ASTMA216 WCB	ASTMA351 CF8	ASTMA351 CF8M
2	Seatring	A105+13Cr	A105+STL	A105+STL	ASTMA351 CF8	ASTMA351 CF8M
3	Disc	ASTMA216 WCB+13Cr	ASTMA216 WCB+STL	ASTMA216 WCB+13Cr	ASTMA351 CF8	ASTMA351 CF8M
4	Arm	ASTMA216WCB	ASTMA216WCB	ASTMA216WCB	ASTMA351 CF8	ASTMA351 CF8M
5	Nut	ASTMA194 2H	ASTMA194 2H	ASTMA194 2H	ASTMA 1948	ASTMA 1948M
6	Armpin	ASTMA182 F6a	ASTMA182 F6a	ASTMA182 F6a	ASTMA182 F304	ASTMA182 F316
7	Yoke	ASTMA216 WCB	ASTMA216 WCB	ASTMA216 WCB	ASTMA351 CF8	ASTMA351 CF8M
8	Bonnet nut	ASTMA194 2H	ASTMA194 2H	ASTMA194 2H	ASTMA1948	ASTMA1948M
9	Bonnet bolt	ASTMA 193 B7	ASTMA 193 B7	ASTMA 193 B7	ASTMA193 B8	ASTMA193 B8M
10	Bolt	ASTMA193 B7	ASTMA193 B7	ASTMA193 B7	ASTMA193B8	ASTMA193B8M
11	Gasket	304 sheet+Graphite	304 sheet+Graphite	304 sheet+Graphite	304+Graphite	304+Graphite
12	Bonnet	ASTMA216 WCB	ASTMA216 WCB	ASTMA216 WCB	ASTMA351 CF8	ASTMA351 CF8M
13	Eye bolt	ASTMA181	ASTMA181	ASTMA181	ASTMA 181	ASTMA 181

Note: The chart above only lists out some common composition of steel check valve parts. We may provide other different parts material composition according to the customer's request or the actual valve working condition.



Class150~Class300 Cast Steel Swing Check Valve



Size		Class150						Class300					
NPS	DN	Dimensions(mm)					Weight (kg)	Dimensions(mm)					Weight (kg)
		L			d	H		L			d	H	
		R F	RFF	B W				R F	RFF	B W			
2	50	203	203	203	51	132	15	267	267	267	51	144	20
2½	65	216	216	216	64	147	20	292	292	292	64	169	35
3	80	241	241	241	76	176	27	318	318	318	76	210	40
4	100	292	292	292	102	198	45	356	356	356	102	260	61
5	125	330	330	330	127	255	58	400	400	400	127	295	80
6	150	356	356	356	152	320	69	445	445	445	152	326	130
8	200	495	495	495	203	380	131	533	533	533	203	380	190
10	250	622	622	622	254	440	219	622	622	622	254	440	296
12	300	699	699	699	305	480	321	711	711	711	305	520	450
14	350	787	787	787	337	530	380	838	838	838	337	540	640
16	400	864	864	864	387	580	560	864	864	664	387	588	850
18	450	978	978	978	438	618	630	978	978	978	438	670	1030
20	500	978	978	978	489	657	770	1016	1016	1016	489	720	1330
24	600	1295	1295	1295	591	760	960	1346	1346	1346	591	850	1950
26	650	1295	1295	1295	633	840	1250	1346	1346	1346	633	920	2300
28	700	1448	1448	1448	684	920	1580	1499	1499	1499	684	1150	2600
30	750	1524	1524	1524	735	980	1950	1594	1594	1594	735	1260	3200