

Ring Joint Gaskets__Cixi Jayu Sealing Materials Co., Ltd.

Jayuseal metallic Ring Joint Gaskets are manufactured for application at elevated temperatures and pressures. All Gaskets are manufactured from fully traceable materials. Each ring type joint gasket is identified by low stress stamping with batch, style, ring number, material reference, Product Specification Level (PSL) and a unique material identification number. Such full and comprehensive traceability, from material source with mill certification to final supply, is an essential ingredient in the company's strict quality assurance procedures and exceeds those demanded by the highest API 6A PSL 4.

Type R Ring Joint Gaskets

Jayu-240R Oval section and Junio-240R Octagonal section ring joint gaskets are designed for flanges with standard ring type grooves. These standard shapes are used to seal pressures up to 5,000 psi in accordance with API 6A.

The Octagonal cross section has a higher sealing efficiency than the oval cross section and is therefore preferred. The oval section ring joints were originally designed for the now obsolete round bottom groove. Both the oval and the octagonal cross section are interchangeable on the flat bottom groove design.

Type RX Ring Joint Gaskets

Jayu-240RX Ring Joint Gaskets are designed for pressures up to 5,000 psi.

A pressure activated ring joint gasket, its shape is designed to use the fluid pressure to increase sealability. The outside sealing surface of the ring joint gasket makes the initial contact with the flange. As the internal pressure rises the contact pressure between ring joint and flange also increases. This is sometimes referred to as a pressure activated ring joint, due to the shape of the gasket. High seating pressures are created increasing the sealability. This design characteristic makes the RX ring joint more resistant to vibrations, pressure surges and shocks that occur during oil well drilling.

Jayuseal-240SRX Ring Type Joint Gasket is the same dimension in design to the RX Ring, however, the suffix 'S' indicates that additional pressure equalization holes have been drilled in accordance with API 17D for use on sub sea wellhead and christmas tree equipment.

Type BX Ring Joint Gaskets

Junio-240BX Type Ring Joint Gaskets are designed for pressures up to 20,000 psi, suitable only for use with API type BX flanges and grooves.

The gasket has a square cross section with bevelled corners. The average diameter of the ring is slightly greater than that of the flange groove. This way, when the RTJ ring joint is seated, it stays pre-compressed by the outside diameter, creating high seating stress.

Junio-240SBX Ring Type Joint Gasket is the same design and dimensions as the BX Ring, however the suffix 'S' indicates that additional pressure equalization holes have been drilled in accordance with API 17D for use on sub sea wellhead and christmas tree equipment.

Jayuseal supplies a range of specialized shape and size Ring Type Joints for critical and non standard applications to suit the requirements of the petrochemical industry.

Materials

The gasket material should be selected to suit the service conditions. It is always recommended that the gasket material be softer than the mating flanges. The more popular Ring-Joint Gasket materials, with the recommended maximum hardness and identification as specified in API 6A and ASME B16.20, are shown in the table below.

For more highly specialized applications, Ring Joint Gaskets can be machined from stainless steel, super duplex steels and other exotic materials such as Monel, Inconel, Incoloy, and Hastelloy. The Technical Department is available to advise on other materials.

Material (Trade Name)	Identifi- cation	DIN Specification	DIN Material No.	B.S.	AISI-ASTM UNS	Maximum Hardness		Temperature		Density g/cm ³
						Brinell HB	Rockwell B HRB	Min.	Max.	
Soft Iron	D	-	-	-	-	90	56	-40	500	7.85
Low Carbon Steel	S	R st 37.2	-	-	-	120	68	-40	500	7.85
F5	F5	5 Cr 0.5 mo	1.7362	-	A182FS	130	72	-40	650	7.83
SS 304	S304	X5Cr Ni 18	1.4301	304S15/ 16/13	304	160	83	-250	550	7.90
SS 304L	S304L	X2 Cr Ni 18.9	1.4306	304S11	304L	160	83	-250	550	7.90
SS 309	S309	X15CrNiSi20.12	1.4828	304S24	309	160	83	-100	1000	7.90
SS 316	S316	X5 Cr Ni Mo 18.10	1.4401	316S16	316	160	83	-100	550	7.90
SS 316L	S316L	X2 Cr Ni Mo 18.10	1.4404	316S11/13	316L	160	83	-100	550	7.90
SS 316Ti	S316Ti	X10CrNi MoTi18.10	1.4571	320S31	316Ti	160	83	-100	550	7.80
SS 321	S321	X10 Cr Ni Ti 18.9	1.4541	321S12/ 49/87	321	160	83	-250	550	7.90
SS 347	S347	X10 Cr Ni Nb 18.9	1.4550	347S31	347	160	83	-250	500	7.90
SS 410	S410	X6 Cr 13	1.4000	410S21	410	170	86	-20	850	7.80
254SMO	6Mo	X1Cr NiMoCuN20.18.7	1.4547	-	S31254	180	89	-100	500	8.00
Duplex	2205	X2CrNiMoN22.5.3	14462	31853	S31803/ 32205	230 approx	99	-40	300	7.80
Super Duplex	2507	X2 Cr NiMoN25.6.3	14410	-	S32750	230 approx	99	-40	300	7.80
Aluminium	AL 1050	A1 99.5	3.0255	1B	A91050	30	-	-250	300	2.71
Silver	Ag	-	-	-	-	28 (HV)	-	-250	750	10.50
Copper	Cu	SF-Cu	2.0090	C106	C12200	80 approx	-	-250	400	8.90
Brass	CuZn37	Cu Za 37 (M563)	20321	CZ108	C27200	60 approx	-	-100	350	8.50
Nickel 200	Ni 200	Ni 99.2	2.4066	3072-76 NA11	NO2200	110	62	-250	600	8.90
Monel 400	400	Ni Cu 30 Fe	2.4360	3072-76 NA13	NO4400	150	80	-125	600	8.80
Inconel 600	600	Ni Cu 15 Fe	2.4816	3072-76 NA14	NO6600	150	80	-100	950	8.40
Inconel 625	625	Ni Cr 22 Mo 9 Mb	2.4856	3072-76 NA 21	NO6625	150	80	-50	450	8.44
Incoloy 800	800	X10NiCrAl1Ti3220	1.4876	3072-76 NA15	NO8800	150	80	-100	850	8.00
Incoloy 825	825	Ni Cr 21 Mo	2.4858	3072-76 NA16	NO8825	195	92	-100	450	8.14
Hastelloy B2	B2	Ni Mo 28	2.4617	-	NI0665	230	99	-200	450	9.20
Hastelloy C276	C276	Ni Mo16Cr15W	2.4819	-	NI0276	210	95	-200	450	8.90
Titanium	Ti2	Ti 99.8	3.7025	TA2	R50400	215 approx	96	-250	350	4.50

Ring joint gasket H.S. code: 71382200.01

