



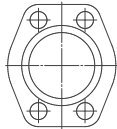
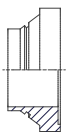
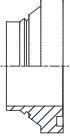
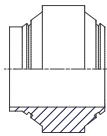


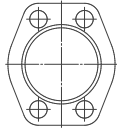


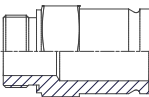
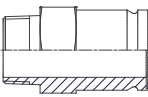






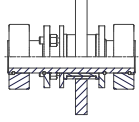
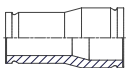
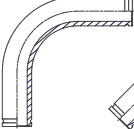
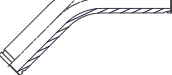
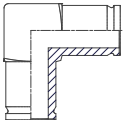

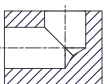
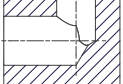
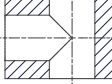
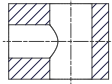
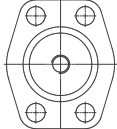
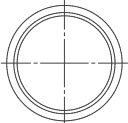
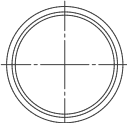
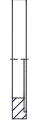

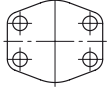



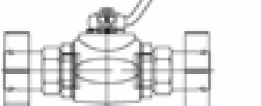
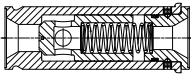
## **SAE 3000 System**

210 – 350 bar

ENGINEERING YOUR SUCCESS.

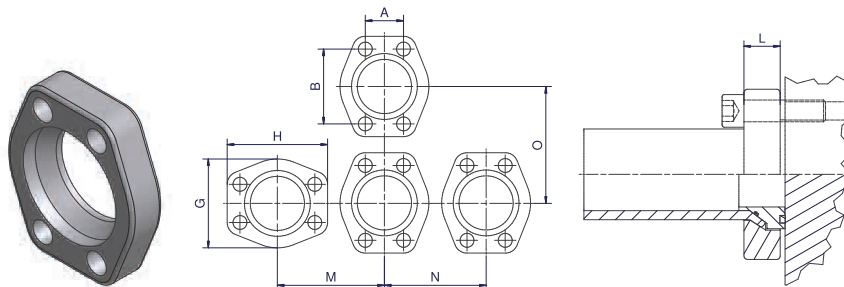


Programme overview SAE 3000/ISO 6162-1 footprint

Parflange® F37 connection parts	<b>Flanges</b>  <b>F37 – p.74/75</b>					
	<b>Inserts</b>  <b>TFB – p.78</b>  <b>TFV – p.79</b>  <b>TT – p.80</b>  <b>TF – p.81</b>				<b>Sleeve</b>  <b>SL – p.82</b>	
Retaining ring connection parts	<b>Flanges</b>  <b>R – p.76</b>  <b>R-Ring – p.83</b>  <b>PSC – p.77</b>					
	<b>Male / Female</b>  <b>MTF-R – p.84</b>  <b>MTF-N – p.85</b>  <b>FTF-R – p.86</b>			<b>Hose</b>  <b>Hose – p.87</b>  		<b>Weld</b>  <b>WA – p.88/89</b>
	<b>Tube to Tube</b>  <b>BF – p.90</b>  <b>VB – p.91</b>  <b>RF – p.92</b>  <b>FB90 – p.93/95</b>  <b>FB45 – p.94/96</b>  <b>LF – p.97</b>  <b>TF – p.98</b>					
SAE connection parts	<b>Blocks</b>  <b>LB – p.99</b>  <b>LBR – p.100</b>  <b>TB – p.101</b>  <b>TBR – p.102</b>  <b>BFV – p.103</b>					
Seals Adapter Bolts	<b>Components</b>  <b>BS – p.104</b>  <b>F37S – p.104</b>  <b>AO – p.105</b>  <b>TBT – p.106</b>  <b>AP – p.107</b>					<b>Bolts and Nuts</b>  <p>p.108</p>
Ball valves	 <b>KH – p.109</b>  <b>KH – p.110-112</b>  <b>KH-R – p.113</b>  <b>RHD-R – p.114</b>					

**F37 – Flare flange | SAE 3000/ISO 6162-1 footprint**

SAE 3000/ISO 6162-1



**Parflange F37 flange dimensions**

\*Jump size flanges (no adapter sleeves (SL...) necessary)

Size Inch	Flange Order code	A	B	G	H	M	N	O	L	Weight (Steel) kg/1 piece	W.P. bar
1/2	<b>F37-308-CFX</b>	17.5	38.1	46	54.0	52	49	56	19	0.20	350
1/2	<b>F37-308/16-CFX*</b>	17.5	38.1	46	54.0	52	49	56	19	0.22	350
3/4	<b>F37-312-CFX</b>	22.3	47.6	52	65.0	61	55	68	20	0.25	350
1	<b>F37-316-CFX</b>	26.2	52.4	60	71.0	67	61	72	24	0.30	350
1	<b>F37-316/25-CFX*</b>	26.2	52.4	60	71.0	67	61	72	24	0.45	350
1	<b>F37-316/30-CFX*</b>	26.2	52.4	60	71.0	67	61	72	24	0.39	350
1 1/4	<b>F37-320-CFX</b>	30.2	58.7	68	79.0	78	75	82	22	0.46	280
1 1/4	<b>F37-320/38-CFX*</b>	30.2	58.7	68	79.0	78	75	82	22	0.46	280
1 1/2	<b>F37-324-CFX</b>	35.7	69.9	78	93.0	90	85	96	25	0.68	280
1 1/2	<b>F37-324/42-CFX*</b>	35.7	69.9	78	93.0	90	85	96	25	0.75	280
2	<b>F37-332-CFX</b>	42.9	77.8	97	101.5	102	99	104	33	0.98	280
2 1/2	<b>F37-340-CFX</b>	50.8	88.9	109	115.5	114	111	117	44	1.63	210
3	<b>F37-348-CFX</b>	61.9	106.4	132	135.0	136	133	137	50	2.79	210

**Parflange F37 flange dimensions**

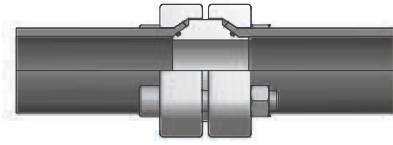
\*Jump size flanges (no adapter sleeves (SL...) necessary)

Size Inch	Flange Order code	A	B	G	H	M	N	O	L	Thread	Weight (Steel) kg/1 piece	W.P. bar
3/4	<b>F37-312T-CFX</b>	22.3	47.6	52	65.0	61	55	68	20	M10	0.25	350
1	<b>F37-316T-CFX</b>	26.2	52.4	60	71.0	67	61	72	24	M10	0.30	350
1	<b>F37-316/30T-CFX*</b>	26.2	52.4	60	71.0	67	61	72	24	M10	0.39	350
1 1/4	<b>F37-320T-CFX</b>	30.2	58.7	68	79.0	78	75	82	22	M10	0.46	280
1 1/4	<b>F37-320/38T-CFX*</b>	30.2	58.7	68	79.0	78	75	82	22	M10	0.46	280
1 1/2	<b>F37-324T-CFX</b>	35.7	69.9	78	93.0	90	85	96	25	M10	0.68	280
2	<b>F37-332T-CFX</b>	42.9	77.8	97	101.5	102	99	104	33	M12	0.98	280
2 1/2	<b>F37-340T-CFX</b>	50.8	88.9	109	115.5	114	111	117	44	M12	1.63	210

Please change suffixes according to material/surface required

Order code suffixes			
Material	Suffix surface and material	Example	Comments
Steel, zinc plated, Cr(VI)-free	CF	F37-320-CFX	
Stainless steel	SS	F37-320-SSX	
Galvanized hot dip zinc	TZN	F37-320-TZNX	on request





Part combination flaring SAE 3000

Flange Pressure (bar)	Size Inch	Pipe Size	Flange SAE 3000 ISO 6162-1	Insert*	F37 Seal	Sleeve	F37 Seal / Flat Face Bonded Seal		
							Bolts Tube to Port	Bolts Tube to Tube	Nut
350	1/2	16X2.0	F37-308-CFX	IN08-16X2.0T...	F37S08X	SL08-25-16-CFX**	4 x ZYLS8X35	4 x ZYLS8X55	4 x ISO4032-M8
	1/2	18X2.0	F37-308-CFX	IN08-18X2.0T...	F37S08X	SL08-25-18-CFX	4 x ZYLS8X35	4 x ZYLS8X55	4 x ISO4032-M8
	1/2	20X2.0	F37-308-CFX	IN08-20X2.0T...	F37S08X	SL08-25-20-CFX	4 x ZYLS8X35	4 x ZYLS8X55	4 x ISO4032-M8
	1/2	20X2.5	F37-308-CFX	IN08-20X2.5T...	F37S08X	SL08-25-20-CFX	4 x ZYLS8X35	4 x ZYLS8X55	4 x ISO4032-M8
	1/2	25X2.5	F37-308-CFX	IN08-25X2.5T...	F37S08X		4 x ZYLS8X35	4 x ZYLS8X55	4 x ISO4032-M8
	1/2	25X3.0	F37-308-CFX	IN08-25X3.0T...	F37S08X		4 x ZYLS8X35	4 x ZYLS8X55	4 x ISO4032-M8
	3/4	20X2.0	F37-312-CFX	IN12-20X2.0T...	F37S12X	SL12-30-20-CFX	4 x ZYLS10X40	4 x ZYLS10X65	4 x ISO4032-M10
	3/4	20X2.5	F37-312-CFX	IN12-20X2.5T...	F37S12X	SL12-30-20-CFX	4 x ZYLS10X40	4 x ZYLS10X65	4 x ISO4032-M10
	3/4	25X2.5	F37-312-CFX	IN12-25X2.5T...	F37S12X	SL12-30-25-CFX	4 x ZYLS10X40	4 x ZYLS10X65	4 x ISO4032-M10
	3/4	25X3.0	F37-312-CFX	IN12-25X3.0T...	F37S12X	SL12-30-25-CFX	4 x ZYLS10X40	4 x ZYLS10X65	4 x ISO4032-M10
	3/4	30X3.0	F37-312-CFX	IN12-30X3.0T...	F37S12X		4 x ZYLS10X40	4 x ZYLS10X65	4 x ISO4032-M10
	3/4	30X4.0	F37-312-CFX	IN12-30X4.0T...	F37S12X		4 x ZYLS10X40	4 x ZYLS10X65	4 x ISO4032-M10
	1	25X2.5	F37-316-CFX	IN16-25X2.5T...	F37S16X	SL16-38-25-CFX**	4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
	1	25X3.0	F37-316-CFX	IN16-25X3.0T...	F37S16X	SL16-38-25-CFX**	4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
	1	30X3.0	F37-316-CFX	IN16-30X3.0T...	F37S16X	SL16-38-30-CFX**	4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
	1	30X4.0	F37-316-CFX	IN16-30X4.0T...	F37S16X	SL16-38-30-CFX**	4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
	1	38X2.5	F37-316-CFX	IN16-38X2.5T...	F37S16X		4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
	1	38X3.0	F37-316-CFX	IN16-38X3.0T...	F37S16X		4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
	1	38X4.0	F37-316-CFX	IN16-38X4.0T...	F37S16X		4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
	1	38X5.0	F37-316-CFX	IN16-38X5.0T...	F37S16X		4 x ZYLS10X45	4 x ZYLS10X75	4 x ISO4032-M10
280	1 1/4	30X3.0	F37-320-CFX	IN20-30X3.0T...	F37S20X	SL20-42-30-CFX	4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/4	30X4.0	F37-320-CFX	IN20-30X4.0T...	F37S20X	SL20-42-30-CFX	4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/4	38X3.0	F37-320-CFX	IN20-38X3.0T...	F37S20X	SL20-42-38-CFX	4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/4	38X4.0	F37-320-CFX	IN20-38X4.0T...	F37S20X	SL20-42-38-CFX	4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/4	38X5.0	F37-320-CFX	IN20-38X5.0T...	F37S20X	SL20-42-38-CFX	4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/4	42X3.0	F37-320-CFX	IN20-42X3.0T...	F37S20X		4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/4	42X4.0	F37-320-CFX	IN20-42X4.0T...	F37S20X		4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/2	38X3.0	F37-324-CFX	IN24-38X3.0T...	F37S24X	SL24-50-38-CFX	4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	1 1/2	38X4.0	F37-324-CFX	IN24-38X4.0T...	F37S24X	SL24-50-38-CFX	4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	1 1/2	38X5.0	F37-324-CFX	IN24-38X5.0T...	F37S24X	SL24-50-38-CFX	4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	1 1/2	42X3.0	F37-324-CFX	IN24-42X3.0T...	F37S24X	SL24-50-42-CFX**	4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	1 1/2	42X4.0	F37-324-CFX	IN24-42X4.0T...	F37S24X	SL24-50-42-CFX**	4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	1 1/2	50X3.0	F37-324-CFX	IN24-50X3.0T...	F37S24X		4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	1 1/2	50X5.0	F37-324-CFX	IN24-50X5.0T...	F37S24X		4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	1 1/2	50X6.0	F37-324-CFX	IN24-50X6.0T...	F37S24X		4 x ZYLS12X45	4 x ZYLS12X80	4 x ISO4032-M12
	2	50X3.0	F37-332-CFX	IN32-50X3.0T...	F37S32X	SL32-60-50-CFX	4 x ZYLS12X55	4 x ZYLS12X100	4 x ISO4032-M12
	2	50X5.0	F37-332-CFX	IN32-50X5.0T...	F37S32X	SL32-60-50-CFX	4 x ZYLS12X55	4 x ZYLS12X100	4 x ISO4032-M12
	2	50X6.0	F37-332-CFX	IN32-50X6.0T...	F37S32X	SL32-60-50-CFX	4 x ZYLS12X55	4 x ZYLS12X100	4 x ISO4032-M12
	2	60X3.0	F37-332-CFX	IN32-60X3.0T...	F37S32X		4 x ZYLS12X55	4 x ZYLS12X100	4 x ISO4032-M12
	2	60X5.0	F37-332-CFX	IN32-60X5.0T...	F37S32X		4 x ZYLS12X55	4 x ZYLS12X100	4 x ISO4032-M12
2	60X6.0	F37-332-CFX	IN32-60X6.0T...	F37S32X		4 x ZYLS12X55	4 x ZYLS12X100	4 x ISO4032-M12	
210	2 1/2	60X3.0	F37-340-CFX	IN40-60X3.0T...	F37S40X	SL40-75-60-CFX	4 x ZYLS12X65	4 x ZYLS12X120	4 x ISO4032-M12
	2 1/2	60X5.0	F37-340-CFX	IN40-60X5.0T...	F37S40X	SL40-75-60-CFX	4 x ZYLS12X65	4 x ZYLS12X120	4 x ISO4032-M12
	2 1/2	60X6.0	F37-340-CFX	IN40-60X6.0T...	F37S40X	SL40-75-60-CFX	4 x ZYLS12X65	4 x ZYLS12X120	4 x ISO4032-M12
	2 1/2	75X3.0	F37-340-CFX	IN40-75X3.0T...	F37S40X		4 x ZYLS12X65	4 x ZYLS12X120	4 x ISO4032-M12
	2 1/2	75X5.0	F37-340-CFX	IN40-75X5.0T...	F37S40X		4 x ZYLS12X65	4 x ZYLS12X120	4 x ISO4032-M12
	3	75X3.0	F37-348-CFX	IN48-75X3.0T...	F37S48X	SL48-90-75-CFX	4 x ZYLS16X80	4 x ZYLS16X140	4 x ISO4032-M16
	3	75X5.0	F37-348-CFX	IN48-75X5.0T...	F37S48X	SL48-90-75-CFX	4 x ZYLS16X80	4 x ZYLS16X140	4 x ISO4032-M16
	3	90X3.5	F37-348-CFX	IN48-90X3.5T...	F37S48X		4 x ZYLS16X80	4 x ZYLS16X140	4 x ISO4032-M16
	3	90X5.0	F37-348-CFX	IN48-90X5.0T...	F37S48X		4 x ZYLS16X80	4 x ZYLS16X140	4 x ISO4032-M16

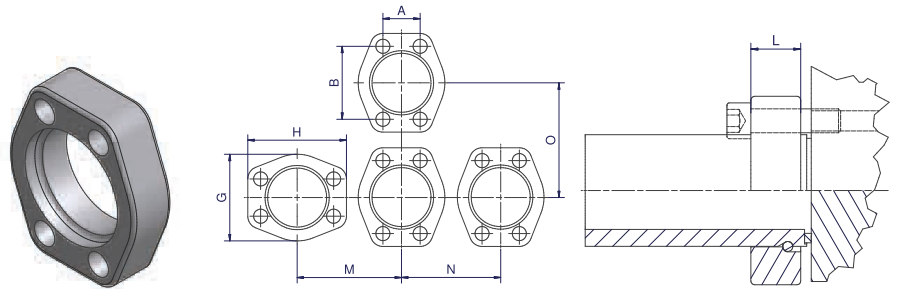
Select the complete version: \* ...FBCF Bonded Seal version ...FVCF F37 Seal version ...TCF Tube to Tube version ...FCF Flat Face version

\*\*Jump size flanges available alternatively to adapter sleeve, see page 74

Pressure rates related to flanges. Other sizes like schedule on request.  
Bolts and nuts are not included in complete part numbers. Bolts and nuts for flanges see page 104

**R – Retaining ring flange | SAE 3000/ISO 6162-1 footprint**

SAE 3000/ISO 6162-1

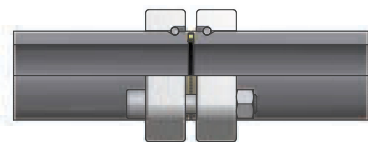


**Retaining ring flange dimensions**

Size Inch	Order Code	A	B	G	H	M	N	O	L	Weight (Steel) kg/1 piece	W.P. bar
1/2	<b>R-308-CFX</b>	17.5	38.1	46	54.0	52	49	56	19	0.2	350
3/4	<b>R-312-CFX</b>	22.3	47.6	52	65.0	61	55	68	20	0.2	350
1	<b>R-316-CFX</b>	26.2	52.4	59	70.5	67	61	72	24	0.3	350
1 1/4	<b>R-320-CFX</b>	30.2	58.7	73	80.5	78	75	82	22	0.5	280
1 1/2	<b>R-324-CFX</b>	35.7	69.9	83	94.5	90	85	96	25	0.6	280
2	<b>R-332-CFX</b>	42.9	77.8	97	101.5	102	99	104	33	1.0	280
2 1/2	<b>R-340-CFX</b>	50.8	88.9	109	115.5	114	111	117	44	1.6	210
3	<b>R-348-CFX</b>	61.9	106.4	132	135.0	136	133	137	50	2.5	210

Please change suffixes according to material/surface required

Order code suffixes			
Material	Suffix surface and material	Example	Comments
Steel, zinc plated, Cr(VI)-free	CF	R-320-CFX	
Stainless steel	SS	R-320-SSX	
Galvanized hot dip zinc	TZN	R-320-TZNX	on request



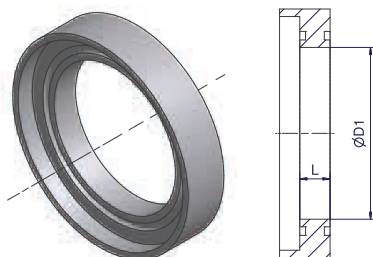
**Part combination Bonded seal SAE 3000 connection**

Flange pressure (bar)	Size Inch	Pipe Size	Flange	Retaining Ring	Bonded Seal	Bolts Tube to Port	Bolts Tube to Tube	Nut
<b>350</b>	1/2	26X6.0	R-308-CFX	R08X	BS08SNX	4 x ZYLS8X35	4 x ZYLS8X60	4 x ISO4032-M8
	3/4	36X8.0	R-312-CFX	R12X	BS12SNX	4 x ZYLS10X40	4 x ZYLS10X65	4 x ISO4032-M10
	1	39X7.5	R-316-CFX	R16X	BS16SNX	4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
<b>280</b>	1 1/4	46X8.0	R-320-CFX	R20X	BS20SNX	4 x ZYLS10X40	4 x ZYLS10X70	4 x ISO4032-M10
	1 1/2	56X8.5	R-324-CFX	R24X	BS24SNX	4 x ZYLS12X50	4 x ZYLS12X80	4 x ISO4032-M12
	2	66X8.5	R-332-CFX	R32X	BS32SNX	4 x ZYLS12X55	4 x ZYLS12X90	4 x ISO4032-M12
<b>210</b>	2 1/2	80x10.0	R-340-CFX	R40X	BS40SNX	4 x ZYLS12X65	4 x ZYLS12X120	4 x ISO4032-M12
	3	97X12.0	R-348-CFX	R48X	BS48SNX	4 x ZYLS16X80	4 x ZYLS16X130	4 x ISO4032-M16



**PSC – Pipe seal carrier | SAE 3000/ISO 6162-1 footprint**

SAE 3000/ISO 6162-1

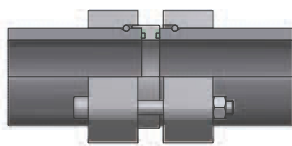


Size Inch	Pipe size	L	D1	Seal carrier	Flange pressure (bar)
1 1/2	56X8.5			on request	
2	66X8.5	10.0	49	PSC32-66X8.5VCF	
2 1/2	80X10	15.0	60	PSC40-80X10VCF	210
3	97X12	15.0	73	PSC48-97X12VCF	

Other sizes on request  
 Steel PSC incl. seals  
 Stainless steel PSC without seals

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	PSC40-80X10VCF
Stainless steel	SS	PSC40-80X10VSSX



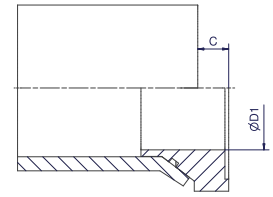
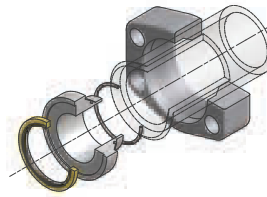
**Part combination Pipe seal carrier SAE 3000 connection**

Flange pressure (bar)	Size Inch	Pipe Size	Flange	Retaining Ring	Pipe Seal Carrier	O-Ring	Bolts Tube to Port	Bolts Tube to Tube	Nut
<b>280</b>	1 1/2	56X8.5	R-324-CFX	R24X	PSC24-56X8.5VCF	on request	on request	on request	on request
	2	66X8.5	R-332-CFX	R32X	PSC32-66X8.5VCF	2 x OR55.25X2.62	4 x ZYLS12X60	4 x ZYLS12X100	4 x ISO4032-M12
<b>210</b>	2 1/2	80X10	R-340-CFX	R40X	PSC40-80X10VCF	2 x OR66.27X3.53	4 x ZYLS12X85	4 x ZYLS12X125	4 x ISO4032-M12
	3	97X12	R-348-CFX	R48X	PSC48-97X12VCF	2 x OR78.97X3.53	4 x ZYLS16X100	4 x ZYLS16X140	4 x ISO4032-M16

Other sizes on request

## TFB – Flare flange connection

Tube to port connection, bonded seal



Size		Flange* incl. Insert + Bonded Seal + O-Ring Order code	D1	C	Insert incl. Bonded Seal + O-Ring Order code	Bonded Seal Order code	O-Ring Order code	Weight (Steel) kg/1 piece
Inch	Tube							
1/2	16X2.0	<b>F37-308-16X2.0TFBCF</b>	9.5	8.0	IN08-16X2.0TFBCF	BS08SNX	OR12X1.0X	0.24
1/2	18X2.0	<b>F37-308-18X2.0TFBCF</b>	11.5	8.0	IN08-18X2.0TFBCF	BS08SNX	OR14X1.0X	0.24
1/2	20X2.0	<b>F37-308-20X2.0TFBCF</b>	13.5	8.0	IN08-20X2.0TFBCF	BS08SNX	OR16X1.0X	0.24
1/2	20X2.5	<b>F37-308-20X2.5TFBCF</b>	13.5	8.0	IN08-20X2.5TFBCF	BS08SNX	OR16X1.0X	0.24
1/2	25X2.5	<b>F37-308-25X2.5TFBCF</b>	13.5	10.0	IN08-25X2.5TFBCF	BS08SNX	OR20X1.0X	0.25
1/2	25X3.0	<b>F37-308-25X3.0TFBCF</b>	13.0	8.0	IN08-25X3.0TFBCF	BS08SNX	OR20X1.0X	0.24
3/4	20X2.0	<b>F37-312-20X2.0TFBCF</b>	13.5	8.0	IN12-20X2.0TFBCF	BS12SNX	OR16X1.0X	0.31
3/4	20X2.5	<b>F37-312-20X2.5TFBCF</b>	12.5	8.0	IN12-20X2.5TFBCF	BS12SNX	OR16X1.0X	0.31
3/4	25X2.5	<b>F37-312-25X2.5TFBCF</b>	17.5	10.0	IN12-25X2.5TFBCF	BS12SNX	OR20X1.0X	0.31
3/4	25X3.0	<b>F37-312-25X3.0TFBCF</b>	16.5	8.0	IN12-25X3.0TFBCF	BS12SNX	OR20X1.0X	0.32
3/4	30X3.0	<b>F37-312-30X3.0TFBCF</b>	19.0	8.5	IN12-30X3.0TFBCF	BS12SNX	OR25X1.0X	0.32
3/4	30X4.0	<b>F37-312-30X4.0TFBCF</b>	19.0	8.5	IN12-30X4.0TFBCF	BS12SNX	OR22X1.0X	1.32
1	25X2.5	<b>F37-316-25X2.5TFBCF</b>	17.5	10.0	IN16-25X2.5TFBCF	BS16SNX	OR20X1.0X	0.39
1	25X3.0	<b>F37-316-25X3.0TFBCF</b>	16.5	8.0	IN16-25X3.0TFBCF	BS16SNX	OR20X1.0X	0.39
1	30X3.0	<b>F37-316-30X3.0TFBCF</b>	21.5	8.5	IN16-30X3.0TFBCF	BS16SNX	OR25X1.0X	0.39
1	30X4.0	<b>F37-316-30X4.0TFBCF</b>	19.5	8.5	IN16-30X4.0TFBCF	BS16SNX	OR22X1.0X	0.39
1	38X2.5	<b>F37-316-38X2.5TFBCF</b>	25.0	9.5	IN16-38X2.5TFBCF	BS16SNX	OR34X1.0X	0.41
1	38X3.0	<b>F37-316-38X3.0TFBCF</b>	25.0	9.0	IN16-38X3.0TFBCF	BS16SNX	OR34X1.0X	0.40
1	38X4.0	<b>F37-316-38X4.0TFBCF</b>	25.0	10.0	IN16-38X4.0TFBCF	BS16SNX	OR30X1.0X	0.40
1	38X5.0	<b>F37-316-38X5.0TFBCF</b>	25.0	8.0	IN16-38X5.0TFBCF	BS16SNX	OR28X1.0X	0.39
1 1/4	30X3.0	<b>F37-320-30X3.0TFBCF</b>	21.5	8.5	IN20-30X3.0TFBCF	BS20SNX	OR25X1.0X	0.57
1 1/4	30X4.0	<b>F37-320-30X4.0TFBCF</b>	19.5	8.5	IN20-30X4.0TFBCF	BS20SNX	OR22X1.0X	0.58
1 1/4	38X3.0	<b>F37-320-38X3.0TFBCF</b>	29.5	9.0	IN20-38X3.0TFBCF	BS20SNX	OR34X1.0X	0.56
1 1/4	38X4.0	<b>F37-320-38X4.0TFBCF</b>	27.0	10.0	IN20-38X4.0TFBCF	BS20SNX	OR30X1.0X	0.57
1 1/4	38X5.0	<b>F37-320-38X5.0TFBCF</b>	25.5	8.0	IN20-38X5.0TFBCF	BS20SNX	OR28X1.0X	0.56
1 1/4	42X3.0	<b>F37-320-42X3.0TFBCF</b>	31.5	10.0	IN20-42X3.0TFBCF	BS20SNX	OR37.82X1.78X	0.57
1 1/4	42X4.0	<b>F37-320-42X4.0TFBCF</b>	31.5	10.0	IN20-42X4.0TFBCF	BS20SNX	OR34X1.0X	0.56
1 1/2	38X3.0	<b>F37-324-38X3.0TFBCF</b>	27.5	9.0	IN24-38X3.0TFBCF	BS20SNX	OR34X1.0X	0.65
1 1/2	38X4.0	<b>F37-324-38X4.0TFBCF</b>	27.5	10.0	IN24-38X4.0TFBCF	BS24SNX	OR30.X1.0X	0.87
1 1/2	38X5.0	<b>F37-324-38X5.0TFBCF</b>	25.0	8.0	IN24-38X5.0TFBCF	BS24SNX	OR28X1.0X	0.87
1 1/2	42X3.0	<b>F37-324-42X3.0TFBCF</b>	35.0	10.0	IN24-42X3.0TFBCF	BS24SNX	OR37.82X1.78X	0.88
1 1/2	42X4.0	<b>F37-324-42X4.0TFBCF</b>	31.5	10.0	IN24-42X4.0TFBCF	BS24SNX	OR34X1.0X	0.87
1 1/2	50X3.0	<b>F37-324-50X3.0TFBCF</b>	36.0	11.0	IN24-50X3.0TFBCF	BS24SNX	OR44.17X1.78X	0.87
1 1/2	50X5.0	<b>F37-324-50X5.0TFBCF</b>	36.0	10.0	IN24-50X5.0TFBCF	BS24SNX	OR41X1.78X	0.87
1 1/2	50X6.0	<b>F37-324-50X6.0TFBCF</b>	35.0	10.0	IN24-50X6.0TFBCF	BS24SNX	OR41X1.78X	0.87
2	50X3.0	<b>F37-332-50X3.0TFBCF</b>	41.5	11.0	IN32-50X3.0TFBCF	BS32SNX	OR44.17X1.78X	1.20
2	50X5.0	<b>F37-332-50X5.0TFBCF</b>	37.5	10.0	IN32-50X5.0TFBCF	BS32SNX	OR41X1.78X	1.22
2	50X6.0	<b>F37-332-50X6.0TFBCF</b>	35.0	10.0	IN32-50X6.0TFBCF	BS32SNX	OR41X1.78X	1.25
2	60X3.0	<b>F37-332-60X3.0TFBCF</b>	46.0	12.0	IN32-60X3.0TFBCF	BS32SNX	OR53.7X1.78X	1.25
2	60X5.0	<b>F37-332-60X5.0TFBCF</b>	46.0	11.0	IN32-60X5.0TFBCF	BS32SNX	OR50.52X1.78X	1.22
2	60X6.0	<b>F37-332-60X6.0TFBCF</b>	45.5	11.0	IN32-60X6.0TFBCF	BS32SNX	OR47.37X1.78X	1.21
2 1/2	60X3.0	<b>F37-340-60X3.0TFBCF</b>	50.0	12.0	IN40-60X3.0TFBCF	BS40SNX	OR53.7X1.78X	1.98
2 1/2	60X5.0	<b>F37-340-60X5.0TFBCF</b>	46.0	11.0	IN40-60X5.0TFBCF	BS40SNX	OR50.52X1.78X	1.99
2 1/2	60X6.0	<b>F37-340-60X6.0TFBCF</b>	45.5	11.0	IN40-60X6.0TFBCF	BS40SNX	OR47.37X1.78X	1.97
2 1/2	75X3.0	<b>F37-340-75X3.0TFBCF</b>	60.0	10.0	IN40-75X3.0TFBCF	BS40SNX	OR69.57X1.78X	1.93
2 1/2	75X5.0	<b>F37-340-75X5.0TFBCF</b>	60.0	10.0	IN40-75X5.0TFBCF	BS40SNX	OR63.22X1.78X	1.95
3	75X3.0	<b>F37-348-75X3.0TFBCF</b>	66.0	10.0	IN48-75X3.0TFBCF	BS48SNX	OR69.57X1.78X	3.22
3	75X5.0	<b>F37-348-75X5.0TFBCF</b>	62.0	10.0	IN48-75X5.0TFBCF	BS48SNX	OR63.22X1.78X	3.38
3	90X3.5	<b>F37-348-90X3.5TFBCF</b>	72.0	15.0	IN48-90X3.5TFBCF	BS48SNX	OR82.27X1.78X	3.39
3	90X5.0	<b>F37-348-90X5.0TFBCF</b>	72.0	14.0	IN48-90X5.0TFBCF	BS48SNX	OR79X1.78X	3.35

Other sizes on request. \*Incl. adapter sleeve or jump size flange if necessary.

Please change suffixes according to material/surface required

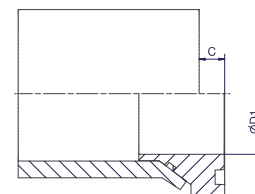
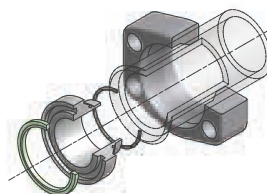
Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	F37-324-50X5.0TFBCF
Stainless steel	SS	F37-324-50X5.0TFBSS





## TFV – Flare flange connection

Tube to port connection, F37 seal



Size		Flange* incl. Insert + F37 Seal + O-Ring Order code	D1	C	Insert incl. F37 Seal + O-Ring Order code	F37 Seal Order code	O-Ring Order code	Weight (Steel) kg/1 piece
Inch	Tube							
1/2	16X2.0	F37-308-16X2.0TFVCF	9.5	8.0	IN08-16X2.0TFVCF	F37S08X	OR12X1.0X	0.24
1/2	18X2.0	F37-308-18X2.0TFVCF	11.5	8.0	IN08-18X2.0TFVCF	F37S08X	OR14X1.1X	0.24
1/2	20X2.0	F37-308-20X2.0TFVCF	13.5	8.0	IN08-20X2.0TFVCF	F37S08X	OR16X1.0X	0.24
1/2	20X2.5	F37-308-20X2.5TFVCF	13.5	8.0	IN08-20X2.5TFVCF	F37S08X	OR16X1.0X	0.24
1/2	25X2.5	F37-308-25X2.5TFVCF	13.5	10.0	IN08-25X2.5TFVCF	F37S08X	OR20X1.0X	0.25
1/2	25X3.0	F37-308-25X3.0TFVCF	13.0	8.0	IN08-25X3.0TFVCF	F37S08X	OR20X1.0X	0.24
3/4	20X2.0	F37-312-20X2.0TFVCF	13.5	8.0	IN12-20X2.0TFVCF	F37S12X	OR16X1.0X	0.31
3/4	20X2.5	F37-312-20X2.5TFVCF	12.5	8.0	IN12-20X2.5TFVCF	F37S12X	OR16X1.0X	0.31
3/4	25X2.5	F37-312-25X2.5TFVCF	17.5	10.0	IN12-25X2.5TFVCF	F37S12X	OR20X1.0X	0.31
3/4	25X3.0	F37-312-25X3.0TFVCF	16.5	8.0	IN12-25X3.0TFVCF	F37S12X	OR20X1.0X	0.32
3/4	30X3.0	F37-312-30X3.0TFVCF	19.0	8.5	IN12-30X3.0TFVCF	F37S12X	OR25X1.0X	0.32
3/4	30X4.0	F37-312-30X4.0TFVCF	19.0	8.5	IN12-30X4.0TFVCF	F37S12X	OR22X1.0X	0.32
1	25X2.5	F37-316-25X2.5TFVCF	17.5	10.0	IN16-25X2.5TFVCF	F37S16X	OR20X1.0X	0.38
1	25X3.0	F37-316-25X3.0TFVCF	16.5	8.0	IN16-25X3.0TFVCF	F37S16X	OR20X1.0X	0.39
1	30X3.0	F37-316-30X3.0TFVCF	21.5	8.5	IN16-30X3.0TFVCF	F37S16X	OR25X1.0X	0.41
1	30X4.0	F37-316-30X4.0TFVCF	19.5	8.5	IN16-30X4.0TFVCF	F37S16X	OR22X1.0X	0.39
1	38X2.5	F37-316-38X2.5TFVCF	25.0	9.5	IN16-38X2.5TFVCF	F37S16X	OR34X1.0X	0.41
1	38X3.0	F37-316-38X3.0TFVCF	25.0	9.0	IN16-38X3.0TFVCF	F37S16X	OR34X1.0X	0.40
1	38X4.0	F37-316-38X4.0TFVCF	25.0	10.0	IN16-38X4.0TFVCF	F37S16X	OR30X1.0X	0.40
1	38X5.0	F37-316-38X5.0TFVCF	25.0	8.0	IN16-38X5.0TFVCF	F37S16X	OR28X1.0X	0.39
1 1/4	30X3.0	F37-320-30X3.0TFVCF	21.5	8.5	IN20-30X3.0TFVCF	F37S20X	OR25X1.0X	0.57
1 1/4	30X4.0	F37-320-30X4.0TFVCF	19.5	8.5	IN20-30X4.0TFVCF	F37S20X	OR22X1.0X	0.58
1 1/4	38X3.0	F37-320-38X3.0TFVCF	29.5	9.0	IN20-38X3.0TFVCF	F37S20X	OR34X1.0X	0.56
1 1/4	38X4.0	F37-320-38X4.0TFVCF	27.0	10.0	IN20-38X4.0TFVCF	F37S20X	OR30X1.0X	0.57
1 1/4	38X5.0	F37-320-38X5.0TFVCF	25.5	8.0	IN20-38X5.0TFVCF	F37S20X	OR28X1.0X	0.56
1 1/4	42X3.0	F37-320-42X3.0TFVCF	31.5	10.0	IN20-42X3.0TFVCF	F37S20X	OR37.82X1.78X	0.57
1 1/4	42X4.0	F37-320-42X4.0TFVCF	31.5	10.0	IN20-42X4.0TFVCF	F37S20X	OR34X1.0X	0.56
1 1/2	38X3.0	F37-324-38X3.0TFVCF	27.5	9.0	IN24-38X3.0TFVCF	F37S24X	OR34X1.0X	0.87
1 1/2	38X4.0	F37-324-38X4.0TFVCF	27.5	10.0	IN24-38X4.0TFVCF	F37S24X	OR30.X1.0X	0.87
1 1/2	38X5.0	F37-324-38X5.0TFVCF	25.0	8.0	IN24-38X5.0TFVCF	F37S24X	OR41X1.78X	0.87
1 1/2	42X3.0	F37-324-42X3.0TFVCF	33.5	10.0	IN24-42X3.0TFVCF	F37S24X	OR37.82X1.78X	0.87
1 1/2	42X4.0	F37-324-42X4.0TFVCF	31.5	10.0	IN24-42X4.0TFVCF	F37S24X	OR34X1.0X	0.87
1 1/2	50X3.0	F37-324-50X3.0TFVCF	36.0	11.0	IN24-50X3.0TFVCF	F37S24X	OR44.17X1.78X	0.87
1 1/2	50X5.0	F37-324-50X5.0TFVCF	36.0	10.0	IN24-50X5.0TFVCF	F37S24X	OR41X1.78X	0.87
1 1/2	50X6.0	F37-324-50X6.0TFVCF	35.0	10.0	IN24-50X6.0TFVCF	F37S24X	OR41X1.78X	0.87
2	50X3.0	F37-332-50X3.0TFVCF	41.5	11.0	IN32-50X3.0TFVCF	F37S32X	OR44.17X1.78X	1.20
2	50X5.0	F37-332-50X5.0TFVCF	37.5	10.0	IN32-50X5.0TFVCF	F37S32X	OR41X1.78X	1.22
2	50X6.0	F37-332-50X6.0TFVCF	35.0	10.0	IN32-50X6.0TFVCF	F37S32X	OR41X1.78X	1.25
2	60X3.0	F37-332-60X3.0TFVCF	46.0	12.0	IN32-60X3.0TFVCF	F37S32X	OR53.7X1.78X	1.25
2	60X5.0	F37-332-60X5.0TFVCF	46.0	11.0	IN32-60X5.0TFVCF	F37S32X	OR50.52X1.78X	1.22
2	60X6.0	F37-332-60X6.0TFVCF	45.5	11.0	IN32-60X6.0TFVCF	F37S32X	OR47.37X1.78X	1.21
2 1/2	60X3.0	F37-340-60X3.0TFVCF	50.0	12.0	IN40-60X3.0TFVCF	F37S40X	OR53.7X1.78X	1.98
2 1/2	60X5.0	F37-340-60X5.0TFVCF	46.0	11.0	IN40-60X5.0TFVCF	F37S40X	OR50.52X1.78X	1.99
2 1/2	60X6.0	F37-340-60X6.0TFVCF	45.5	11.0	IN40-60X6.0TFVCF	F37S40X	OR47.37X1.78X	1.97
2 1/2	75X3.0	F37-340-75X3.0TFVCF	60.0	10.0	IN40-75X3.0TFVCF	F37S40X	OR69.57X1.78X	1.93
2 1/2	75X5.0	F37-340-75X5.0TFVCF	60.0	10.0	IN40-75X5.0TFVCF	F37S40X	OR63.22X1.78X	1.95
3	75X3.0	F37-348-75X3.0TFVCF	66.0	10.0	IN48-75X3.0TFVCF	F37S48X	OR69.57X1.78X	3.22
3	75X5.0	F37-348-75X5.0TFVCF	62.0	10.0	IN48-75X5.0TFVCF	F37S48X	OR63.22X1.78X	3.38
3	90X3.5	F37-348-90X3.5TFVCF	72.0	15.0	IN48-90X3.5TFVCF	F37S48X	OR82.27X1.78X	3.39
3	90X5.0	F37-348-90X5.0TFVCF	72.0	14.0	IN48-90X5.0TFVCF	F37S48X	OR79X1.78X	3.35

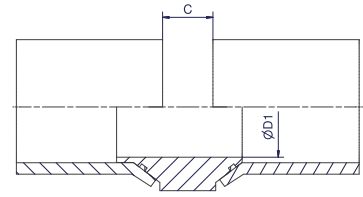
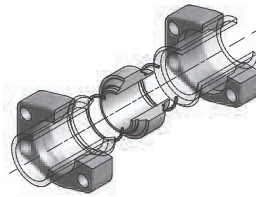
Other sizes on request. \*Incl. adapter sleeve or jump size flange if necessary.

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	F37-324-50X5.0TFVCF
Stainless steel	SS	F37-324-50X5.0TFVSS

**TT – Flare flange connection**

Tube to tube connection



Size		2 Flanges* incl. Insert + 2 x O-Ring Order code	D1	C	Insert incl. 2 x O-Ring Order code	O-Ring Order code	Weight (Steel) kg/1 piece
Inch	Tube						
1/2	16X2.0	F37-308-16X2.0TTCF	9.5	16	IN08-16X2.0TTCF	OR12X1.0X	0.28
1/2	18X2.0	F37-308-18X2.0TTCF	11.5	16	IN08-18X2.0TTCF	OR14X1.1X	0.29
1/2	20X2.0	F37-308-20X2.0TTCF	13.5	16	IN08-20X2.0TTCF	OR16X1.0X	0.29
1/2	20X2.5	F37-308-20X2.5TTCF	13.5	16	IN08-20X2.5TTCF	OR16X1.0X	0.29
1/2	25X2.5	F37-308-25X2.5TTCF	13.5	20	IN08-25X2.5TTCF	OR20X1.0X	0.30
1/2	25X3.0	F37-308-25X3.0TTCF	13.0	16	IN08-25X3.0TTCF	OR20X1.0X	0.29
3/4	20X2.0	F37-312-20X2.0TTCF	13.5	16	IN12-20X2.0TTCF	OR16X1.0X	0.38
3/4	20X2.5	F37-312-20X2.5TTCF	12.5	16	IN12-20X2.5TTCF	OR16X1.0X	0.38
3/4	25X2.5	F37-312-25X2.5TTCF	17.5	20	IN12-25X2.5TTCF	OR20X1.0X	0.39
3/4	25X3.0	F37-312-25X3.0TTCF	16.5	16	IN12-25X3.0TTCF	OR20X1.0X	0.39
3/4	30X3.0	F37-312-30X3.0TTCF	19.0	17	IN12-30X3.0TTCF	OR25X1.0X	0.40
3/4	30X4.0	F37-312-30X4.0TTCF	19.0	17	IN12-30X4.0TTCF	OR22X1.0X	0.40
1	25X2.5	F37-316-25X2.5TTCF	17.5	20	IN16-25X2.5TTCF	OR20X1.0X	0.49
1	25X3.0	F37-316-25X3.0TTCF	16.5	16	IN16-25X3.0TTCF	OR20X1.0X	0.49
1	30X3.0	F37-316-30X3.0TTCF	21.5	17	IN16-30X3.0TTCF	OR25X1.0X	0.48
1	30X4.0	F37-316-30X4.0TTCF	19.5	17	IN16-30X4.0TTCF	OR22X1.0X	0.49
1	38X2.5	F37-316-38X2.5TTCF	25.0	19	IN16-38X2.5TTCF	OR34X1.0X	0.54
1	38X3.0	F37-316-38X3.0TTCF	25.0	18	IN16-38X3.0TTCF	OR34X1.0X	0.52
1	38X4.0	F37-316-38X4.0TTCF	25.0	20	IN16-38X4.0TTCF	OR30X1.0X	0.50
1	38X5.0	F37-316-38X5.0TTCF	25.0	16	IN16-38X5.0TTCF	OR28X1.0X	0.48
1 1/4	30X3.0	F37-320-30X3.0TTCF	21.5	17	IN20-30X3.0TTCF	OR25X1.0X	0.70
1 1/4	30X4.0	F37-320-30X4.0TTCF	19.5	17	IN20-30X4.0TTCF	OR22X1.0X	0.73
1 1/4	38X3.0	F37-320-38X3.0TTCF	29.0	18	IN20-38X3.0TTCF	OR34X1.0X	0.68
1 1/4	38X4.0	F37-320-38X4.0TTCF	27.0	20	IN20-38X4.0TTCF	OR30X1.0X	0.69
1 1/4	38X5.0	F37-320-38X5.0TTCF	25.5	16	IN20-38X5.0TTCF	OR28X1.0X	0.67
1 1/4	42X3.0	F37-320-42X3.0TTCF	31.5	20	IN20-42X3.0TTCF	OR37.82X1.78X	0.68
1 1/4	42X4.0	F37-320-42X4.0TTCF	31.5	20	IN20-42X4.0TTCF	OR34X1.0X	0.67
1 1/2	38X3.0	F37-324-38X3.0TTCF	27.5	18	IN24-38X3.0TTCF	OR34X1.0X	0.93
1 1/2	38X4.0	F37-324-38X4.0TTCF	27.5	20	IN24-38X4.0TTCF	OR30.X1.0X	0.93
1 1/2	38X5.0	F37-324-38X5.0TTCF	25.0	16	IN24-38X5.0TTCF	OR41X1.78X	0.93
1 1/2	42X3.0	F37-324-42X3.0TTCF	33.5	20	IN24-42X3.0TTCF	OR37.82X1.78X	0.98
1 1/2	42X4.0	F37-324-42X4.0TTCF	31.5	20	IN24-42X4.0TTCF	OR34X1.0X	1.08
1 1/2	50X3.0	F37-324-50X3.0TTCF	36.0	22	IN24-50X3.0TTCF	OR44.17X1.78X	1.10
1 1/2	50X5.0	F37-324-50X5.0TTCF	36.0	20	IN24-50X5.0TTCF	OR41X1.78X	1.21
1 1/2	50X6.0	F37-324-50X6.0TTCF	35.0	20	IN24-50X6.0TTCF	OR41X1.78X	1.10
2	50X3.0	F37-332-50X3.0TTCF	41.5	22	IN32-50X3.0TTCF	OR44.17X1.78X	1.40
2	50X5.0	F37-332-50X5.0TTCF	37.5	20	IN32-50X5.0TTCF	OR41X1.78X	1.51
2	50X6.0	F37-332-50X6.0TTCF	35.0	20	IN32-50X6.0TTCF	OR41X1.78X	1.56
2	60X3.0	F37-332-60X3.0TTCF	46.0	24	IN32-60X3.0TTCF	OR53.7X1.78X	1.53
2	60X5.0	F37-332-60X5.0TTCF	46.0	22	IN32-60X5.0TTCF	OR50.52X1.78X	1.46
2	60X6.0	F37-332-60X6.0TTCF	45.5	22	IN32-60X6.0TTCF	OR47.37X1.78X	1.45
2 1/2	60X3.0	F37-340-60X3.0TTCF	50.0	24	IN40-60X3.0TTCF	OR53.7X1.78X	1.98
2 1/2	60X5.0	F37-340-60X5.0TTCF	46.0	22	IN40-60X5.0TTCF	OR50.52X1.78X	1.99
2 1/2	60X6.0	F37-340-60X6.0TTCF	45.0	22	IN40-60X6.0TTCF	OR47.37X1.78X	1.97
2 1/2	75X3.0	F37-340-75X3.0TTCF	60.0	20	IN40-75X3.0TTCF	OR69.57X1.78X	1.93
2 1/2	75X5.0	F37-340-75X5.0TTCF	60.0	20	IN40-75X5.0TTCF	OR63.22X1.78X	1.95
3	75X3.0	F37-348-75X3.0TTCF	66.0	20	IN48-75X3.0TTCF	OR69.57X1.78X	3.22
3	75X5.0	F37-348-75X5.0TTCF	62.0	20	IN48-75X5.0TTCF	OR63.22X1.78X	3.38
3	90X3.5	F37-348-90X3.5TTCF	72.0	30	IN48-90X3.5TTCF	OR82.27X1.78X	3.39
3	90X5.0	F37-348-90X5.0TTCF	72.0	28	IN48-90X5.0TTCF	OR79X1.78X	3.35

Other sizes on request. \*Incl. adapter sleeve or jump size flange if necessary.

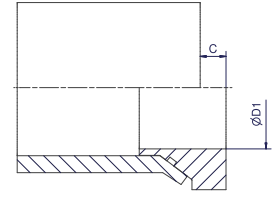
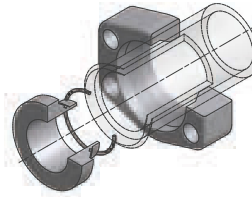
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	F37-324-50X5.0TTCF
Stainless steel	SS	F37-324-50X5.0TTSS



**TF – Flare flange connection**

Tube to flange connection, flat face



Size		Flange* incl. Insert + O-Ring Order code	D1	C	Insert incl. O-Ring Order code	O-Ring Order code	Weight (Steel) kg/1 piece
Inch	Tube						
1/2	16X2.0	<b>F37-308-16X2.0TFCF</b>	9.5	8.0	IN08-16X2.0TFCF	OR12X1.0X	0.24
1/2	18X2.0	<b>F37-308-18X2.0TFCF</b>	11.5	8.0	IN08-18X2.0TFCF	OR14X1.1X	0.24
1/2	20X2.0	<b>F37-308-20X2.0TFCF</b>	13.5	8.0	IN08-20X2.0TFCF	OR16X1.0X	0.25
1/2	20X2.5	<b>F37-308-20X2.5TFCF</b>	13.5	8.0	IN08-20X2.5TFCF	OR16X1.0X	0.25
1/2	25X2.5	<b>F37-308-25X2.5TFCF</b>	13.5	10.0	IN08-25X2.5TFCF	OR20X1.0X	0.25
1/2	25X3.0	<b>F37-308-25X3.0TFCF</b>	13.0	8.0	IN08-25X3.0TFCF	OR20X1.0X	0.24
3/4	20X2.0	<b>F37-312-20X2.0TFCF</b>	13.5	8.0	IN12-20X2.0TFCF	OR16X1.0X	0.31
3/4	20X2.5	<b>F37-312-20X2.5TFCF</b>	12.5	8.0	IN12-20X2.5TFCF	OR16X1.0X	0.31
3/4	25X2.5	<b>F37-312-25X2.5TFCF</b>	17.5	10.0	IN12-25X2.5TFCF	OR20X1.0X	0.31
3/4	25X3.0	<b>F37-312-25X3.0TFCF</b>	16.5	8.0	IN12-25X3.0TFCF	OR20X1.0X	0.32
3/4	30X3.0	<b>F37-312-30X3.0TFCF</b>	19.0	8.5	IN12-30X3.0TFCF	OR25X1.0X	0.32
3/4	30X4.0	<b>F37-312-30x4.0TFCF</b>	19.0	8.5	IN12-30x4.0TFCF	OR22X1.0X	0.32
1	25X2.5	<b>F37-316-25X2.5TFCF</b>	17.5	10.0	IN16-25X2.5TFCF	OR20X1.0X	0.38
1	25X3.0	<b>F37-316-25X3.0TFCF</b>	16.5	8.0	IN16-25X3.0TFCF	OR20X1.0X	0.39
1	30X3.0	<b>F37-316-30X3.0TFCF</b>	21.5	8.5	IN16-30X3.0TFCF	OR25X1.0X	0.41
1	30X4.0	<b>F37-316-30X4.0TFCF</b>	19.5	8.5	IN16-30X4.0TFCF	OR22X1.0X	0.39
1	38X2.5	<b>F37-316-38X2.5TFCF</b>	25.0	9.5	IN16-38X2.5TFCF	OR34X1.0X	0.41
1	38X3.0	<b>F37-316-38X3.0TFCF</b>	25.0	9.0	IN16-38X3.0TFCF	OR34X1.0X	0.40
1	38X4.0	<b>F37-316-38X4.0TFCF</b>	25.0	10.0	IN16-38X4.0TFCF	OR30X1.0X	0.40
1	38X5.0	<b>F37-316-38X5.0TFCF</b>	25.0	8.0	IN16-38X5.0TFCF	OR28X1.0X	0.39
1 1/4	30X3.0	<b>F37-320-30X3.0TFCF</b>	21.5	8.5	IN20-30X3.0TFCF	OR25X1.0X	0.57
1 1/4	30X4.0	<b>F37-320-30X4.0TFCF</b>	19.5	8.5	IN20-30X4.0TFCF	OR22X1.0X	0.59
1 1/4	38X3.0	<b>F37-320-38X3.0TFCF</b>	29.0	9.0	IN20-38X3.0TFCF	OR34X1.0X	0.56
1 1/4	38X4.0	<b>F37-320-38X4.0TFCF</b>	27.0	10.0	IN20-38X4.0TFCF	OR30X1.0X	0.57
1 1/4	38X5.0	<b>F37-320-38X5.0TFCF</b>	25.5	8.0	IN20-38X5.0TFCF	OR28X1.0X	0.56
1 1/4	42X3.0	<b>F37-320-42X3.0TFCF</b>	31.5	10.0	IN20-42X3.0TFCF	OR37.82X1.78X	0.57
1 1/4	42X4.0	<b>F37-320-42X4.0TFCF</b>	31.5	10.0	IN20-42X4.0TFCF	OR34X1.0X	0.56
1 1/2	38X3.0	<b>F37-324-38X3.0TFCF</b>	27.5	9.0	IN24-38X3.0TFCF	OR34X1.0X	0.87
1 1/2	38X4.0	<b>F37-324-38X4.0TFCF</b>	27.5	10.0	IN24-38X4.0TFCF	OR30.X1.0X	0.87
1 1/2	38X5.0	<b>F37-324-38X5.0TFCF</b>	25.0	8.0	IN24-38X5.0TFCF	OR41X1.78X	0.87
1 1/2	42X3.0	<b>F37-324-42X3.0TFCF</b>	33.5	10.0	IN24-42X3.0TFCF	OR37.82X1.78X	0.87
1 1/2	42X4.0	<b>F37-324-42X4.0TFCF</b>	31.5	10.0	IN24-42X4.0TFCF	OR34X1.0X	0.87
1 1/2	50X3.0	<b>F37-324-50X3.0TFCF</b>	36.0	11.0	IN24-50X3.0TFCF	OR44.17X1.78X	0.87
1 1/2	50X5.0	<b>F37-324-50X5.0TFCF</b>	36.0	10.0	IN24-50X5.0TFCF	OR41X1.78X	0.87
1 1/2	50X6.0	<b>F37-324-50X6.0TFCF</b>	35.0	10.0	IN24-50X6.0TFCF	OR41X1.78X	0.87
2	50X3.0	<b>F37-332-50X3.0TFCF</b>	41.5	11.0	IN32-50X3.0TFCF	OR44.17X1.78X	1.20
2	50X5.0	<b>F37-332-50X5.0TFCF</b>	37.5	10.0	IN32-50X5.0TFCF	OR41X1.78X	1.22
2	50X6.0	<b>F37-332-50X6.0TFCF</b>	35.0	10.0	IN32-50X6.0TFCF	OR41X1.78X	1.25
2	60X3.0	<b>F37-332-60X3.0TFCF</b>	46.0	12.0	IN32-60X3.0TFCF	OR53.7X1.78X	1.25
2	60X5.0	<b>F37-332-60X5.0TFCF</b>	46.0	11.0	IN32-60X5.0TFCF	OR50.52X1.78X	1.22
2	60X6.0	<b>F37-332-60X6.0TFCF</b>	45.5	11.0	IN32-60X6.0TFCF	OR47.37X1.78X	1.21
2 1/2	60X3.0	<b>F37-340-60X3.0TFCF</b>	50.0	12.0	IN40-60X3.0TFCF	OR53.7X1.78X	1.98
2 1/2	60X5.0	<b>F37-340-60X5.0TFCF</b>	46.0	11.0	IN40-60X5.0TFCF	OR50.52X1.78X	1.99
2 1/2	60X6.0	<b>F37-340-60X6.0TFCF</b>	45.5	11.0	IN40-60X6.0TFCF	OR47.37X1.78X	1.97
2 1/2	75X3.0	<b>F37-340-75X3.0TFCF</b>	60.0	10.0	IN40-75X3.0TFCF	OR69.57X1.78X	1.93
2 1/2	75X5.0	<b>F37-340-75X5.0TFCF</b>	60.0	10.0	IN40-75X5.0TFCF	OR63.22X1.78X	1.95
3	75X3.0	<b>F37-348-75X3.0TFCF</b>	66.0	10.0	IN48-75X3.0TFCF	OR69.57X1.78X	3.22
3	75X5.0	<b>F37-348-75X5.0TFCF</b>	62.0	10.0	IN48-75X5.0TFCF	OR63.22X1.78X	3.38
3	90X3.5	<b>F37-348-90X3.5TFCF</b>	72.0	15.0	IN48-90X3.5TFCF	OR82.27X1.78X	3.39
3	90X5.0	<b>F37-348-90X5.0TFCF</b>	72.0	14.0	IN48-90X5.0TFCF	OR79X1.78X	3.35

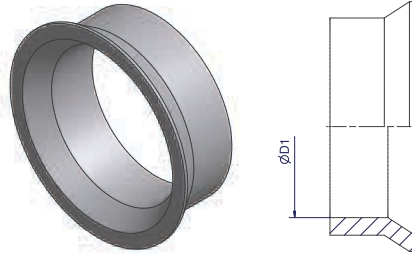
Other sizes on request. \*Incl. adapter sleeve or jump size flange if necessary.

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	F37-324-50X5.0TFCF
Stainless steel	SS	F37-324-50X5.0TFSS

**SL – Sleeve**

SAE 3000/ISO 6162-1



Size Inch	Tube OD	Order code	D1	Weight (Steel) kg/1 piece
1/2	16	<b>SL08-25-16-CFX*</b>	16.30	0.04
1/2	18	<b>SL08-25-18-CFX</b>	18.30	0.04
1/2	20	<b>SL08-25-20-CFX</b>	20.30	0.04
3/4	20	<b>SL12-30-20-CFX</b>	20.30	0.04
3/4	25	<b>SL12-30-25-CFX</b>	25.20	0.04
1	25	<b>SL16-38-25-CFX*</b>	25.20	0.04
1	30	<b>SL16-38-30-CFX*</b>	30.20	0.04
1 1/4	30	<b>SL20-42-30-CFX</b>	30.20	0.04
1 1/4	38	<b>SL20-42-38-CFX*</b>	38.25	0.04
1 1/2	38	<b>SL24-50-38-CFX</b>	38.25	0.14
1 1/2	42	<b>SL24-50-42-CFX*</b>	42.30	0.10
2	50	<b>SL32-60-50-CFX</b>	50.30	0.16
2 1/2	60	<b>SL40-75-60-CFX</b>	60.45	0.36
3	75	<b>SL48-90-75-CFX</b>	75.45	0.52

\*By use of jump size flanges, no adapter sleeves necessary. For jump size flanges see page 74.

Please change suffixes according to material/surface required

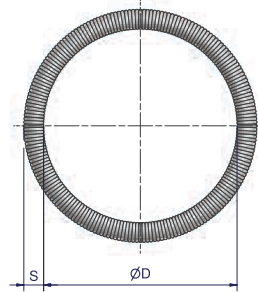
Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	SL24-50-42-CFX
Stainless steel	SS	SL24-50-42-SSX



## R – Retaining ring

SAE 3000/ISO 6162-1

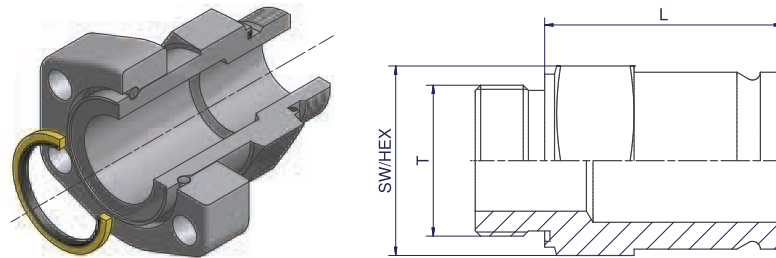
Size Inch	Tube	D	S	Order code
1/2	26X6.0	22.3	4.0	<b>R08X</b>
3/4	36X8.0	32.3	4.0	<b>R12X</b>
1	39X7.5	34.3	5.0	<b>R16X</b>
1 1/4	46X8.0	41.3	5.0	<b>R20X</b>
1 1/2	56X8.5	51.3	5.0	<b>R24X</b>
2	66X8.5	61.3	5.0	<b>R32X</b>
2 1/2	80X10.0	75.3	5.0	<b>R40X</b>
3	97X12.0	91.3	6.0	<b>R48X</b>



Material: Stainless steel

**MTF-R – Male thread adapter, BSPP**

SAE 3000/ISO 6162-1



Size Inch	Tube	Complete part Order code	Body incl. ED Seal Order code	Weight body (Steel) kg/1 piece	L	T (BSPP)	SW/ HEX
3/4	36X8.0	<b>R-312MTFRCF</b>	MTF12ROMDCF	0.32	61.0	G 3/4A	36
3/4	36X8.0	<b>R-312MTFR1/2CF</b>	MTF12R1/2OMDCF	0.32	61.0	G 1/2A	36
1	39X7.5	<b>R-316MTFRCF</b>	MTF16ROMDCF	0.50	69.0	G 1A	41
1	39X7.5	<b>R-316MTFR3/4CF</b>	MTF16R3/4OMDCF	0.50	69.0	G 3/4A	41
1 1/4	46X8.0	<b>R-320MTFRCF</b>	MTF20ROMDCF	0.75	80.0	G 1 1/4A	50
1 1/4	46X8.0	<b>R-320MTFR1CF</b>	MTF20R1OMDCF	0.75	80.0	G 1A	50
1 1/2	56X8.5	<b>R-324MTFRCF</b>	MTF24ROMDCF	1.80	93.0	G 1 1/2A	60
1 1/2	56X8.5	<b>R-324MTFR11/4CF</b>	MTF24R11/4OMDCF	1.80	93.0	G 1 1/4A	60
2	66X8.5	<b>R-332MTFRCF</b>	MTF32ROMDCF	2.50	104.0	G 2A	75
2	66X8.5	<b>R-332MTFR11/2CF</b>	MTF32R11/2OMDCF	2.50	104.0	G 1 1/2A	75
2 1/2	80X10.0	<b>R-340MTFRCF</b>	MTF40ROMDCF	3.50	134.0	G 2 1/2A	85
2 1/2	80X10.0	<b>R-340MTFR2CF</b>	MTF40R2OMDCF	3.50	134.0	G 2A	85
3	97X12.0	<b>R-348MTFRCF</b>	MTF48ROMDCF	5.00	145.0	G 3A	95

Other sizes on request

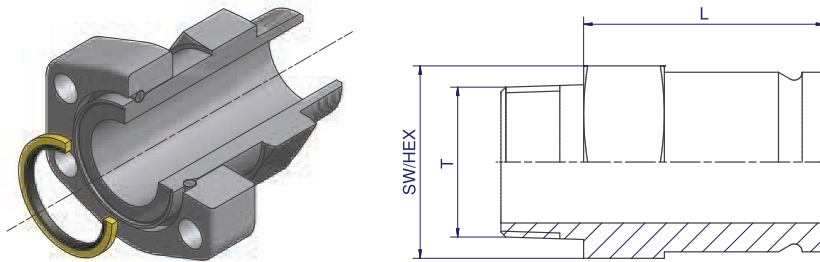
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	R-320MTFRCF
Stainless steel	SS	R-320MTFRSS



**MTF-N – Male thread adapter, NPT**

SAE 3000/ISO 6162-1



Size Inch	Tube	Complete part Order code	Body Order code	Weight body (Steel) kg/1 piece	L	T (NPT)	SW/ HEX
1/2	26X6.0	<b>R-308MTFNCF</b>	MTF08NCFX	0.26	72.6	1/2-14	27
3/4	36X8.0	<b>R-312MTFNCF</b>	MTF12NCFX	0.48	72.6	3/4-14	36
1	39X7.5	<b>R-316MTFNCF</b>	MTF16NCFX	0.45	67.7	1-11.5	41
1 1/4	46X8.0	<b>R-320MTFNCF</b>	MTF20NCFX	0.70	75.0	1 1/4-11.5	50
1 1/2	56X8.5	<b>R-324MTFNCF</b>	MTF24NCFX	1.80	93.2	1 1/2-11.5	60
2	66X8.5	<b>R-332MTFNCF</b>	MTF32NCFX	2.40	100.4	2-11.5	75
2 1/2	80X10.0	<b>R-340MTFNCF</b>	MTF40NCFX	2.50	130.0	2 1/2-8	85
3	97X12.0	<b>R-348MTFNCF</b>	MTF48NCFX	2.50	141.2	3-8	95

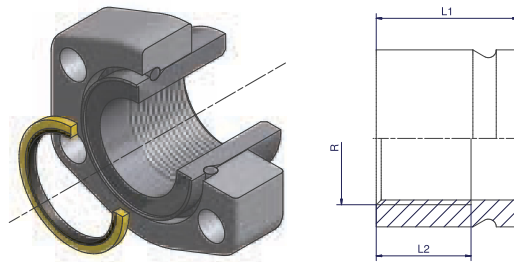
Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	R-320MTFNCF
Stainless steel	SS	R-320MTFNSS

**FTF-R – Female thread adapter, BSPP**

SAE 3000/ISO 6162-1



Size Inch	Tube	Complete part Order code	Body Order code	Weight body (Steel) kg/1 piece	L1	L2	R (BSPP)
1/2	26X6.0	<b>R-308FTFRCF</b>	FTF08RCFX	0.11	35	25	G 1/4
3/4	36X8.0	<b>R-312FTFRCF</b>	FTF12RCFX	0.22	40	25	G 1/2
1	39X7.5	<b>R-316FTFRCF</b>	FTF16RCFX	0.20	40	25	G 3/4
1 1/4	46X8.0	<b>R-320FTFRCF</b>	FTF20RCFX	0.30	42	30	G 1
1 1/2	56X8.5	<b>R-324FTFRCF</b>	FTF24RCFX	0.45	45	30	G 1 1/4
2	66X8.5	<b>R-332FTFRCF</b>	FTF32RCFX	0.75	55	40	G 1 1/2
2 1/2	80X10.0	<b>R-340FTFRCF</b>	FTF40RCFX	1.52	80	40	G 2
3	97X12.0	<b>R-348FTFRCF</b>	FTF48RCFX	2.11	85	50	G 2 1/2

Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	R-320FTFRCF
Stainless steel	SS	R-320FTFRSS



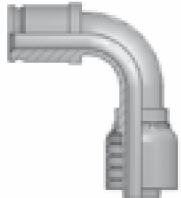







## Retaining ring hose couplings

SAE 3000/ISO 6162-1


One Piece No-Skive Hose fittings 48 Series for Parker hose types 301SN (2 wire braid) & 421SN (one wire braid)

				
Connection		Order code	Order code	Order code
Flange	Hose			
1 1/4	1 1/4	<b>1X548-20-20</b>	<b>1X748-20-20</b>	<b>1X948-20-20</b>
1 1/2	1 1/2	<b>1X548-24-24</b>	<b>1X748-24-24</b>	<b>1X948-24-24</b>
2	2	<b>1X548-32-32</b>	<b>1X748-32-32</b>	<b>1X948-32-32</b>

Interlock Hose nipples V6 series for Parker hose types H82 & R42 (6 spiral)

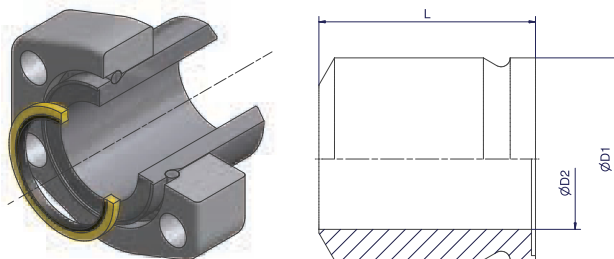
				
Connection		Order code	Order code	Order code
Flange	Hose			
1 1/4	1 1/4	<b>KX5V6-20-20</b>	<b>KX7V6-20-20</b>	<b>KX9V6-20-20</b>
1 1/2	1 1/2	<b>KX5V6-24-24</b>	<b>KX7V6-24-24</b>	<b>KX9V6-24-24</b>
2	2	<b>KX5V6-32-32</b>	<b>KX7V6-32-32</b>	<b>KX9V6-32-32</b>

Interlock Shells V6 Series for Parker hose types H82 & R42

		
Connection		Order code
Hose		
1 1/4		<b>100V6-20</b>
1 1/2		<b>100V6-24</b>
2		<b>100V6-32</b>

**WA – Weld adapter connection**

SAE 3000/ISO 6162-1



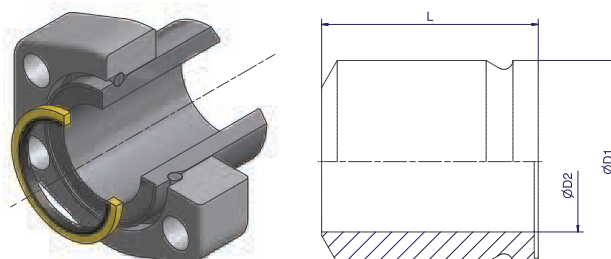
Size Inch	Tube	Complete Part Order code	Retaining Ring	Bonded Seal	Flange Order code	Weld Adapter Body Order code	Weight (Steel) kg/1 piece	D1	D2	L
1/2	12X1.5	<b>R-308WA-12X1.5S</b>	R08X	BS08SNX	R-308-CFX	WA08-12X1.5SX	<b>0.29</b>	26	9	40
1/2	16X2.0	<b>R-308WA-16X2.0S</b>	R08X	BS08SNX	R-308-CFX	WA08-16X2.0SX	<b>0.30</b>	26	12	40
1/2	18X2.0	<b>R-308WA-18X2.0S</b>	R08X	BS08SNX	R-308-CFX	WA08-18X2.0SX	<b>0.30</b>	26	14	40
1/2	20X2.0	<b>R-308WA-20X2.5S</b>	R08X	BS08SNX	R-308-CFX	WA08-20X2.5SX	<b>0.30</b>	26	15	40
1/2	21.3X2.1	<b>R-308WA-21.3X2.1S</b>	R08X	BS08SNX	R-308-CFX	WA08-21.3X2.1SX	<b>0.30</b>	26	17	40
1/2	21.3X2.8	<b>R-308WA-21.3X2.8S</b>	R08X	BS08SNX	R-308-CFX	WA08-21.3X2.8SX	<b>0.30</b>	26	16	40
1/2	21.3X3.7	<b>R-308WA-21.3X3.7S</b>	R08X	BS08SNX	R-308-CFX	WA08-21.3X3.7SX	<b>0.31</b>	26	14	45
1/2	21.3X4.8	<b>R-308WA-21.3X4.8S</b>	R08X	BS08SNX	R-308-CFX	WA08-21.3X4.8SX	<b>0.32</b>	26	12	45
1/2	21.3X7.5	<b>R-308WA-21.3X7.5S</b>	R08X	BS08SNX	R-308-CFX	WA08-21.3X7.5SX	<b>0.32</b>	26	6	45
1/2	25X2.5	<b>R-308WA-25X2.5S</b>	R08X	BS08SNX	R-308-CFX	WA08-25X2.5SX	<b>0.29</b>	26	14	40
1/2	26X6.0	<b>R-308WA-26X6.0S</b>	R08X	BS08SNX	R-308-CFX	WA08-26X6.0SX	<b>0.31</b>	26	14	40
3/4	20X2.5	<b>R-312WA-20X2.5S</b>	R12X	BS12SNX	R-312-CFX	WA12-20X2.5SX	<b>0.41</b>	36	15	45
3/4	25X3.0	<b>R-312WA-25X3.0S</b>	R12X	BS12SNX	R-312-CFX	WA12-25X3.0SX	<b>0.41</b>	36	19	45
3/4	26.7X2.1	<b>R-312WA-26.7X2.1S</b>	R12X	BS12SNX	R-312-CFX	WA12-26.7X2.1SX	<b>0.40</b>	36	20	45
3/4	26.7X2.8	<b>R-312WA-26.7X2.8S</b>	R12X	BS12SNX	R-312-CFX	WA12-26.7X2.8SX	<b>0.41</b>	36	20	45
3/4	26.7X3.9	<b>R-312WA-26.7X3.9S</b>	R12X	BS12SNX	R-312-CFX	WA12-26.7X3.9SX	<b>0.41</b>	36	19	45
3/4	26.7X5.6	<b>R-312WA-26.7X5.6S</b>	R12X	BS12SNX	R-312-CFX	WA12-26.7X5.6SX	<b>0.44</b>	36	16	50
3/4	26.7X7.8	<b>R-312WA-26.7X7.8S</b>	R12X	BS12SNX	R-312-CFX	WA12-26.7X7.8SX	<b>0.45</b>	36	11	50
3/4	30X3.0	<b>R-312WA-30X3.0S</b>	R12X	BS12SNX	R-312-CFX	WA12-30X3.0SX	<b>0.41</b>	36	20	50
3/4	30X4.0	<b>R-312WA-30X4.0S</b>	R12X	BS12SNX	R-312-CFX	WA12-30X4.0SX	<b>0.42</b>	36	20	50
3/4	30X6.0	<b>R-312WA-30X6.0S</b>	R12X	BS12SNX	R-312-CFX	WA12-30X6.0SX	<b>0.44</b>	36	18	50
3/4	30X8.0	<b>R-312WA-30X8.0S</b>	R12X	BS12SNX	R-312-CFX	WA12-30X8.0SX	<b>0.46</b>	36	14	50
1	25X3.0	<b>R-316WA-25X3.0S</b>	R16X	BS16SNX	R-316-CFX	WA16-25X3.0SX	<b>0.61</b>	39	19	60
1	30X4.0	<b>R-316WA-30X4.0S</b>	R16X	BS16SNX	R-316-CFX	WA16-30X4.0SX	<b>0.60</b>	39	20	60
1	33.4X2.8	<b>R-316WA-33.4X2.8S</b>	R16X	BS16SNX	R-316-CFX	WA16-33.4X2.8SX	<b>0.56</b>	39	24	60
1	33.4X3.4	<b>R-316WA-33.4X3.4S</b>	R16X	BS16SNX	R-316-CFX	WA16-33.4X3.4SX	<b>0.57</b>	39	24	60
1	33.4X4.6	<b>R-316WA-33.4X4.6S</b>	R16X	BS16SNX	R-316-CFX	WA16-33.4X4.6SX	<b>0.59</b>	39	24	60
1	33.4X6.5	<b>R-316WA-33.4X6.5S</b>	R16X	BS16SNX	R-316-CFX	WA16-33.4X6.5SX	<b>0.65</b>	39	20	60
1	33.4X9.1	<b>R-316WA-33.4X9.1S</b>	R16X	BS16SNX	R-316-CFX	WA16-33.4X9.1SX	<b>0.64</b>	39	15	60
1	38X4.0	<b>R-316WA-38X4.0S</b>	R16X	BS16SNX	R-316-CFX	WA16-38X4.0SX	<b>0.54</b>	39	24	55
1	38X5.0	<b>R-316WA-38X5.0S</b>	R16X	BS16SNX	R-316-CFX	WA16-38X5.0SX	<b>0.56</b>	39	24	55
1	38X7.0	<b>R-316WA-38X7.0S</b>	R16X	BS16SNX	R-316-CFX	WA16-38X7.0SX	<b>0.62</b>	39	24	60
1	39X7.5	<b>R-316WA-39X7.5S</b>	R16X	BS16SNX	R-316-CFX	WA16-39X7.5SX	<b>0.57</b>	39	24	50
1 1/4	30X4.0	<b>R-320WA-30X4.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-30X4.0SX	<b>1.04</b>	46	22	70
1 1/4	38X4.0	<b>R-320WA-38X4.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-38X4.0SX	<b>0.89</b>	46	30	65
1 1/4	38X5.0	<b>R-320WA-38X5.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-38X5.0SX	<b>0.94</b>	46	28	65
1 1/4	42X3.0	<b>R-320WA-42X3.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-42X3.0SX	<b>0.84</b>	46	30	65
1 1/4	42X4.0	<b>R-320WA-42X4.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-42X4.0SX	<b>0.87</b>	46	30	65
1 1/4	42X6.0	<b>R-320WA-42X6.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-42X6.0SX	<b>0.93</b>	46	30	65
1 1/4	42.2X2.7	<b>R-320WA-42.2X2.7S</b>	R20X	BS20SNX	R-320-CFX	WA20-42.2X2.7SX	<b>0.83</b>	46	30	65
1 1/4	42.2X3.6	<b>R-320WA-42.2X3.6S</b>	R20X	BS20SNX	R-320-CFX	WA20-42.2X3.6SX	<b>0.86</b>	46	30	65
1 1/4	42.2X4.9	<b>R-320WA-42.2X4.9S</b>	R20X	BS20SNX	R-320-CFX	WA20-42.2X4.9SX	<b>0.90</b>	46	30	65
1 1/4	42.2X6.4	<b>R-320WA-42.2X6.4S</b>	R20X	BS20SNX	R-320-CFX	WA20-42.2X6.4SX	<b>0.94</b>	46	29	65
1 1/4	42.2X9.7	<b>R-320WA-42.2X9.7S</b>	R20X	BS20SNX	R-320-CFX	WA20-42.2X9.7SX	<b>1.06</b>	46	23	65
1 1/4	46X7.0	<b>R-320WA-46X7.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-46X7.0SX	<b>0.95</b>	46	30	65
1 1/4	46X8.0	<b>R-320WA-46X8.0S</b>	R20X	BS20SNX	R-320-CFX	WA20-46X8.0SX	<b>0.88</b>	46	30	55
1 1/2	38X5.0	<b>R-324WA-38X5.0S</b>	R24X	BS24SNX	R-324-CFX	WA24-38X5.0SX	<b>1.45</b>	56	28	75
1 1/2	48.3X2.8	<b>R-324WA-48.3X2.8S</b>	R24X	BS24SNX	R-324-CFX	WA24-48.3X2.8SX	<b>1.11</b>	56	39	70
1 1/2	48.3X3.7	<b>R-324WA-48.3X3.7S</b>	R24X	BS24SNX	R-324-CFX	WA24-48.3X3.7SX	<b>1.15</b>	56	39	70
1 1/2	48.3X5.1	<b>R-324WA-48.3X5.1S</b>	R24X	BS24SNX	R-324-CFX	WA24-48.3X5.1SX	<b>1.21</b>	56	38	70

see next page



**WA – Weld adapter connection** continued

SAE 3000/ISO 6162-1



Size Inch	Tube	Complete Part Order code	Retaining Ring	Bonded Seal	Flange Order code	Weld Adapter Body Order code	Weight (Steel) kg/1 piece	D1	D2	L
1 1/2	48.3X7.1	<b>R-324WA-48.3X7.1S</b>	R24X	BS24SNX	R-324-CFX	WA24-48.3X7.1SX	1.33	56	34	70
1 1/2	48.3X10.2	<b>R-324WA-48.3X10.2S</b>	R24X	BS24SNX	R-324-CFX	WA24-48.3X10.2SX	1.29	56	28	70
1 1/2	50X3.0	<b>R-324WA-50X3.0S</b>	R24X	BS24SNX	R-324-CFX	WA24-50X3.0SX	1.10	56	39	70
1 1/2	50X5.0	<b>R-324WA-50X5.0S</b>	R24X	BS24SNX	R-324-CFX	WA24-50X5.0SX	1.17	56	40	70
1 1/2	50X6.0	<b>R-324WA-50X6.0S</b>	R24X	BS24SNX	R-324-CFX	WA24-50X6.0SX	1.23	56	38	70
1 1/2	50x9.0	<b>R-324WA-50X9.0S</b>	R24X	BS24SNX	R-324-CFX	WA24-50X9.0SX	1.39	56	32	70
1 1/2	56X8.5	<b>R-324WA-56X8.5S</b>	R24X	BS24SNX	R-324-CFX	WA24-56X8.5SX	1.15	56	39	60
2	48.3X5.6	<b>R-332WA-48.3X5.6S</b>	R32X	BS32SNX	R-332-CFX	WA32-48.3X5.6SX	2.30	66	37	90
2	50X9.0	<b>R-332WA-50X9.0S</b>	R32X	BS32SNX	R-332-CFX	WA32-50X9.0SX	2.51	66	32	90
2	60X3.0	<b>R-332WA-60X3.0S</b>	R32X	BS32SNX	R-332-CFX	WA32-60X3.0SX	1.79	66	49	90
2	60X5.0	<b>R-332WA-60X5.0S</b>	R32X	BS32SNX	R-332-CFX	WA32-60X5.0SX	1.89	66	50	90
2	60X6.0	<b>R-332WA-60X6.0S</b>	R32X	BS32SNX	R-332-CFX	WA32-60X6.0SX	2.00	66	48	90
2	60X8.0	<b>R-332WA-60X8.0S</b>	R32X	BS32SNX	R-332-CFX	WA32-60X8.0SX	2.18	66	44	90
2	60x10.0	<b>R-332WA-60X10.0S</b>	R32X	BS32SNX	R-332-CFX	WA32-60X10.0SX	2.36	66	40	90
2	60.3X2.8	<b>R-332WA-60.3X2.8S</b>	R32X	BS32SNX	R-332-CFX	WA32-60.3X2.8SX	1.77	66	49	90
2	60.3X3.9	<b>R-332WA-60.3X3.9S</b>	R32X	BS32SNX	R-332-CFX	WA32-60.3X3.9SX	1.85	66	49	90
2	60.3X5.5	<b>R-332WA-60.3X5.5S</b>	R32X	BS32SNX	R-332-CFX	WA32-60.3X5.5SX	1.94	66	49	90
2	60.3X8.7	<b>R-332WA-60.3X8.7S</b>	R32X	BS32SNX	R-332-CFX	WA32-60.3X8.7SX	2.24	66	43	90
2	60.3X11.1	<b>R-332WA-60.3X11.1S</b>	R32X	BS32SNX	R-332-CFX	WA32-60.3X11.1SX	2.44	66	38	90
2	66X8.5	<b>R-332WA-66X8.5S</b>	R32X	BS32SNX	R-332-CFX	WA32-66X8.5SX	1.85	66	49	75
2 1/2	65X8.5	<b>R-340WA-65X8.5S</b>	R40X	BS40SNX	R-340-CFX	WA40-65X8.5SX	3.80	80	49	105
2 1/2	73X7.0	<b>R-340WA-73X7.0S</b>	R40X	BS40SNX	R-340-CFX	WA40-73X7.0SX	3.29	80	59	105
2 1/2	75X3.0	<b>R-340WA-75X3.0S</b>	R40X	BS40SNX	R-340-CFX	WA40-75X3.0SX	2.90	80	60	105
2 1/2	75X5.0	<b>R-340WA-75X5.0S</b>	R40X	BS40SNX	R-340-CFX	WA40-75X5.0SX	3.07	80	60	105
2 1/2	76.1X6.3	<b>R-340WA-76.1X6.3S</b>	R40X	BS40SNX	R-340-CFX	WA40-76.1X6.3SX	3.15	80	60	105
2 1/2	76.1X12.5	<b>R-340WA-76.1X12.5S</b>	R40X	BS40SNX	R-340-CFX	WA40-76.1X12.5SX	3.87	80	51	105
2 1/2	80X10.0	<b>R-340WA-80X10.0S</b>	R40X	BS40SNX	R-340-CFX	WA40-80X10.0SX	3.10	80	60	90
3	76.1X12.5	<b>R-348WA-76.1X12.5S</b>	R48X	BS48SNX	R-348-CFX	WA48-76.1X12.5SX	5.68	97	51	120
3	80X10.0	<b>R-348WA-80X10.0S</b>	R48X	BS48SNX	R-348-CFX	WA48-80X10.0SX	5.57	97	60	120
3	88.9X3.1	<b>R-348WA-88.9X3.1S</b>	R48X	BS48SNX	R-348-CFX	WA48-88.9X3.1SX	4.68	97	73	120
3	88.9X5.5	<b>R-348WA-88.9X5.5S</b>	R48X	BS48SNX	R-348-CFX	WA48-88.9X5.5SX	4.97	97	73	120
3	88.9X7.7	<b>R-348WA-88.9X7.7S</b>	R48X	BS48SNX	R-348-CFX	WA48-88.9X7.7SX	5.17	97	74	120
3	88.9X8.8	<b>R-348WA-88.9X8.8S</b>	R48X	BS48SNX	R-348-CFX	WA48-88.9X8.8SX	5.40	97	71	120
3	88.9X11.1	<b>R-348WA-88.9X11.1S</b>	R48X	BS48SNX	R-348-CFX	WA48-88.9X11.1SX	5.84	97	67	120
3	88.9X12.5	<b>R-348WA-88.9X12.5S</b>	R48X	BS48SNX	R-348-CFX	WA48-88.9X12.5SX	6.10	97	64	120
3	88.9X15.2	<b>R-348WA-88.9X15.2S</b>	R48X	BS48SNX	R-348-CFX	WA48-88.9X15.2SX	6.50	97	59	120
3	90X3.5	<b>R-348WA-90X3.5S</b>	R48X	BS48SNX	R-348-CFX	WA48-90X3.5SX	4.69	97	73	120
3	90X5.0	<b>R-348WA-90X5.0S</b>	R48X	BS48SNX	R-348-CFX	WA48-90X5.0SX	5.00	97	80	120
3	90X9.0	<b>R-348WA-90X9.0S</b>	R48X	BS48SNX	R-348-CFX	WA48-90X9.0SX	5.35	97	72	120
3	97X12.0	<b>R-348WA-97X12.0S</b>	R48X	BS48SNX	R-348-CFX	WA48-97X12.0SX	5.15	97	73	110

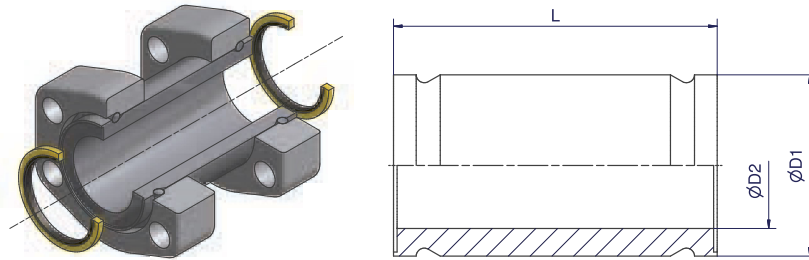
Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel	S	R-320WA-42X3.0S
Stainless steel	SS	R-320WA-42X3.SS

**BF – Bulkhead flange**

SAE 3000/ISO 6162-1



Size Inch	D1	D2	L	Complete Part Order code	Bulkhead Body Order code	Weight body (Steel) kg/1 piece
1	39	24	170	<b>R-316BFS</b>	BF16SX	0.96
1 1/4	46	30	180	<b>R-320BFS</b>	BF20SX	1.30
1 1/2	56	39	180	<b>R-324BFS</b>	BF24SX	1.75
2	66	49	210	<b>R-332BFS</b>	BF32SX	2.45
2 1/2	80	60	220	<b>R-340BFS</b>	BF40SX	3.70
3	97	73	240	<b>R-348BFS</b>	BF48SX	7.85

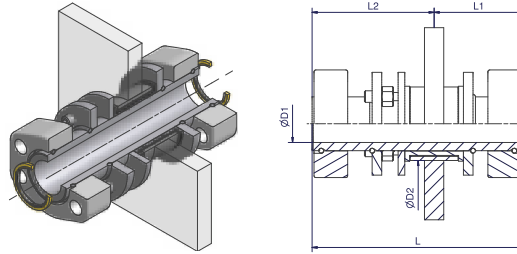
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel	S	R-320BFS
Stainless steel	SS	R-320BFSS



**VB – Vibra bulkhead**

SAE 3000/ISO 6162-1



Size Inch	Complete Part Order code	Tube	D1	D2	L	L1	L2	Weight (Steel) kg/1 piece
3/4	<b>R-312VBCF</b>	36X8.0	20	55.5	220	95	125	2.90
1	<b>R-316VBCF</b>	39X7.5	24	59.5	220	95	125	3.15
1 1/4	<b>R-320VBCF</b>	46X8.0	30	66.5	220	95	125	4.10
1 1/2	<b>R-324VBCF</b>	56X8.5	39	76.5	220	95	125	4.90
2	<b>R-332VBCF</b>	66X8.5	49	86.5	250	110	140	6.19
2 1/2	<b>R-340VBCF</b>	80X10.0	60	100.5	260	115	145	9.22
3	<b>R-348VBCF</b>	97X12.0	73	117.5	280	125	155	15.32

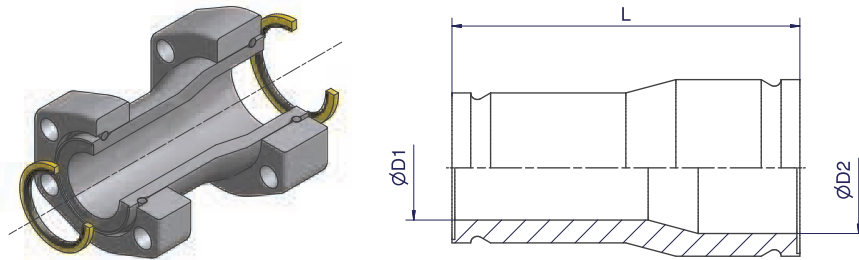
Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	R-320VBCF
Stainless steel	SS	R-320VBSS

**RF – Reducer flange**

SAE 3000/ISO 6162-1



Size Inch	Complete Part Order code	Reducer Body Order code	D1	D2	L	Weight body (Steel) kg/1 piece
1 1/4 - 1	<b>R-320-316RFCF</b>	<b>RF20-16CFX</b>	24	30	110	0.7
1 1/2 - 1	<b>R-324-316RFCF</b>	<b>RF24-16CFX</b>	24	39	115	0.9
1 1/2 - 1 1/4	<b>R-324-320RFCF</b>	<b>RF24-20CFX</b>	30	39	130	1.1
2 - 1 1/4	<b>R-332-320RFCF</b>	<b>RF32-20CFX</b>	30	49	130	1.3
2 - 1 1/2	<b>R-332-324RFCF</b>	<b>RF32-24CFX</b>	39	49	130	1.4
2 1/2 - 1 1/2	<b>R-340-324RFCF</b>	<b>RF40-24CFX</b>	39	60	150	2.1
2 1/2 - 2	<b>R-340-332RFCF</b>	<b>RF40-32CFX</b>	49	60	150	2.2
3 - 2	<b>R-348-332RFCF</b>	<b>RF48-32CFX</b>	49	73	180	3.4
3 - 2 1/2	<b>R-348-340RFCF</b>	<b>RF48-40CFX</b>	60	73	180	3.7

Other sizes on request

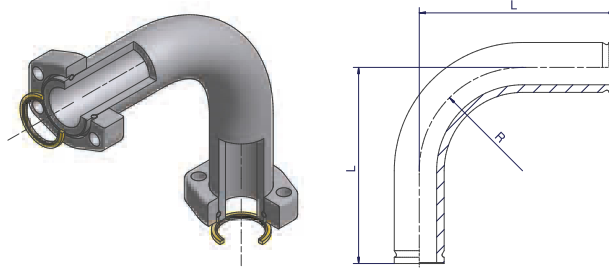
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	R-320-316RFCF
Stainless steel	SS	R-320-316RFSS



## FB90 – 90° Flange bend

SAE 3000/ISO 6162-1



Size Inch	Complete Part Order code	90° Flange Bend Order code	Tube	L	R	Weight body (Steel) kg/1 piece
1	<b>R-316FB90S</b>	<b>FB90-16SX</b>	39X7.5	160	98	1.59
1 1/4	<b>R-320FB90S</b>	<b>FB90-20SX</b>	46X8.0	180	96	2.35
1 1/2	<b>R-324FB90S</b>	<b>FB90-24SX</b>	56X8.5	220	116	3.84
2	<b>R-332FB90S</b>	<b>FB90-32SX</b>	66X8.5	275	165	5.72
2 1/2	<b>R-340FB90S</b>	<b>FB90-40SX</b>	80X10.0	370	200	11.20
3	<b>R-348FB90S</b>	<b>FB90-48SX</b>	97X12.0	450	243	19.90

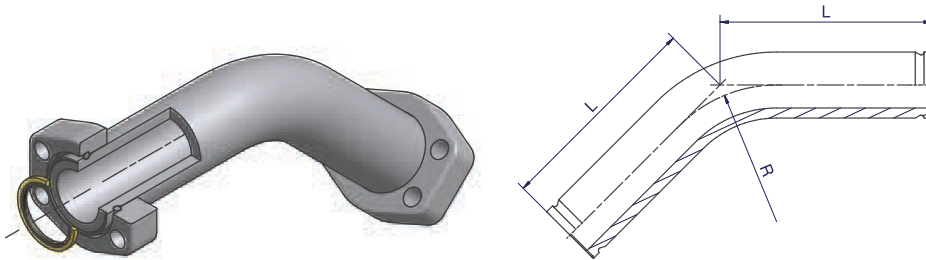
Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes			
Material	Suffix surface and material	Example	Comments
Steel, zinc plated, Cr(VI)-free	SX	R-320FB90SX	
Stainless steel	SS	R-320FB90SS	on request

**FB45 – 45° Flange bend**

SAE 3000/ISO 6162-1



Size Inch	Complete Part Order code	45° Flange Bend Order code	Tube	L	R	Weight body (Steel) kg/1 piece
1	<b>R-316FB45S</b>	<b>FB45-16SX</b>	39X7.5	140	80	1.58
1 1/4	<b>R-320FB45S</b>	<b>FB45-20SX</b>	46X8.0	150	96	2.18
1 1/2	<b>R-324FB45S</b>	<b>FB45-24SX</b>	56X8.5	180	116	3.49
2	<b>R-332FB45S</b>	<b>FB45-32SX</b>	66X8.5	220	165	5.16
2 1/2	<b>R-340FB45S</b>	<b>FB45-40SX</b>	80X10.0	240	200	8.07
3	<b>R-348FB45S</b>	<b>FB45-48SX</b>	97X12.0	260	243	12.70

Available on request

Please change suffixes according to material/surface required

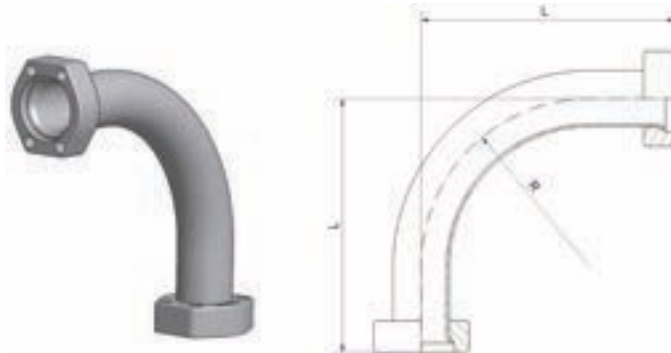
Order code suffixes			
Material	Suffix surface and material	Example	Comments
Steel, zinc plated, Cr(VI)-free	SX	FB45-320Sx	
Stainless steel	SS	FB45-320SSX	on request





## FB90 – 90° Flange bend

SAE 3000/ISO 6162-1



Size Inch	Tube	Complete Part Order code	L	R	W.P. in bar according to EDIN 2413 (bended pipes)	
					Tube E355N or E235N - Cr(VI) plated or phosphated and oiled	Seamless Colddrawn Stainless Steel Tube ASTM A269/A213 - AISI 316L
1 1/2	50X5	<b>F37-324FB90</b>	220	150.0	263	218
2	60X5	<b>F37-332FB90</b>	275	180.0	222	184
2 1/2	75X5	<b>F37-340FB90</b>	370	187.5	180	149
3	90X3.5	<b>F37-348FB90</b>	450	225.0	91	89
3	90x5	<b>F37-348905FB90</b>	450	225.0	151	126

Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	F37-324FB90CF
Stainless steel	SS	F37-324FB90SS

**FB45 – 45° Flange bend**

SAE 3000/ISO 6162-1



Size Inch	Tube	Complete Part Order code	L	R	W.P. in bar according to EDIN 2413 (bended pipes)	
					Tube E355N or E235N - Cr(VI) plated or phosphated and oiled	Seamless Colddrawn Stainless Steel Tube ASTM A269/A213 - AISI 316L
1 1/2	50X5	<b>F37-324FB45</b>	220	150.0	263	218
2	60X5	<b>F37-332FB45</b>	275	180.0	222	184
2 1/2	75X5	<b>F37-340FB45</b>	370	187.5	180	149
3	90X5	<b>F37-348905FB45</b>	370	187.5	151	126

Other sizes on request

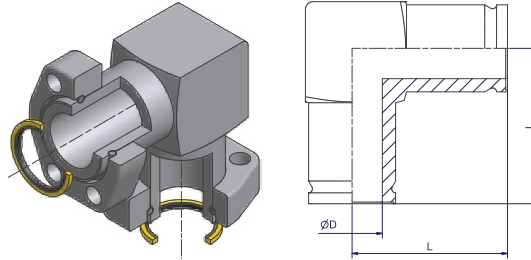
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	F37-324FB45CF
Stainless steel	SS	F37-324FB45SS



## LF – Elbow flange

SAE 3000/ISO 6162-1



Size Inch	Complete Part Order code	Elbow Flange body Order code	D	L	Weight body (Steel) kg/1 piece
1/2	<b>R-308LFCF</b>	<b>LF08CFX</b>	14	70	0.50
3/4	<b>R-312LFCF</b>	<b>LF12CFX</b>	20	80	1.07
1	<b>R-316LFCF</b>	<b>LF16CFX</b>	24	85	1.32
1 1/4	<b>R-320LFCF</b>	<b>LF20CFX</b>	30	90	1.72
1 1/2	<b>R-324LFCF</b>	<b>LF24CFX</b>	39	100	2.60
2	<b>R-332LFCF</b>	<b>LF32CFX</b>	49	110	4.00
2 1/2	<b>R-340LFCF</b>	<b>LF40CFX</b>	60	140	6.40
3	<b>R-348LFCF</b>	<b>LF48CFX</b>	73	160	10.80

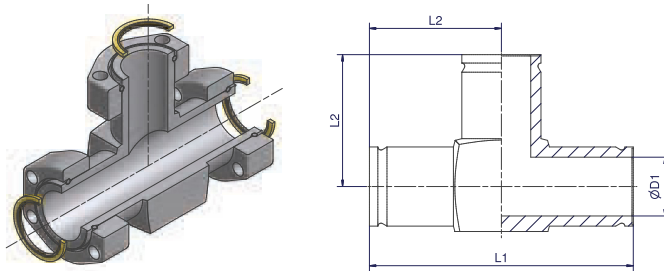
Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	R-320LFCF
Stainless steel	SS	R-320LFSS

**TF – TEE flange**

SAE 3000/ISO 6162-1



Size Inch	Complete Part Order code	Tee Flange body Order code	D1	L1	L2	Weight body (Steel) kg/1 piece
1/2	<b>R-308TFCF</b>	<b>TF08CFX</b>	14	120	60	0.75
3/4	<b>R-312TFCF</b>	<b>TF12CFX</b>	20	130	65	1.60
1	<b>R-316TFCF</b>	<b>TF16CFX</b>	24	140	70	2.00
1 1/4	<b>R-320TFCF</b>	<b>TF20CFX</b>	30	180	90	2.03
1 1/2	<b>R-324TFCF</b>	<b>TF24CFX</b>	39	200	100	3.13
2	<b>R-332TFCF</b>	<b>TF32CFX</b>	49	220	110	4.53
2 1/2	<b>R-340TFCF</b>	<b>TF40CFX</b>	60	260	130	7.05
3	<b>R-348TFCF</b>	<b>TF48CFX</b>	73	320	160	12.81

Other sizes on request

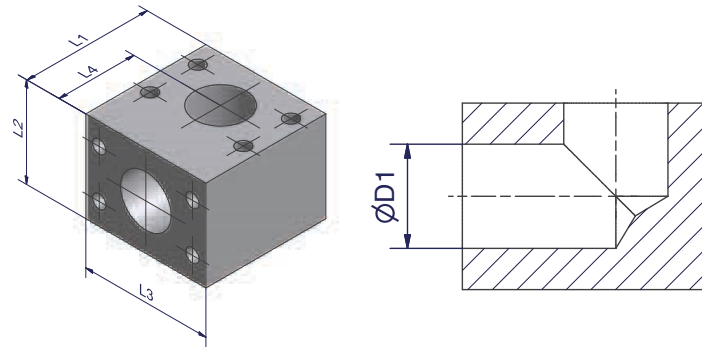
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	R-320TFCF
Stainless steel	SS	R-320TFSS



## LB – Flange L-block

SAE 3000/ISO 6162-1



Size Inch	Order code	D1	L1	L2	L3	L4	Weight (Steel) kg/1 piece
1	<b>LB316CFX</b>	25	70	48	70	46	1.5
1 1/4	<b>LB320CFX</b>	30	80	58	80	51	2.4
1 1/2	<b>LB324CFX</b>	38	90	68	90	56	3.4
2	<b>LB332CFX</b>	50	96	78	100	57	4.4
2 1/2	<b>LB340CFX</b>	60	110	88	110	65	6.0
3	<b>LB348CFX</b>	73	135	110	135	80	11.3

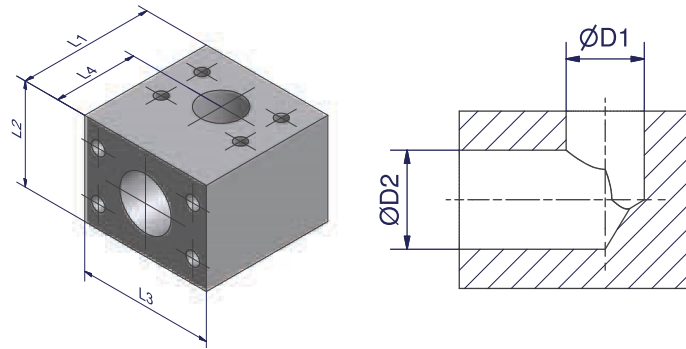
Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	LB320CFX
Stainless steel	SS	LB320SSX

**LBR – Flange L-block reducer**

SAE 3000/ISO 6162-1



Size Inch	Order code	D1	D2	L1	L2	L3	L4	Weight (Steel) kg/1 piece
1 1/4 - 1	<b>LBR320-316CFX</b>	25	30	80	58	80	51	2.4
1 1/2 - 1	<b>LBR324-316CFX</b>	25	38	90	68	90	56	3.6
1 1/2 - 1 1/4	<b>LBR324-320CFX</b>	30	38	90	68	90	56	3.6
2 - 1	<b>LBR332-316CFX</b>	25	50	96	78	100	57	4.7
2 - 1 1/4	<b>LBR332-320CFX</b>	30	50	96	78	100	57	4.7
2 - 1 1/2	<b>LBR332-324CFX</b>	38	50	96	78	100	57	4.6

Other sizes on request

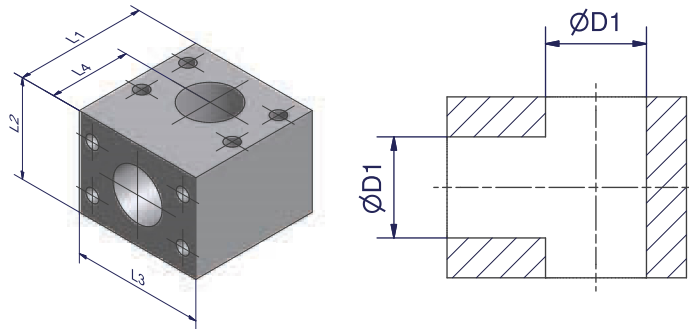
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	LBR320-316CFX
Stainless steel	SS	LBR320-316SSX



## TB – Flange T-block

SAE 3000/ISO 6162-1



Size Inch	Order code	D1	L1	L2	L3	L4	Weight (Steel) kg/1 piece
1/2	<b>TB308CFX</b>	13	60	50	60	37	1.2
3/4	<b>TB312CFX</b>	19	68	55	66	44	1.6
1	<b>TB316CFX</b>	25	70	55	70	46	1.6
1 1/4	<b>TB320CFX</b>	30	80	58	80	51	2.2
1 1/2	<b>TB324CFX</b>	38	90	68	90	56	3.1
2	<b>TB332CFX</b>	50	96	78	100	57	3.9
2 1/2	<b>TB340CFX</b>	60	110	88	110	65	5.3
3	<b>TB348CFX</b>	73	135	110	135	80	10.0

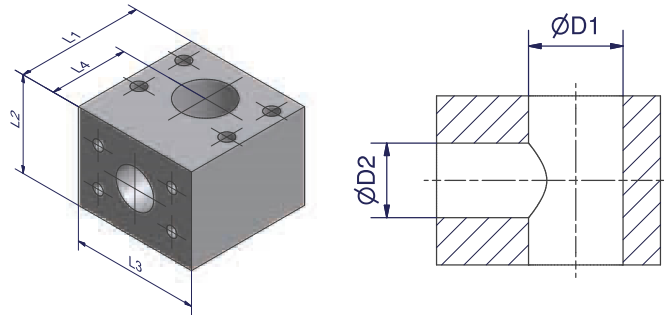
Other sizes on request

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	TB320CFX
Stainless steel	SS	TB320SSX

**TBR – Flange T-block reducer**

SAE 3000/ISO 6162-1



Size Inch	Order code	D1	D2	L1	L2	L3	L4	Weight (Steel) kg/1 piece
1 1/4 - 1 - 1 1/4	<b>TBR320-316-320CFX</b>	30	25	80	58	80	51	2.3
1 1/2 - 1 1/4 - 1 1/2	<b>TBR324-320-324CFX</b>	38	30	90	68	90	56	3.3
1 1/2 - 1 - 1 1/2	<b>TBR324-316-324CFX</b>	38	25	90	68	90	56	3.4
2 - 1 1/2 - 2	<b>TBR332-324-332CFX</b>	50	38	96	78	100	57	4.2
2 - 1 1/4 - 2	<b>TBR332-320-332CFX</b>	50	30	96	78	100	57	4.3
2 1/2 - 2 - 2 1/2	<b>TBR340-332-340CFX</b>	60	50	110	88	110	65	5.6
2 1/2 - 1 1/2 - 2 1/2	<b>TBR340-324-340CFX</b>	60	38	110	88	110	65	5.9
3 - 2 1/2 - 3	<b>TBR348-340-348CFX</b>	73	60	135	110	135	80	10.6
3 - 2 - 3	<b>TBR348-332-348CFX</b>	73	50	135	110	135	80	11.0

Other sizes on request

Please change suffixes according to material/surface required

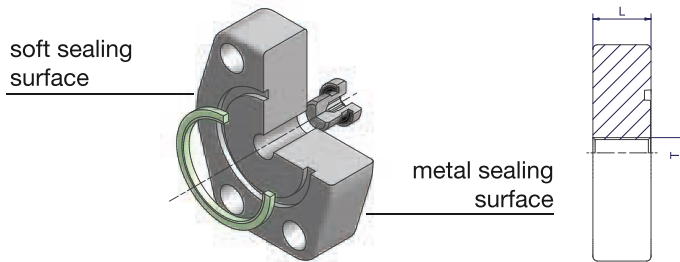
Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	TBR320-316-320CFX
Stainless steel	SS	TBR320-316-320SSX





## BFV – Blind flange

SAE 3000/ISO 6162-1



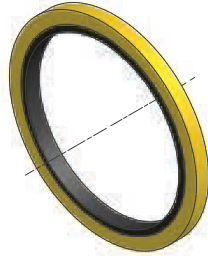
Size Inch	L	T	Weight (Steel) kg/1 piece	Flange incl. VSTI-ED and F37 Seal Order code
1	24	G 1/4	0.60	<b>F37-316BFVCF</b>
1 1/4	22	G 1/4	0.70	<b>F37-320BFVCF</b>
1 1/2	25	G 1/4	1.10	<b>F37-324BFVCF</b>
2	33	G 1/4	2.00	<b>F37-332BFVCF</b>
2 1/2	44	G 1/4	3.45	<b>F37-340BFVCF</b>
3	50	G 1/4	5.45	<b>F37-348BFVCF</b>

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	F37-320BFVCF
Stainless steel	SS	F37-320BFVSS

**BS – Bonded seal**

SAE 3000/ISO 6162-1

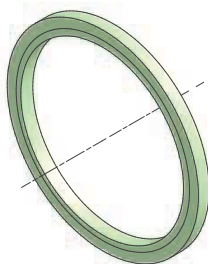


Size Inch	Steel	Stainless Steel
1/2	<b>BS08SNX</b>	<b>BS08SSNX</b>
3/4	<b>BS12SNX</b>	<b>BS12SSNX</b>
1	<b>BS16SNX</b>	<b>BS16SSNX</b>
1 1/4	<b>BS20SNX</b>	<b>BS20SSNX</b>
1 1/2	<b>BS24SNX</b>	<b>BS24SSNX</b>
2	<b>BS32SNX</b>	<b>BS32SSNX</b>
2 1/2	<b>BS40SNX</b>	<b>BS40SSNX</b>
3	<b>BS48SNX</b>	<b>BS48SSNX</b>

Sealing: NBR  
Other sealing materials like FKM on request

**F37S – F37 seal**

SAE 3000/ISO 6162-1



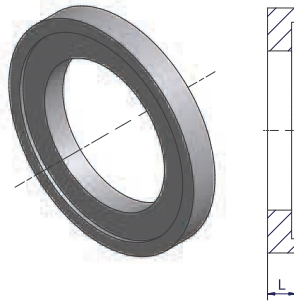
Size Inch	F37 Seal
1/2	<b>F37S08X</b>
3/4	<b>F37S12X</b>
1	<b>F37S16X</b>
1 1/4	<b>F37S20X</b>
1 1/2	<b>F37S24X</b>
2	<b>F37S32X</b>
2 1/2	<b>F37S40X</b>
3	<b>F37S48X</b>

Sealing: Polyurethane  
Material properties and applications see page 18



**AO – Adapter bonded seal to F37 seal/O-Ring**

SAE 3000/ISO 6162-1



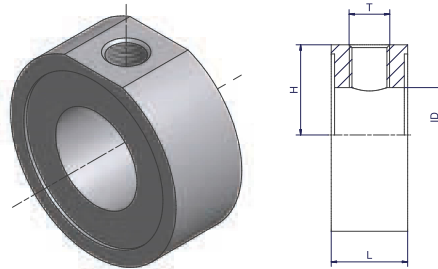
Size Inch	L	Weight (Steel) kg/1 piece	Adapter Order code
1/2	5	0.01	<b>AO08CFX</b>
3/4	5	0.02	<b>AO12CFX</b>
1	7	0.06	<b>AO16CFX</b>
1 1/4	7	0.06	<b>AO20CFX</b>
1 1/2	7	0.08	<b>AO24CFX</b>
2	7	0.10	<b>AO32CFX</b>
2 1/2	7	0.14	<b>AO40CFX</b>
3	7	0.20	<b>AO48CFX</b>

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	AO32CFX
Stainless steel	SS	AO32SSX

**TBT – TEE between bonded seal**

SAE 3000/ISO 6162-1



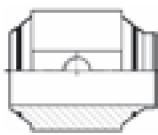
Size Inch	Order code*	L	H	T	ID	Bolt ISO 4762	Weight body (Steel) kg/1 piece
1	<b>TBT16-1/4CFX</b>	25	20.5	G 1/4 A	25	ZYLS10X90	0.21
1 1/4	<b>TBT20-1/4CFX</b>	25	24.5	G 1/4 A	27	ZYLS10X100	0.30
1 1/4	<b>TBT20-1/2CFX</b>	40	22.5	G 1/2 A	24	ZYLS10X120	0.49
1 1/2	<b>TBT24-1/4CFX</b>	25	29.5	G 1/4 A	31	ZYLS12X110	0.42
1 1/2	<b>TBT24-1/2CFX</b>	40	28.0	G 1/2 A	30	ZYLS12X130	0.68
2	<b>TBT32-1/4CFX</b>	25	35.0	G 1/4 A	41	ZYLS12X110	0.51
2	<b>TBT32-1/2CFX</b>	40	34.0	G 1/2 A	38	ZYLS12X130	0.87
2 1/2	<b>TBT40-1/4CFX</b>	30	41.5	G 1/4 A	60	ZYLS12X150	0.63
3	<b>TBT48-1/4CFX</b>	30	50.0	G 1/4 A	72	ZYLS12X150	0.90

\*For testpoints and diagnostic test equipment see catalogue 4100, Industrial Tube Fittings Europe

Alternative versions on request



**TFVB**



**TTb**

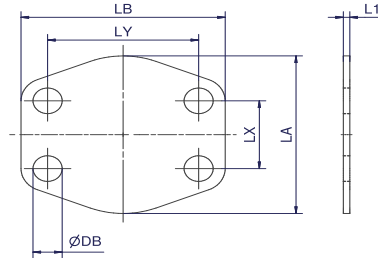
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	TBT24-1/4CFX
Stainless steel	SS	TBT24-1/4SSX



## AP – SAE flange locking plate

SAE 3000/ISO 6162-1



Nom. flange size		L1*	LA	LB	LX	LY	DB	Weight body (Steel) kg/1 piece	Order code
SAE (In)	ISO (DN)								
1/2	13	3	47	57	17.5	38.1	9.0	0.02	<b>8AP1</b>
3/4	19	3	49	66	22.3	47.6	11.0	0.02	<b>12AP1</b>
1	25	3	53	71	26.2	52.4	11.0	0.02	<b>16AP1</b>
1 1/4	32	3	69	80	30.2	58.7	11.5	0.03	<b>20AP1</b>
1 1/2	38	3	77	95	35.7	69.9	13.5	0.03	<b>24AP1</b>
2	51	3	89	103	42.9	77.8	13.5	0.04	<b>32AP1</b>
2 1/2	64	3	101	116	50.8	89.9	13.5	0.04	<b>40AP1</b>
3	76	4	124	136	61.9	106.4	17.0	0.07	<b>48AP1</b>
3 1/2	89	4	136	152	69.9	102.7	17.0	0.07	<b>56AP1</b>
4	102	4	146	162	77.8	130.2	17.0	0.09	<b>64AP1</b>
5	127	4	180	184	92.1	152.4	17.0	0.10	<b>80AP1</b>

\*L1 x 2 with locking and rubber plate (CFSBR70)  
This flange locking plate is not used under pressure!

Please change suffixes according to material/surface required

Order code suffixes			
Material	Suffix surface and material	Example	Description
Steel, zinc plated, Cr(VI)-free	CF	8AP1CF	only locking plate
Stainless steel	SS	8AP1SS	only locking plate
Steel (zinc plated, Cr(VI)-free), SBR 70 Shore A	CFSBR70	8AP1CFSBR70	locking incl. rubber plate

**Bolts and nuts for flange**

SAE 3000/ISO 6162-1



**F37 Flare Flange**

Size Inch	Flange	F37 Seal / Flat Face / Bonded Seal		Nut
		Bolts Tube to Port	Bolts Tube to Tube	
1/2	F37-308-CFX	4x ZYLS8X35	4x ZYLS8X55	4x ISO4032-M8
3/4	F37-312-CFX	4x ZYLS10X40	4x ZYLS10X65	4x ISO4032-M10
1	F37-316-CFX	4x ZYLS10X45	4x ZYLS10X75	4x ISO4032-M10
1 1/4	F37-320-CFX	4x ZYLS10X40	4x ZYLS10X70	4x ISO4032-M10
1 1/2	F37-324-CFX	4x ZYLS12X45	4x ZYLS12X80	4x ISO4032-M12
2	F37-332-CFX	4x ZYLS12X55	4x ZYLS12X100	4x ISO4032-M12
2 1/2	F37-340-CFX	4x ZYLS12X65	4x ZYLS12X120	4x ISO4032-M12
3	F37-348-CFX	4x ZYLS16X80	4x ZYLS16X140	4x ISO4032-M16

**Retaining Ring Flange**

Size Inch	Flange	F37 Seal / Flat Face / Bonded Seal		Nut
		Bolts Tube to Port	Bolts Tube to Tube	
1/2	R-308-CFX	4x ZYLS8X35	4x ZYLS8X60	4x ISO4032-M8
3/4	R-312-CFX	4x ZYLS10X40	4x ZYLS10X65	4x ISO4032-M10
1	R-316-CFX	4x ZYLS10X40	4x ZYLS10X70	4x ISO4032-M10
1 1/4	R-320-CFX	4x ZYLS10X40	4x ZYLS10X70	4x ISO4032-M10
1 1/2	R-324-CFX	4x ZYLS12X50	4x ZYLS12X80	4x ISO4032-M12
2	R-332-CFX	4x ZYLS12X55	4x ZYLS12X90	4x ISO4032-M12
2 1/2	R-340-CFX	4x ZYLS12X65	4x ZYLS12X120	4x ISO4032-M12
3	R-348-CFX	4x ZYLS16X80	4x ZYLS16X130	4x ISO4032-M16

Bolts and nuts must be ordered separately

Latest information about nuts and bolts see [www.parker.com/tfde/servicemanuals/userguides](http://www.parker.com/tfde/servicemanuals/userguides)

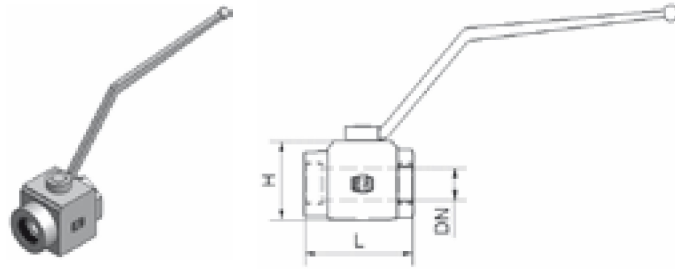
Please add the suffixes according to the bolt quality

Quality	Steel		Stainless Steel
	8.8	10.9	
Bolt	ZYLS16X60X	ZYLS16X60109X	ZYLS16X60A4-80X
Nut	ISO-4032-M12-8VZX	ISO-4032-M12-10X	ISO-4032-M12-80X



## KH – Ball valve

Female BSPP thread (ISO 1179-1)



Material Steel

Size Inch	DN	L	H	Order code	Weight (Steel) kg/1 piece	W.P. bar
1 ¼	32	110	80	<b>KH11/4X</b>	3	315
1 1/2	40	114	90	<b>KH11/2X</b>	4	315
2	50	129	104	<b>KH2X</b>	5	400

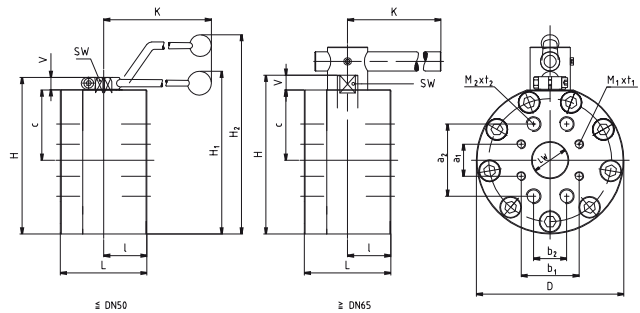
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	KH11/4CFX
Steel		KH11/4
Stainless steel	71	KH11/471X

	Materials	
Body	Steel	Stainless Steel
Ball	Steel	Stainless Steel
Stem	Steel	Stainless Steel
Ball seats	POM	POM
O-Ring	NBR	NBR
Tmin / T max	-10°C / 100 °C	-30°C / 100°C

**KH – Ball valve drilled and tapped for SAE 3000 and SAE 6000 Flanges**

SAE 3000/ISO 6162-1



Material Steel

Order Code	PN (bar)	DN	LW	L	I	D	H	c	V	K	SW	a1	b1	M1	t1	H1	H2	Material Code	Lever	Weight kg
<b>KH08-15CF</b>	210 / 420	15	15	75	35	88	88	31	13	160	12	17.5	38.1	M8	18	-	132	<b>212A</b>	Al	2.96
<b>KH12-20CF</b>	210 / 420	20	20	80	35	98	100	36.5	14	200	14	22.2	47.6	M10	18	103	-	<b>212A</b>	Zn	4.20
<b>KH16-25CF</b>	210 / 420	25	25	88	38	118	113	39.5	14	200	14	52.4	26.2	M10	20	116	-	<b>212A</b>	Zn	6.00
<b>KH20-32CF</b>	210 / 420	32	32	100	50	145	158	68	17	320	17	30.2	58.7	M12	20	167	-	<b>212A</b>	Al	11.65
<b>KH24-38CF</b>	210 / 420	40	38	110	55	165	178	78	17	320	17	35.7	69.8	M12	20	187	-	<b>212A</b>	Al	17.10
<b>KH32-48CF</b>	210 / 420	50	48	116	58	198	210	94	17	320	17	42.9	77.8	M12	20	219	-	<b>212A</b>	Al	24.60
<b>KH40-63CF</b>	210 / 420	65	63	170	75	218	275	100	20	600	16	88.9	50.8	M12	41	-	-	<b>282A</b>	St	44.40
<b>KH48-76CF</b>	210 / 420	80	76	170	70	248	307	111	21	600	19	106.4	61.9	M16	47	-	-	<b>282A</b>	St	54.90

Steel ball valves 1/2" up to 3" with SAE 3000 and SAE 6000 boring pattern

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	KH20-25CF
Stainless steel	SS	KH20-25SS

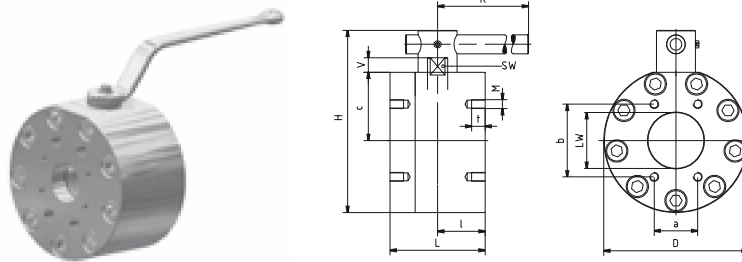
	Material 212A
Body	Steel
Ball	Steel
Stem	Steel
Ball seats	POM
O-Ring	NBR
Tmin / T max	-10°C / 100°C





**KH – Ball valve drilled and tapped for SAE 3000 Flanges**

SAE 3000/ISO 6162-1



Material Steel

Order Code	PN (bar)	DN	LW	L	I	D	H	c	V	K	SW	a	b	M	t	Material Code	Lever	Weight kg
<b>KH64-100CF</b>	210	100	100	170	85	258	326	122	27	900	24	130	78.0	M16	24	<b>282A</b>	St(2)	60.5
<b>KH80-118CF</b>	210	125	118	210	105	295	377	140	33	900	36	152	92.1	M16	30	<b>282A</b>	St(2)	95.5

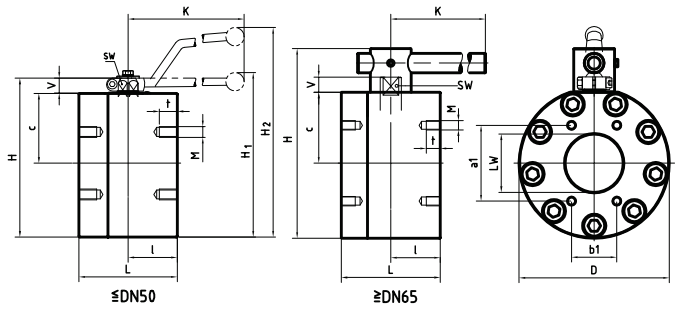
Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	KH20-25CF
Stainless steel	SS	KH20-25SS

	Material 282A
Body	Steel
Ball	Steel
Stem	Stainless Steel
Ball seats	POM
O-Ring	NBR
Tmin / T max	-10°C / 100°C

**KH – Ball valve drilled and tapped for SAE 3000 Flanges**

SAE 3000/ISO 6162-1



Material Stainless Steel

Order Code	PN (bar)	DN	LW	L	I	D	H	c	V	K	SW	a1	b1	M1	t1	H1	H2	Material Code	Lever	Weight kg
<b>KH08-15SS</b>	210	15	15	75	35	78	83	31	13	160	12	38.1	17.5	M8	18	-	127	<b>442A</b>	Al	2.96
<b>KH12-20SS</b>	210	20	20	80	35	98	100	36.5	14	200	14	47.6	22.2	M10	18	103	-	<b>442A</b>	Zn	4.20
<b>KH16-25SS</b>	210	25	25	88	38	118	113	39.5	14	200	14	52.4	26.2	M10	20	116	-	<b>442A</b>	Zn	6.00
<b>KH20-32SS</b>	210	32	32	100	50	145	158	68	17	320	17	58.7	30.2	M12	20	167	-	<b>442A</b>	Al	11.65
<b>KH24-38SS</b>	210	40	38	110	55	165	178	78	17	320	17	69.8	35.7	M12	20	187	-	<b>442A</b>	Al	17.10
<b>KH32-48SS</b>	210	50	48	116	58	198	210	94	17	320	17	77.8	42.9	M12	20	219	-	<b>442A</b>	Al	24.60
<b>KH40-63SS</b>	210	65	63	150	75	198	259	94	20	600	16	88.9	50.8	M12	19	-	-	<b>442A</b>	St	44.40
<b>KH48-76SS</b>	210	80	76	140	70	210	277	100	26	600	19	106.4	61.9	M16	24	-	-	<b>442A</b>	St	54.90
<b>KH64-100SS</b>	210	100	100	170	85	258	326	122	27	900	24	130.2	77.8	M16	24	-	-	<b>442A</b>	St	60.50
<b>KH80-118SS</b>	210	125	118	210	105	295	377	140	33	900	36	152.4	92.1	M16	30	-	-	<b>442A</b>	St	95.50

Please change suffixes according to material/surface required

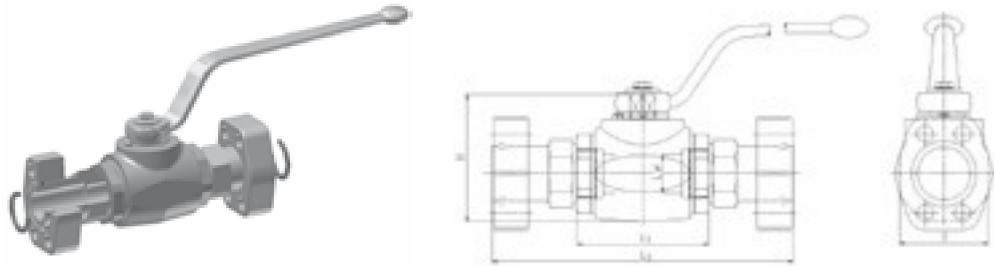
Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	KH20-25CF
Stainless steel	SS	KH20-25SS

	Material 442A
Body	Stainless Steel
Ball	Stainless Steel
Stem	Stainless Steel
Ball seats	POM
O-Ring	NBR
Tmin / T max	-30°C / 100°C



**KH-R – Ball valve with SAE 3000 Flanges**

SAE 3000/ISO 6162-1



Material Steel

Size Inch	LW	L1	L2	B	H	Complete part Order code	Valve body Order code	Weight body (Steel) kg/1 piece	W.P. bar
3/4	20	95	217.0	49	75	<b>KH-R-312-20CF</b>	KH-R-12-20CF	2.5	350
1	25	113	251.0	58	83	<b>KH-R-316-25CF</b>	KH-R-16-25CF	3.8	350
1 1/4	32	111	271.0	81	107	<b>KH-R-320-32CF</b>	KH-R-20-32CF	6.0	280
1 1/2	38	130	316.0	100	124	<b>KH-R-324-38CF</b>	KH-R-24-38CF	8.4	280
2	48	140	348.0	118	138	<b>KH-R-332-48CF</b>	KH-R-32-48CF	13.9	280

Other sizes on request

Material Stainless Steel

Size Inch	LW	L1	L2	B	H	Complete part Order code	Valve body Order code	Weight body (Steel) kg/1 piece	W.P. bar
3/4	20	95	217.0	49	75	<b>KH-R-312-20SS</b>	KH-R-12-20SS	2.5	350
1	25	113	251.0	58	83	<b>KH-R-316-25SS</b>	KH-R-16-25SS	3.8	350
1 1/4	32	111	271.0	81	107	<b>KH-R-320-32SS</b>	KH-R-20-32SS	8.6	280
1 1/2	38	130	316.0	100	124	<b>KH-R-324-38SS</b>	KH-R-24-38SS	12.0	280
2	48	140	348.0	118	138	<b>KH-R-332-48SS</b>	KH-R-32-48SS	16.1	280

Other sizes on request

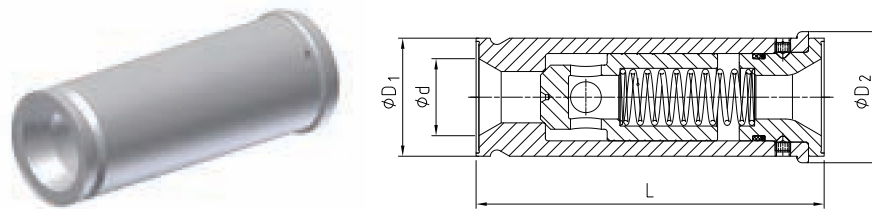
Please change suffixes according to material/surface required

Order code suffixes			
Material	Suffix surface and material	Example	Comments
Steel, zinc plated, Cr(VI)-free	CF	KH-R-320-25CF	
Stainless steel	SS	KH-R-320-25SS	on request

	Materials	
Body	Steel	Stainless Steel
Ball	Steel	Stainless Steel
Stem	Steel	Stainless Steel
Ball seats	POM	POM
O-Ring	NBR	NBR
Tmin / T max	-20°C / 100 °C	-30°C / 100°C

**RHD-R – Non return valves**

SAE 3000/ISO 6162-1



Material Steel

Size Inch	L	D1	D2	d	Complete part Order code	Valve body Order code	Weight body (Steel) kg/1 piece	W.P. bar
3/4	96.4	36	40.2	20.0	<b>RHD-R-312-0.5BCF</b>	RHD-R-12-0.5BCF	0.53	210
1	116.6	39	44.2	23.0	<b>RHD-R-316-0.5BCF</b>	RHD-R-16-0.5BCF	0.78	
1 1/4	135.6	46	51.1	30.0	<b>RHD-R-320-0.5BCF</b>	RHD-R-20-0.5BCF	1.26	
1 1/2	135.6	56	60.5	38.8	<b>RHD-R-324-0.5BCF</b>	RHD-R-24-0.5BCF	1.61	
2	180.1	66	70.5	49.0	<b>RHD-R-332-0.5BCF</b>	RHD-R-32-0.5BCF	2.54	
2 1/2	190.0	80	84.5	60.0	<b>RHD-R-340-0.5BCF</b>	RHD-R-40-0.5BCF	3.89	
3	200.0	97	103.2	73.0	<b>RHD-R-348-0.5BCF</b>	RHD-R-48-0.5BCF	5.90	

Opening pressure 0.5 bar. Other pressure rates on request.

Please change suffixes according to material/surface required

Order code suffixes		
Material	Suffix surface and material	Example
Steel, zinc plated, Cr(VI)-free	CF	RHD-R-320-0.5BCF
Stainless steel (inner parts steel)	SS	RHD-R-320-0.5BSS

	Materials
Body	Steel
O-Ring	NBR
Tmin / T max	-10°C / 100 °C

