



## ISO FLANGES AND FABRICATIONS

The ISO range of flanges and fittings are manufactured from high quality 304L (1.4306) and 316L (1.4404) stainless steel. There are four different configurations as shown. Figure 1 illustrates the double claw-clamp assembly which is the most commonly used configuration; Figure 2 shows the wall clamp assembly where a claw-clamp flange is mounted to a rotatable bolt ring. This assembly combines the claw-clamp flange and bolt flanges with nuts and bolts.

The rotatable bolt ring and fixed bolted assembly is shown in figure 3.

The rotatable bolt ring consists of a rotatable outer ring and a split retainer ring to hold the claw-clamp in place. Finally configuration 4 shows a bolted fixed flange and a tapped flange, or chamber wall for example.

All four configurations use an "O" ring seal held in place by a centering ring. This is effective down to  $10^{-7}$  mbar. With Viton "O" ring assemblies bakable to 200°C (Sustained 150°C).

\* Other materials available on request.



Figure 1



Figure 2



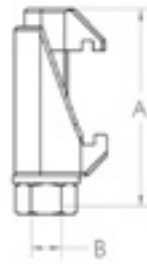
Figure 3



Figure 4

## ISO DOUBLE CLAW CLAMPS - STEEL PLATED

PART NUMBER	PNEUROP	A	B	Clamps Req'd
ISO63/250DC	ISO63-250	60 (2.36)	M10	4
ISO320/500DC	ISO320-500	75 (2.95)	M12	8
ISO630DC	ISO630	85 (3.35)	M12	12



## ISO DOUBLE CLAW CLAMPS - ALUMINIUM

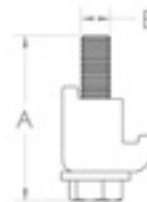
PART NUMBER	PNEUROP	A	B	Clamps Req'd
ISO63/100DCA	ISO63-100	50 (1.97)	M10	4
ISO160/250DCA	ISO160-250	52 (2.05)	M12	8
ISO320/500DCA	ISO320-500	68 (2.68)	M12	12



## ISO WALL CLAMPS - STEEL

PART NUMBER	PNEUROP	A	B Thread size	Clamps Req'd
ISO63/100WC	ISO63-100	35 (1.38)	M8	4
ISO160/250WC	ISO160-250	40 (1.57)	M10	8
ISO320/500WC	ISO320-500	50 (1.97)	M12	12

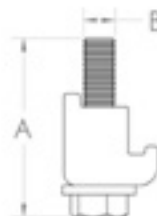
Used with blind tapped holes and centering ring



## ISO WALL CLAMPS - ALUMINIUM

PART NUMBER	PNEUROP	A	B Thread size	Clamps Req'd
ISO63/100WCA	ISO63-100	35 (1.38)	M8	4
ISO160/250WCA	ISO160-250	40 (1.57)	M10	8
ISO320/500WCA	ISO320-500	50 (1.97)	M12	12

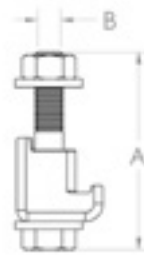
Used with blind tapped holes and centering ring



## ISO WALL CLAMPS, NUT & WASHER - STEEL

PART NUMBER	PNEUROP	A	Thread Size	Clamps Req'd
ISO63/100WCN	ISO63-100	45 (1.77)	M8	4
ISO160/250WCN	ISO160-250	50 (1.97)	M10	8
ISO320/500WCN	ISO320-500	60 (2.36)	M12	12

Used with through bolt holes and centering ring  
Also available with aluminium clamps on request

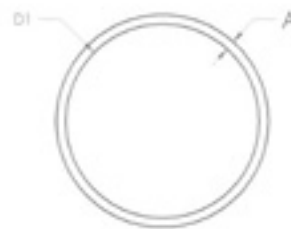


## ISO O-RING - VITON / NITRILE

PART NUMBER VITON	PNEUROP	A	D1	PART NUMBER NITRILE
ISO63VR	ISO63	5.3 (0.21)	76 (2.99)	ISO63NR
ISO80VR	ISO80	5.3 (0.21)	88 (3.46)	ISO80NR
ISO100VR	ISO100	5.3 (0.21)	107 (4.21)	ISO100NR
ISO160VR	ISO160	5.3 (0.21)	158 (6.22)	ISO160NR
ISO200VR	ISO200	5.3 (0.21)	221 (8.70)	ISO200NR
ISO250VR	ISO250	5.3 (0.21)	253 (9.96)	ISO250NR
ISO320VR	ISO320	7.0 (0.28)	330 (12.99)	ISO320NR
ISO400VR	ISO400	7.0 (0.28)	405 (15.94)	ISO400NR
ISO500VR	ISO500	7.0 (0.28)	507 (19.96)	ISO500NR
ISO630VR	ISO630	7.0 (0.28)	659 (25.94)	ISO630NR

Viton O-ring

Nitrol O-ring



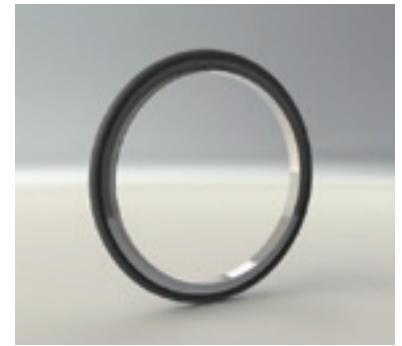
## ISO CENTERING RING - STAINLESS STEEL INNER / VITON

PART NUMBER	PNEUROP	A	B	D1	O Ring size
ISO63SVCR	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	5.3 (0.21)
ISO80SVCR	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	5.3 (0.21)
ISO100SVCR	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	5.3 (0.21)
ISO160SVCR	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	5.3 (0.21)
ISO200SVCR	ISO200	8 (0.31)	3.9 (0.15)	213 (8.39)	5.3 (0.21)
ISO250SVCR	ISO250	8 (0.31)	3.9 (0.15)	261 (10.28)	5.3 (0.21)
ISO320SVCR	ISO320	14 (0.55)	5.6 (0.22)	318 (12.52)	7.0 (0.28)
ISO400SVCR	ISO400	14 (0.55)	5.6 (0.22)	400 (15.75)	7.0 (0.28)
ISO500SVCR	ISO500	14 (0.55)	5.6 (0.22)	501 (19.72)	7.0 (0.28)
ISO630SVCR	ISO630	14 (0.55)	5.6 (0.22)	651 (25.63)	7.0 (0.28)



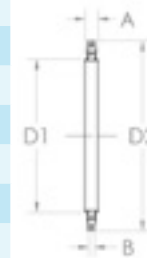
## ISO CENTERING RING - STAINLESS STEEL INNER / NITRILE

PART NUMBER	PNEUROP	A	B	D1	O Ring size
ISO63SNCR	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	5.3 (0.21)
ISO80SNCR	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	5.3 (0.21)
ISO100SNCR	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	5.3 (0.21)
ISO160SNCR	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	5.3 (0.21)
ISO200SNCR	ISO200	8 (0.31)	3.9 (0.15)	213 (8.39)	5.3 (0.21)
ISO250SNCR	ISO250	8 (0.31)	3.9 (0.15)	261 (10.28)	5.3 (0.21)
ISO320SNCR	ISO320	14 (0.55)	5.6 (0.22)	318 (12.52)	7.0 (0.28)
ISO400SNCR	ISO400	14 (0.55)	5.6 (0.22)	400 (15.75)	7.0 (0.28)
ISO500SNCR	ISO500	14 (0.55)	5.6 (0.22)	501 (19.72)	7.0 (0.28)
ISO630SNCR	ISO630	14 (0.55)	5.6 (0.22)	651 (25.63)	7.0 (0.28)



## ISO TRAPPED CENTERING RING - STAINLESS STEEL INNER / VITON

PART NUMBER	PNEUROP	A	B	D1	D2	O Ring size
ISO63SVCRT	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	94 (3.7)	5.3 (0.21)
ISO80SVCRT	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	109 (4.29)	5.3 (0.21)
ISO100SVCRT	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	128 (5.04)	5.3 (0.21)
ISO160SVCRT	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	179 (7.05)	5.3 (0.21)
ISO200SVCRT	ISO200	8 (0.31)	3.9 (0.15)	213 (8.39)	239 (9.41)	5.3 (0.21)
ISO250SVCRT	ISO250	8 (0.31)	3.9 (0.15)	261 (10.28)	287 (11.3)	5.3 (0.21)
ISO320SVCRT	ISO320	14 (0.55)	5.6 (0.22)	318 (12.52)	358 (14.09)	7.0 (0.28)
ISO400SVCRT	ISO400	14 (0.55)	5.6 (0.22)	400 (15.75)	440 (17.32)	7.0 (0.28)
ISO500SVCRT	ISO500	14 (0.55)	5.6 (0.22)	501 (19.72)	541 (21.3)	7.0 (0.28)
ISO630SVCRT	ISO630	14 (0.55)	5.6 (0.22)	651 (25.63)	691 (27.2)	7.0 (0.28)



Inner centering ring stainless steel, outer aluminium

## ISO TRAPPED CENTERING RING - STAINLESS STEEL / NITRILE

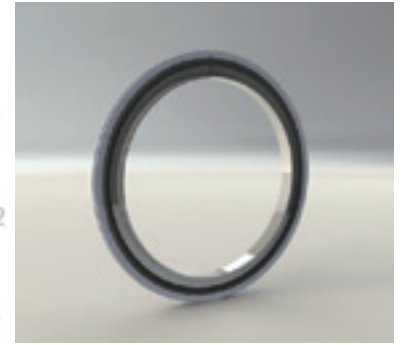
PART NUMBER	PNEUROP	A	B	D1	D2	O Ring size
ISO63SNCRT	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	94 (3.7)	5.3 (0.21)
ISO80SNCRT	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	109 (4.29)	5.3 (0.21)
ISO100SNCRT	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	128 (5.04)	5.3 (0.21)
ISO160SNCRT	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	179 (7.05)	5.3 (0.21)
ISO200SNCRT	ISO200	8 (0.31)	3.9 (0.15)	213 (8.39)	239 (9.41)	5.3 (0.21)
ISO250SNCRT	ISO250	8 (0.31)	3.9 (0.15)	261 (10.28)	287 (11.3)	5.3 (0.21)
ISO320SNCRT	ISO320	14 (0.55)	5.6 (0.22)	318 (12.52)	358 (14.09)	7.0 (0.28)
ISO400SNCRT	ISO400	14 (0.55)	5.6 (0.22)	400 (15.75)	440 (17.32)	7.0 (0.28)
ISO500SNCRT	ISO500	14 (0.55)	5.6 (0.22)	501 (19.72)	541 (21.3)	7.0 (0.28)
ISO630SNCRT	ISO630	14 (0.55)	5.6 (0.22)	651 (25.63)	691 (27.2)	7.0 (0.28)



Inner centering ring stainless steel, outer aluminium

## ISO TRAPPED CENTERING RING - ALUMINIUM / VITON

PART NUMBER	PNEUROP	A	B	D1	D2	O Ring size
ISO63AVCRT	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	94 (3.7)	5.3 (0.21)
ISO80AVCRT	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	109 (4.29)	5.3 (0.21)
ISO100AVCRT	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	128 (5.04)	5.3 (0.21)
ISO160AVCRT	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	179 (7.05)	5.3 (0.21)
ISO200AVCRT	ISO200	8 (0.31)	3.9 (0.15)	213 (8.39)	239 (9.41)	5.3 (0.21)
ISO250AVCRT	ISO250	8 (0.31)	3.9 (0.15)	261 (10.28)	287 (11.3)	5.3 (0.21)
ISO320AVCRT	ISO320	14 (0.55)	5.6 (0.22)	318 (12.52)	358 (14.09)	7.0 (0.28)
ISO400AVCRT	ISO400	14 (0.55)	5.6 (0.22)	400 (15.75)	440 (17.32)	7.0 (0.28)
ISO500AVCRT	ISO500	14 (0.55)	5.6 (0.22)	501 (19.72)	541 (21.3)	7.0 (0.28)
ISO630AVCRT	ISO630	14 (0.55)	5.6 (0.22)	651 (25.63)	691 (27.2)	7.0 (0.28)



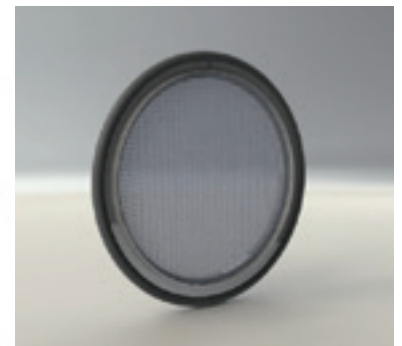
## ISO TRAPPED CENTERING RING -ALUMINIUM / NITRILE

PART NUMBER	PNEUROP	A	B	D1	D2	O Ring size
ISO63ANCRT	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	94 (3.7)	5.3 (0.21)
ISO80ANCRT	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	109 (4.29)	5.3 (0.21)
ISO100ANCRT	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	128 (5.04)	5.3 (0.21)
ISO160ANCRT	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	179 (7.05)	5.3 (0.21)
ISO200ANCRT	ISO200	8 (0.31)	3.9 (0.15)	213 (8.39)	239 (9.41)	5.3 (0.21)
ISO250ANCRT	ISO250	8 (0.31)	3.9 (0.15)	261 (10.28)	287 (11.3)	5.3 (0.21)
ISO320ANCRT	ISO320	14 (0.55)	5.6 (0.22)	318 (12.52)	358 (14.09)	7.0 (0.28)
ISO400ANCRT	ISO400	14 (0.55)	5.6 (0.22)	400 (15.75)	440 (17.32)	7.0 (0.28)
ISO500ANCRT	ISO500	14 (0.55)	5.6 (0.22)	501 (19.72)	541 (21.3)	7.0 (0.28)
ISO630ANCRT	ISO630	14 (0.55)	5.6 (0.22)	651 (25.63)	691 (27.2)	7.0 (0.28)



## ISO MESH CENTERING RING -STAINLESS / VITON

PART NUMBER	PNEUROP	A	B	D1	D2	O Ring size
ISO63MCRV	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	86.6 (3.41)	5.3 (0.21)
ISO80MCRV	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	98.6 (3.88)	5.3 (0.21)
ISO100MCRV	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	117.6 (4.63)	5.3 (0.21)
ISO160MCRV	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	168.6 (6.64)	5.3 (0.21)
ISO200MCRV	ISO200	8 (0.31)	3.9 (0.15)	102 (4.02)	231.6 (9.12)	5.3 (0.21)
ISO250MCRV	ISO250	8 (0.31)	3.9 (0.15)	153 (6.02)	263.6 (10.38)	5.3 (0.21)



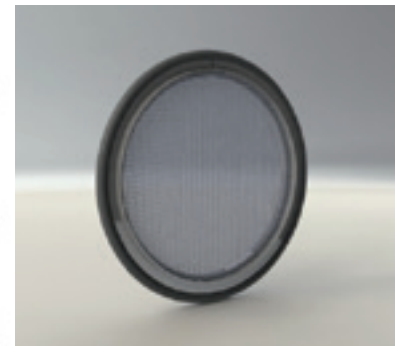
Stainless steel centering ring with mesh screen and replacement Viton 'O' ring



## ISO MESH CENTERING RING - STAINLESS STEEL / NITRILE

PART NUMBER	PNEUROP	A	B	D1	D2	O Ring size
ISO63MCRN	ISO63	8 (0.31)	3.9 (0.15)	70 (2.76)	86.6 (3.41)	5.3 (0.21)
ISO80MCRN	ISO80	8 (0.31)	3.9 (0.15)	83 (3.27)	98.6 (3.88)	5.3 (0.21)
ISO100MCRN	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	117.6 (4.63)	5.3 (0.21)
ISO160MCRN	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	168.6 (6.64)	5.3 (0.21)
ISO200MCRN	ISO100	8 (0.31)	3.9 (0.15)	102 (4.02)	231.6 (9.12)	5.3 (0.21)
ISO250MCRN	ISO160	8 (0.31)	3.9 (0.15)	153 (6.02)	263.6 (10.38)	5.3 (0.21)

Stainless steel centering ring with mesh screen and replacement Viton 'O' ring



## ISO BLANK CLAW CLAMP FLANGE - STAINLESS STEEL.

PART NUMBER	PNEUROP	A	D1	D2	
ISO63BK-304	ISO63BK*	ISO63	12 (0.47)	95 (3.74)	70 (2.76)
ISO80BK-304	ISO80BK*	ISO80	12 (0.47)	110 (4.33)	83 (3.27)
ISO100BK-304	ISO100BK*	ISO100	12 (0.47)	130 (5.12)	102 (4.02)
ISO160BK-304	ISO160BK*	ISO160	12 (0.47)	180 (7.09)	153 (6.02)
ISO200BK-304	ISO200BK*	ISO200	12 (0.47)	240 (9.45)	213 (8.39)
ISO250BK-304	ISO250BK*	ISO250	12 (0.47)	290 (11.42)	261 (10.28)
ISO320BK-304	ISO320BK*	ISO320	17 (0.67)	370 (14.57)	318 (12.52)
ISO400BK-304	ISO400BK*	ISO400	17 (0.67)	450 (17.72)	400 (15.75)
ISO500BK-304	ISO500BK*	ISO500	17 (0.67)	550 (21.65)	501 (19.72)
ISO630BK-304	ISO630BK*	ISO630	22 (0.87)	690 (27.17)	651 (25.63)

\*316L Stainless Steel



## ISO BORED CLAW CLAMP FLANGE - STAINLESS STEEL.

PART NUMBER	PNEUROP	A	D1	D2	D3	
ISO63B76-304	ISO63B76*	ISO63	12 (0.47)	95 (3.74)	76 (2.99)	70 (2.76)
ISO80B89-304	ISO80B89*	ISO80	12 (0.47)	110 (4.33)	89 (3.50)	83 (3.27)
ISO100B108-304	ISO100B108*	ISO100	12 (0.47)	130 (5.12)	108 (4.25)	102 (4.02)
ISO160B159-304	ISO160B159*	ISO160	12 (0.47)	180 (7.09)	159 (6.26)	153 (6.02)
ISO200B219-304	ISO200B219*	ISO200	12 (0.47)	240 (9.45)	219 (8.62)	213 (8.39)
ISO250B267-304	ISO250B267*	ISO250	12 (0.47)	290 (11.42)	267 (10.51)	261 (10.28)
ISO320B324-304	ISO320B324*	ISO320	17 (0.67)	370 (14.57)	324 (12.76)	318 (12.52)
ISO400B406-304	ISO400B406*	ISO400	17 (0.67)	450 (17.72)	406 (15.98)	400 (15.75)
ISO500B508-304	ISO500B508*	ISO500	17 (0.67)	550 (21.65)	508 (20.00)	501 (19.72)
ISO630B660-304	ISO630B660*	ISO630	22 (0.87)	690 (27.17)	660 (25.98)	651 (25.63)

\*316L Stainless Steel

Imperial tube and special bores available on request

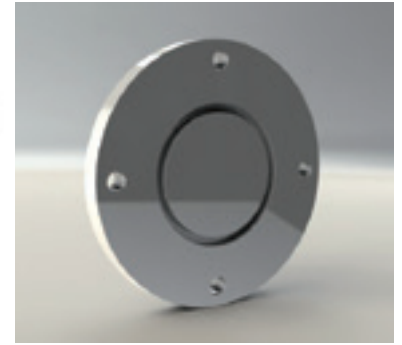
ISO320B324 has a counter bored from vacuum side, D3 = C-ring dimension



## ISO BLANK FIXED BOLTED FLANGE - STAINLESS STEEL.

PART NUMBER		PNEUROP	A	D1	D2
ISO63FBK-304	ISO63FBK*	ISO63	12 (0.47)	130 (5.12)	70 (2.76)
ISO80FBK-304	ISO80FBK*	ISO80	12 (0.47)	145 (5.71)	83 (3.27)
ISO100FBK-304	ISO100FBK*	ISO100	12 (0.47)	165 (6.50)	102 (4.02)
ISO160FBK-304	ISO160FBK*	ISO160	16 (0.63)	225 (8.86)	153 (6.02)
ISO200FBK-304	ISO200FBK*	ISO200	16 (0.63)	285 (11.22)	213 (8.39)
ISO250FBK-304	ISO250FBK*	ISO250	16 (0.63)	335 (13.19)	261 (10.28)
ISO320FBK-304	ISO320FBK*	ISO320	20 (0.79)	425 (16.73)	318 (12.52)
ISO400FBK-304	ISO400FBK*	ISO400	20 (0.79)	510 (20.08)	400 (15.75)

\*316L Stainless Steel

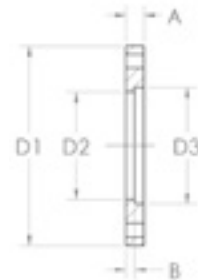


## ISO BORED FIXED BOLTED FLANGE - STAINLESS STEEL.

PART NUMBER		PNEUROP	A	B	D1	D2	D3
ISO63F76-304	ISO63F76*	ISO63	12 (0.47)	6 (0.24)	130 (5.12)	70 (2.76)	76 (2.99)
ISO80F89-304	ISO80F89*	ISO80	12 (0.47)	6 (0.24)	145 (5.71)	83 (3.27)	89 (3.50)
ISO100F108-304	ISO100F108*	ISO100	12 (0.47)	6 (0.24)	165 (6.50)	102 (4.02)	108 (4.25)
ISO160F159-304	ISO160F159*	ISO160	16 (0.63)	6 (0.24)	225 (8.86)	153 (6.02)	159 (6.26)
ISO200F219-304	ISO200F219*	ISO200	16 (0.63)	6 (0.24)	285 (11.22)	213 (8.39)	219 (8.62)
ISO250F267-304	ISO250F267*	ISO250	16 (0.63)	6 (0.24)	335 (13.19)	261 (10.28)	267 (10.51)
ISO320F324-304	ISO320F324*	ISO320	20 (0.79)	6 (0.24)	425 (16.73)	318 (12.52)	324 (12.76)
ISO400F406-304	ISO400F406*	ISO400	20 (0.79)	10 (0.39)	510 (20.08)	400 (15.75)	406 (15.98)

\*316L Stainless Steel

Imperial tube and special bores available on request. D3 = Tube Diameter



## ISO ROTATABLE BOLT RING - STEEL.

PART NUMBER	PNEUROP	A	D1	D2
ISO63R	ISO63	12 (0.47)	130 (5.12)	98.5 (3.88)
ISO100R	ISO100	12 (0.47)	165 (6.50)	133.5 (5.26)
ISO160R	ISO160	16 (0.63)	225 (8.86)	185.7 (7.31)
ISO200R	ISO200	16 (0.63)	285 (11.22)	245.7 (9.67)
ISO250R	ISO250	16 (0.63)	335 (13.19)	295.7 (11.64)



## ISO RETAINING RING - STEEL

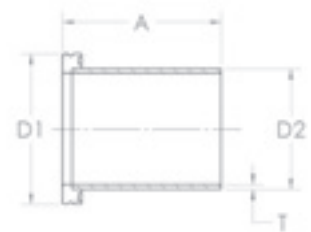
PART NUMBER	PNEUROP	A
ISO63RR	ISO63	3 (0.12)
ISO100RR	ISO100	3 (0.12)
ISO160RR	ISO160	5 (0.20)
ISO200RR	ISO200	5 (0.20)
ISO250RR	ISO250	5 (0.20)
ISO320RR	ISO320	5 (0.20)
ISO400RR	ISO400	8 (0.31)



## ISO TUBULATION - STAINLESS STEEL

PART NUMBER	PNEUROP	A	D1	D2	T	
ISO63TU-304	ISO63TU*	ISO63	100 (3.94)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO80TU-304	ISO80TU*	ISO80	100 (3.94)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISO100TU-304	ISO100TU*	ISO100	100 (3.94)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISO160TU-304	ISO160TU*	ISO160	100 (3.94)	180 (7.09)	159 (6.26)	3.0 (0.12)
ISO200TU-304	ISO200TU*	ISO200	100 (3.94)	240 (9.45)	219 (8.62)	3.0 (0.12)
ISO250TU-304	ISO250TU*	ISO250	100 (3.94)	290 (11.42)	267 (10.51)	3.0 (0.12)
ISO320TU-304	ISO320TU*	ISO320	100 (3.94)	370 (14.57)	324 (12.76)	3.0 (0.12)
ISO400TU-304	ISO400TU*	ISO400	100 (3.94)	450 (17.72)	406 (15.98)	3.0 (0.12)
ISO500TU-304	ISO500TU*	ISO500	100 (3.94)	550 (21.65)	508 (20.00)	4.0 (0.16)
ISO630TU-304	ISO630TU*	ISO630	100 (3.94)	690 (27.17)	660 (25.98)	5.0 (0.20)

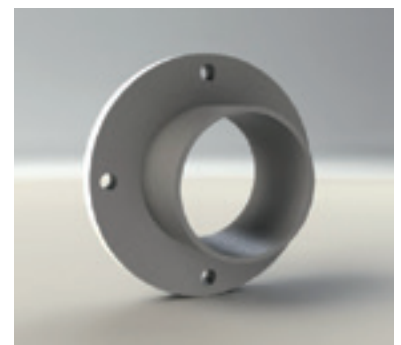
\*316L Stainless Steel  
Special lengths available on request



## ISO FIXED BOLTED TUBULATION - STAINLESS STEEL

PART NUMBER	PNEUROP	A	D1	D2	T	
ISO63FTU-304	ISO63FTU*	ISO63	100 (3.94)	130 (5.12)	76 (2.99)	3.0 (0.12)
ISO80FTU-304	ISO80FTU*	ISO80	100 (3.94)	145 (5.71)	89 (3.50)	5.5 (0.22)
ISO100FTU-304	ISO100FTU*	ISO100	100 (3.94)	165 (6.50)	108 (4.25)	3.0 (0.12)
ISO160FTU-304	ISO160FTU*	ISO160	100 (3.94)	225 (8.86)	159 (6.26)	3.0 (0.12)
ISO200FTU-304	ISO200FTU*	ISO200	100 (3.94)	285 (11.22)	219 (8.62)	3.0 (0.12)
ISO250FTU-304	ISO250FTU*	ISO250	100 (3.94)	335 (13.19)	267 (10.51)	3.0 (0.12)
ISO320FTU-304	ISO320FTU*	ISO320	100 (3.94)	425 (16.73)	324 (12.76)	3.0 (0.12)
ISO400FTU-304	ISO400FTU*	ISO400	100 (3.94)	510 (20.08)	406 (15.98)	3.0 (0.12)
ISO500FTU-304	ISO500FTU*	ISO500	100 (3.94)	610 (24.02)	508 (20.00)	4.0 (0.16)
ISO630FTU-304	ISO630FTU*	ISO630	100 (3.94)	750 (29.53)	660 (25.98)	5.0 (0.20)

\*316L Stainless Steel  
Special lengths available on request

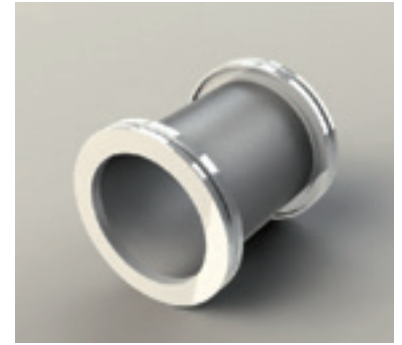
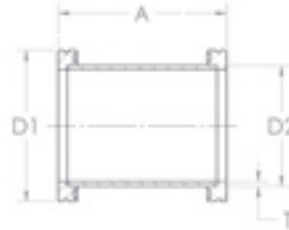




## ISO STRAIGHT CONNECTOR - STAINLESS STEEL

PART NUMBER		PNEUROP	A	D1	D2	T
ISO63SC-304	ISO63SC*	ISO63	100 (3.94)	95 (3.74)	76 (2.99)	3 (0.12)
ISO80SC-304	ISO80SC*	ISO80	100 (3.94)	110 (4.33)	89 (3.50)	3 (0.12)
ISO100SC-304	ISO100SC*	ISO100	100 (3.94)	130 (5.12)	108 (4.25)	3 (0.12)
ISO160SC-304	ISO160SC*	ISO160	100 (3.94)	180 (7.09)	159 (6.26)	3 (0.12)
ISO200SC-304	ISO200SC*	ISO200	100 (3.94)	240 (9.45)	219 (8.62)	3 (0.12)
ISO250SC-304	ISO250SC*	ISO250	100 (3.94)	290 (11.42)	267 (10.51)	3 (0.12)

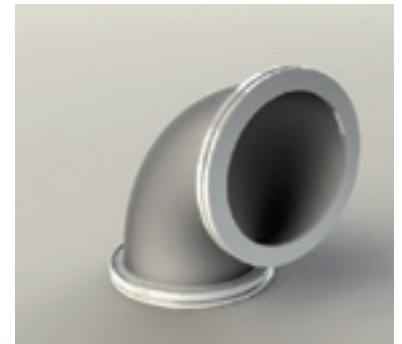
\*316L Stainless Steel  
Special lengths available on request



## ISO 90 DEGREE ELBOW - STAINLESS STEEL

PART NUMBER		PNEUROP	A	D1	D2	T	Elbow
ISO63E-304	ISO63E*	ISO63	88 (3.46)	95 (3.74)	70 (2.76)	2 (0.08)	R
ISO80E-304	ISO80E*	ISO80	98 (3.86)	110 (4.33)	70 (2.76)	2 (0.08)	R
ISO100E-304	ISO100E*	ISO100	108 (4.25)	130 (5.12)	104 (4.25)	2 (0.08)	R
ISO160E-304	ISO160E*	ISO160	138 (5.43)	180 (7.09)	159 (6.26)	3 (0.12)	M
ISO200E-304	ISO200E*	ISO200	178 (7.01)	240 (9.45)	219 (8.62)	3 (0.12)	M
ISO250E-304	ISO250E*	ISO250	208 (8.19)	290 (11.42)	267 (10.51)	3 (0.12)	M

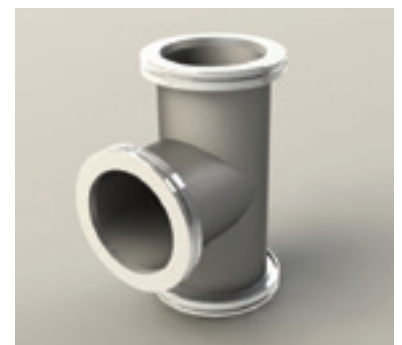
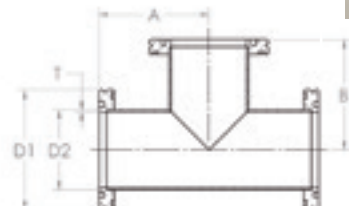
\*316L Stainless Steel  
R - Radius elbow  
M - Mitred elbow



## ISO TEE - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	T
ISO63TE-304	ISO63TE*	ISO63	88 (3.46)	88 (3.46)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO80TE-304	ISO80TE*	ISO80	98 (3.86)	98 (3.86)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISO100TE-304	ISO100TE*	ISO100	108 (4.25)	108 (4.25)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISO160TE-304	ISO160TE*	ISO160	138 (5.43)	138 (5.43)	180 (7.09)	159 (6.26)	3.0 (0.12)
ISO200TE-304	ISO200TE*	ISO200	178 (7.01)	178 (7.01)	240 (9.45)	219 (8.62)	3.0 (0.12)
ISO250TE-304	ISO250TE*	ISO250	208 (8.19)	208 (8.19)	290 (11.42)	267 (10.51)	3.0 (0.12)

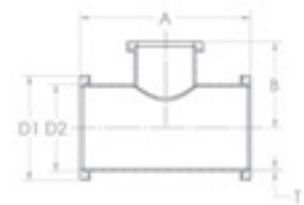
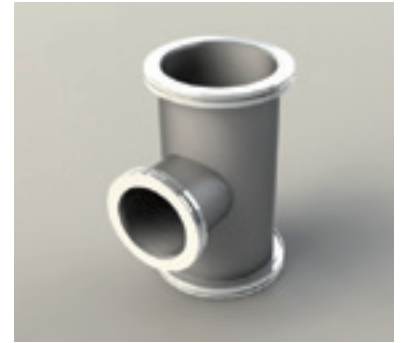
\*316L Stainless Steel



## ISO UNEQUAL TEE - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	T
ISO100TE63-304	ISO100TE63*	ISO100/63	216 (8.50)	107 (4.21)	130 (5.12)	108 (4.25)	3 (0.12)
ISO160TE63-304	ISO160TE63*	ISO160/63	276 (10.87)	130 (5.12)	180 (7.09)	159 (6.26)	3 (0.12)
ISO160TE100-304	ISO160TE100*	ISO160/100	276 (10.87)	131 (5.16)	180 (7.09)	159 (6.26)	3 (0.12)
ISO200TE63-304	ISO200TE63*	ISO200/63	276 (10.87)	160 (6.30)	240 (9.45)	219 (8.62)	3 (0.12)
ISO200TE100-304	ISO200TE100*	ISO200/100	276 (10.87)	161 (6.34)	240 (9.45)	219 (8.62)	3 (0.12)
ISO200TE160-304	ISO200TE160*	ISO200/160	276 (10.87)	168 (6.61)	240 (9.45)	219 (8.62)	3 (0.12)

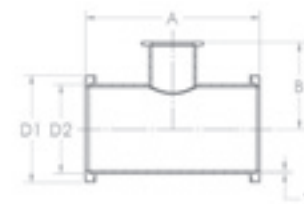
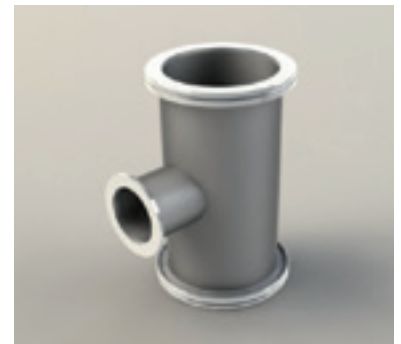
\*316L Stainless Steel



## ISO-KF UNEQUAL TEE - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	T
ISO63TE16-304	ISO63TE16*	ISO63/NW16	204 (8.03)	58 (2.28)	95 (3.74)	76 (2.99)	3 (0.12)
ISO63TE25-304	ISO63TE25*	ISO63/NW25	204 (8.03)	79 (3.11)	95 (3.74)	76 (2.99)	3 (0.12)
ISO63TE40-304	ISO63TE40*	ISO63/NW40	204 (8.03)	76 (2.99)	95 (3.74)	76 (2.99)	3 (0.12)
ISO100TE25-304	ISO100TE25*	ISO100/NW25	260 (10.24)	98 (3.86)	130 (5.12)	108 (4.25)	3 (0.12)
ISO100TE40-304	ISO100TE40*	ISO100/NW40	260 (10.24)	95 (3.74)	130 (5.12)	108 (4.25)	3 (0.12)

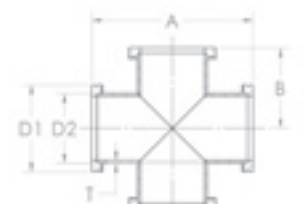
\*316L Stainless Steel



## ISO 4-WAY CROSS - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	T
ISO63X-304	ISO63X*	ISO63	176 (6.93)	88 (3.46)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO80X-304	ISO80X*	ISO80	196 (7.72)	98 (3.86)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISO100X-304	ISO100X*	ISO100	216 (8.50)	108 (4.25)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISO160X-304	ISO160X*	ISO160	276 (10.87)	138 (5.43)	180 (7.09)	159 (6.26)	3.0 (0.12)
ISO200X-304	ISO200X*	ISO200	356 (14.02)	178 (7.01)	240 (9.45)	219 (8.62)	3.0 (0.12)
ISO250X-304	ISO250X*	ISO250	416 (16.38)	208 (8.19)	290 (11.42)	267 (10.51)	3.0 (0.12)

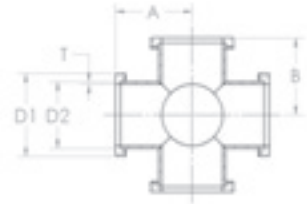
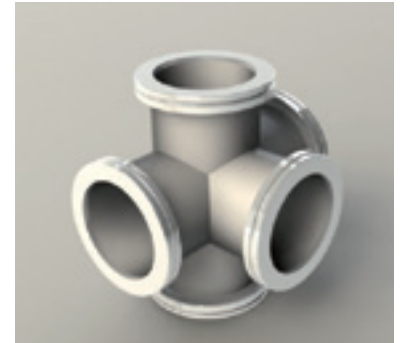
\*316L Stainless Steel



## ISO 5-WAY CROSS - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	T
ISO63FWX-304	ISO63FWX*	ISO63	88 (3.46)	88 (3.46)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO80FWX-304	ISO80FWX*	ISO80	98 (3.86)	98 (3.86)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISO100FWX-304	ISO100FWX*	ISO100	108 (4.25)	108 (4.25)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISO160FWX-304	ISO160FWX*	ISO160	138 (5.43)	138 (5.43)	180 (7.09)	159 (6.26)	3.0 (0.12)
ISO200FWX-304	ISO200FWX*	ISO200	178 (7.01)	178 (7.01)	240 (9.45)	219 (8.62)	3.0 (0.12)
ISO250FWX-304	ISO250FWX*	ISO250	208 (8.19)	208 (8.19)	290 (11.42)	267 (10.51)	3.0 (0.12)

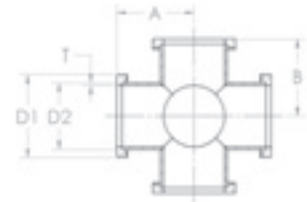
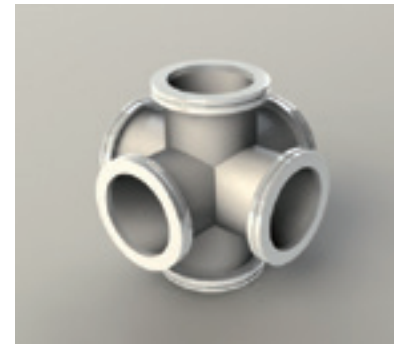
\*316L Stainless Steel



## ISO 6-WAY CROSS - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	T
ISO63XX-304	ISO63XX*	ISO63	88 (3.46)	88 (3.46)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO80XX-304	ISO80XX*	ISO80	98 (3.86)	98 (3.86)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISO100XX-304	ISO100XX*	ISO100	108 (4.25)	108 (4.25)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISO160XX-304	ISO160XX*	ISO160	138 (5.43)	138 (5.43)	180 (7.09)	159 (6.26)	3.0 (0.12)
ISO200XX-304	ISO200XX*	ISO200	178 (7.01)	178 (7.01)	240 (9.45)	219 (8.62)	3.0 (0.12)
ISO250XX-304	ISO250XX*	ISO250	208 (8.19)	208 (8.19)	290 (11.42)	267 (10.51)	3.0 (0.12)

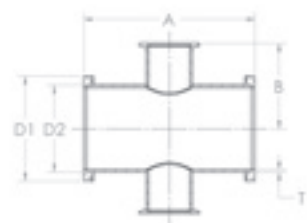
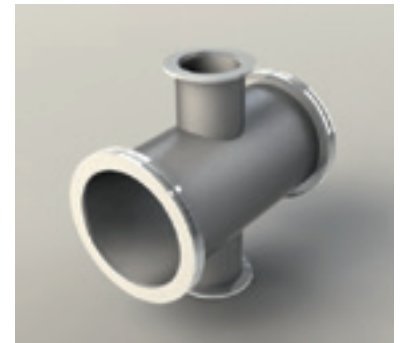
\*316L Stainless Steel



## ISO-KF REDUCING CROSS - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	T
ISO63X16-304	ISO63X16*	ISO63/NW16	204 (8.03)	58 (2.28)	95 (3.74)	76 (2.99)	3 (0.12)
ISO63X25-304	ISO63X25*	ISO63/NW25	204 (8.03)	79 (3.11)	95 (3.74)	76 (2.99)	3 (0.12)
ISO63X40-304	ISO63X40*	ISO63/NW40	204 (8.03)	76 (2.99)	95 (3.74)	76 (2.99)	3 (0.12)
ISO63X50-304	ISO63X50*	ISO63/NW50	204 (8.03)	92 (3.62)	95 (3.74)	76 (2.99)	3 (0.12)
ISO100X25-304	ISO100X25*	ISO100/NW25	260 (10.24)	98 (3.86)	130 (5.12)	108 (4.25)	3 (0.12)
ISO100X40-304	ISO100X40*	ISO100/NW40	260 (10.24)	95 (3.74)	130 (5.12)	108 (4.25)	3 (0.12)
ISO100X50-304	ISO100X50*	ISO100/NW50	260 (10.24)	111 (4.37)	130 (5.12)	108 (4.25)	3 (0.12)
ISO160X40-304	ISO160X40*	ISO160/NW40	320 (12.60)	121 (4.76)	130 (5.12)	159 (6.26)	3 (0.12)
ISO160X50-304	ISO160X50*	ISO160/NW50	320 (12.60)	136 (5.35)	130 (5.12)	159 (6.26)	3 (0.12)

\*316L Stainless Steel

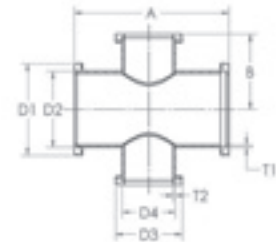
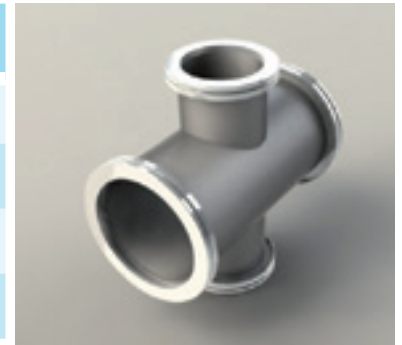


All measurements are in millimetres (inches in brackets)

## ISO REDUCING CROSS - STAINLESS STEEL

PART NUMBER		PNEUROP	A	B	D1	D2	D3	D4	T1	T2
ISO100X63-304	ISO100X63*	ISO100/63	216 (8.5)	107 (4.21)	130 (5.12)	108 (4.25)	95 (3.74)	76 (2.99)	3 (0.12)	3 (0.12)
ISO160X63-304	ISO160X63*	ISO160/63	276 (10.87)	130 (5.12)	180 (7.09)	159 (6.26)	95 (3.74)	76 (2.99)	3 (0.12)	3 (0.12)
ISO160X100-304	ISO160X100*	ISO160/100	276 (10.87)	131 (5.16)	180 (7.09)	159 (6.26)	130 (5.12)	108 (4.25)	3 (0.12)	3 (0.12)
ISO200X160-304	ISO200X160*	ISO200/160	256 (10.08)	168 (6.61)	240 (9.45)	219 (8.62)	180 (7.09)	159 (6.26)	3 (0.12)	3 (0.12)

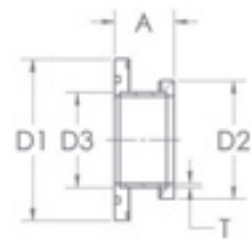
\*316L Stainless Steel



## ISO REDUCING ADAPTOR - STAINLESS STEEL

PART NUMBER		PNEUROP	A	D1	D2	D3	T
ISO80R63-304	ISO80R63*	ISO63/80	50 (1.97)	110 (4.33)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO100R63-304	ISO100R63*	ISO63/100	50 (1.97)	130 (5.12)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO160R63-304	ISO160R63*	ISO63/160	50 (1.97)	180 (7.09)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO200R63-304	ISO200R63*	ISO63/200	90 (3.54)	240 (9.45)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISO100R80-304	ISO100R80*	ISO80/100	50 (1.97)	130 (5.12)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISO160R80-304	ISO160R80*	ISO80/160	50 (1.97)	180 (7.09)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISO160R100-304	ISO160R100*	ISO100/160	50 (1.97)	180 (7.09)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISO200R100-304	ISO200R100*	ISO100/200	90 (3.54)	240 (9.45)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISO200R160-304	ISO200R160*	ISO160/200	90 (3.54)	240 (9.45)	180 (7.09)	159 (6.26)	3.0 (0.12)
ISO250R160-304	ISO250R160*	ISO160/250	90 (3.54)	290 (11.42)	180 (7.09)	159 (6.26)	3.0 (0.12)
ISO250R200-304	ISO250R200*	ISO200/250	90 (3.54)	290 (11.42)	240 (9.45)	219 (8.62)	3.0 (0.12)

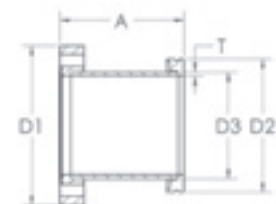
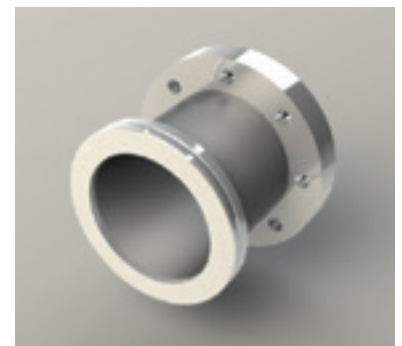
\*316L Stainless Steel



## ISO TO CF ADAPTOR - STAINLESS STEEL

PART NUMBER		PNEUROP	A	D1	D2	D3	T
SA6363-304	SA6363*	ISO63/CF63	90 (3.54)	114 (4.49)	95 (3.74)	76 (2.99)	3 (0.12)
SA1063-304	SA1063*	ISO63/CF100	90 (3.54)	152 (5.98)	95 (3.74)	76 (2.99)	3 (0.12)
SA1010-304	SA1010*	ISO100/CF100	90 (3.54)	152 (5.98)	130 (5.12)	108 (4.25)	3 (0.12)
SA1016-304	SA1016*	ISO160/CF100	90 (3.54)	152 (5.98)	180 (7.09)	159 (6.26)	3 (0.12)
SA1510-304	SA1510*	ISO100/CF150	90 (3.54)	203 (7.99)	130 (5.12)	105 (4.13)	3 (0.12)
SA1516-304	SA1516*	ISO160/CF150	90 (3.54)	203 (7.99)	180 (7.09)	159 (6.26)	3 (0.12)

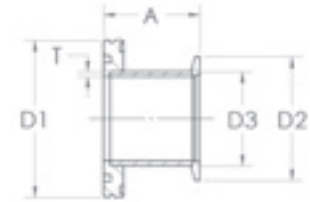
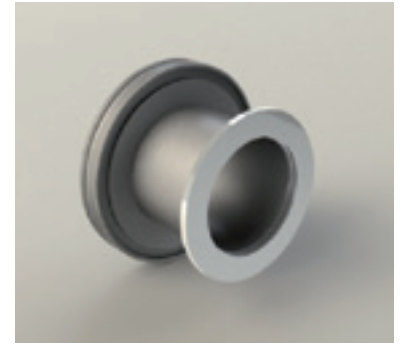
\*316L Stainless Steel



## ISO TO NW **ADAPTOR** - STAINLESS STEEL.

PART NUMBER		PNEUROP	A	D1	D2	D3	T
SK6325-304	SK6325*	ISO63/NW25	50 (1.97)	95 (3.74)	40 (1.57)	28.0 (1.10)	2 (0.08)
SK6340-304	SK6340*	ISO63/NW40	50 (1.97)	95 (3.74)	55 (2.17)	44.5 (1.75)	2 (0.08)
SK6350-304	SK6350*	ISO63/NW50	50 (1.97)	95 (3.74)	75 (2.95)	57.0 (2.24)	3 (0.12)
SK1025-304	SK1025*	ISO100/NW25	50 (1.97)	130 (5.12)	40 (1.57)	28.0 (1.10)	2 (0.08)
SK1040-304	SK1040*	ISO100/NW40	50 (1.97)	130 (5.12)	55 (2.17)	44.5 (1.75)	2 (0.08)
SK1050-304	SK1050*	ISO100/NW50	50 (1.97)	130 (5.12)	75 (2.95)	57.0 (2.24)	3 (0.12)

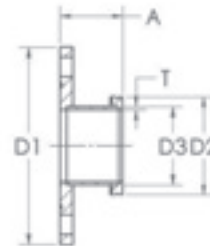
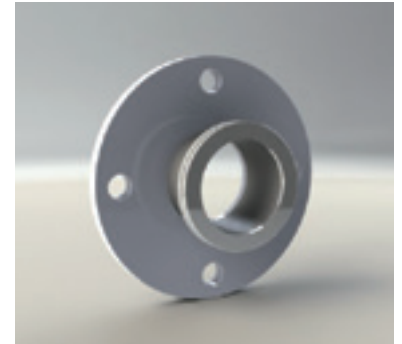
\*316L Stainless Steel



## ISO TO ASA **ADAPTOR** - STAINLESS STEEL

PART NUMBER		PNEUROP	A	D1	D2	D3	T
ISA632G-304	ISA632G*	ISO63/ASA2	106 (4.17)	152 (5.98)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISA802G-304	ISA802G*	ISO80/ASA2	106 (4.17)	152 (5.98)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISA1002G-304	ISA1002G*	ISO100/ASA2	106 (4.17)	152 (5.98)	130 (5.12)	108 (4.25)	3.0 (0.12)
ISA633G-304	ISA633G*	ISO63/ASA3	106 (4.17)	190 (7.48)	95 (3.74)	76 (2.99)	3.0 (0.12)
ISA803G-304	ISA803G*	ISO80/ASA3	106 (4.17)	190 (7.48)	110 (4.33)	89 (3.50)	5.5 (0.22)
ISA1003G-304	ISA1003G*	ISO100/ASA3	106 (4.17)	190 (7.48)	130 (5.12)	108 (4.25)	3.0 (0.12)

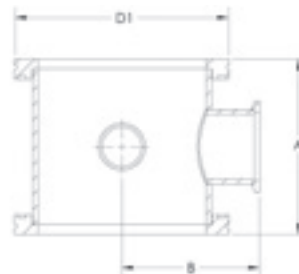
\*316L Stainless Steel



## ISO **STRAIGHT CONNECTOR WITH KF LATERAL PORTS** - STAINLESS STEEL.

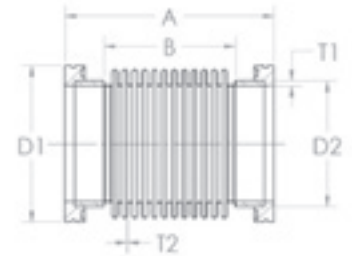
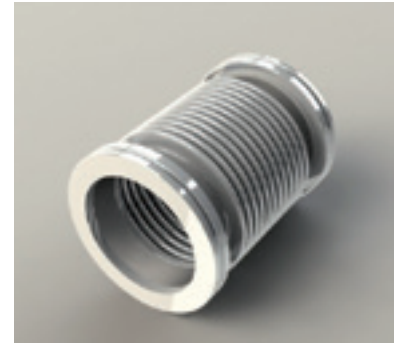
PART NUMBER		PNEUROP	A	B (NW16)	B (NW40)	D1
ISO63SC4016K-304	ISO63SC4016K*	ISO63/NW40/16	88 (3.46)	60 (2.36)	80 (3.15)	95 (3.74)
ISO100SC4016K-304	ISO100SC4016K*	ISO100/NW40/16	108 (4.25)	75 (2.95)	75 (2.95)	130 (5.12)
ISO160SC4016K-304	ISO160SC4016K*	ISO100/NW40/16	138 (5.43)	100 (3.94)	100 (3.94)	180 (7.09)

\*316L Stainless Steel



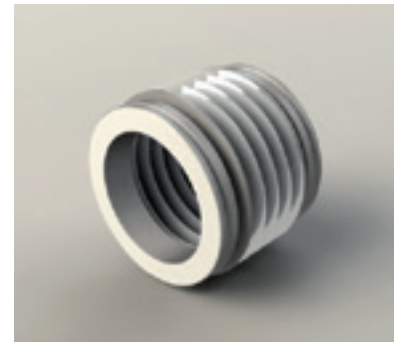
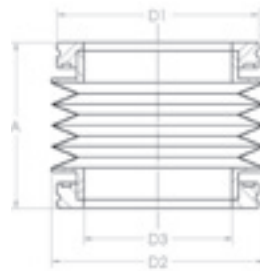
## ISO FLEXIBLE BELLOWS - STAINLESS STEEL

PART NUMBER	PNEUROP	A	B	D1	D2	T1	T2
ISO63FXB	ISO63	127 (5.00)	70 (2.76)	95 (3.74)	76 (2.99)	3 (0.12)	0.2 (0.01)
ISO80FXB	ISO80	127 (5.00)	70 (2.76)	110 (4.33)	89 (3.50)	3 (0.12)	0.2 (0.01)
ISO100FXB	ISO100	127 (5.00)	60 (2.36)	130 (5.12)	108 (4.25)	3 (0.12)	0.4 (0.02)
ISO160FXB	ISO160	220 (8.66)	112 (4.41)	180 (7.09)	159 (6.26)	3 (0.12)	0.4 (0.02)
ISO200FXB	ISO200	220 (8.66)	170 (6.69)	240 (9.45)	219 (8.62)	3 (0.12)	0.6 (0.02)



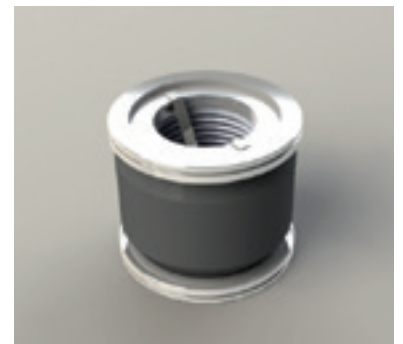
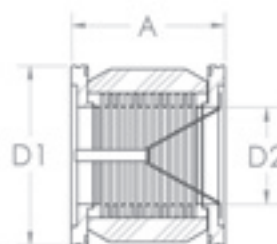
## ISO EDGE WELDED BELLOWS - STAINLESS STEEL

PART NUMBER	PNEUROP	Convolutions	Stroke	A	D1	D2	D3	Bellows ID
ISO63EWB	ISO63	11	30.8 (1.21)	100 (3.94)	95 (3.74)	100 (3.94)	70 (2.76)	75 (2.95)
ISO100EWB	ISO100	11	33.0 (1.30)	115 (4.53)	130 (5.12)	132 (5.2)	104 (4.09)	102 (4.02)
ISO160EWB	ISO160	13	44.2 (1.74)	140 (5.51)	180 (7.09)	185 (7.28)	153 (6.02)	150 (5.91)



## ISO VIBRATION ISOLATOR - STAINLESS STEEL

PART NUMBER	PNEUROP	A	D1	D2
ISO63VBD	ISO63	85 (3.35)	95 (3.74)	52 (2.05)
ISO100VBD	ISO100	85 (3.35)	130 (5.12)	76 (2.99)
ISO160VBD	ISO160	85 (3.35)	180 (7.09)	95 (3.74)





## ISO FLEXIBLE HOSE - STAINLESS STEEL

PART NUMBER	PNEUROP	A	B	D1	D2	T1	T2
ISO63FX25	ISO63	250 (9.84)	172 (6.77)	95 (3.74)	76 (2.99)	3 (0.12)	0.28 (0.011)
ISO63FX50	ISO63	500 (19.69)	422 (16.61)	95 (3.74)	76 (2.99)	3 (0.12)	0.28 (0.011)
ISO63FX75	ISO63	750 (29.53)	672 (26.46)	95 (3.74)	76 (2.99)	3 (0.12)	0.28 (0.011)
ISO63FX100	ISO63	1000 (39.37)	922 (36.30)	95 (3.74)	76 (2.99)	3 (0.12)	0.28 (0.011)
ISO80FX25	ISO80	250 (9.84)	166 (6.54)	110 (4.33)	89 (3.50)	3 (0.12)	0.28 (0.011)
ISO80FX50	ISO80	500 (19.69)	416 (16.38)	110 (4.33)	89 (3.50)	3 (0.12)	0.28 (0.011)
ISO80FX75	ISO80	750 (29.53)	666 (26.22)	110 (4.33)	89 (3.50)	3 (0.12)	0.28 (0.011)
ISO80FX100	ISO80	1000 (39.37)	916 (36.06)	110 (4.33)	89 (3.50)	3 (0.12)	0.28 (0.011)
ISO100FX25	ISO100	250 (9.84)	181 (7.13)	130 (5.12)	108 (4.25)	3 (0.12)	0.28 (0.011)
ISO100FX50	ISO100	500 (19.69)	431 (16.97)	130 (5.12)	108 (4.25)	3 (0.12)	0.28 (0.011)
ISO100FX75	ISO100	750 (29.53)	681 (26.81)	130 (5.12)	108 (4.25)	3 (0.12)	0.28 (0.011)
ISO100FX100	ISO100	1000 (39.37)	931 (36.65)	130 (5.12)	108 (4.25)	3 (0.12)	0.28 (0.011)
ISO160FX25	ISO160	250 (9.84)	170 (6.69)	180 (7.09)	159 (6.26)	3 (0.12)	0.38 (0.015)
ISO160FX50	ISO160	500 (19.69)	420 (16.54)	180 (7.09)	159 (6.26)	3 (0.12)	0.38 (0.015)
ISO160FX75	ISO160	750 (29.53)	670 (26.38)	180 (7.09)	159 (6.26)	3 (0.12)	0.38 (0.015)
ISO160FX100	ISO160	1000 (39.37)	920 (36.22)	180 (7.09)	159 (6.26)	3 (0.12)	0.38 (0.015)

