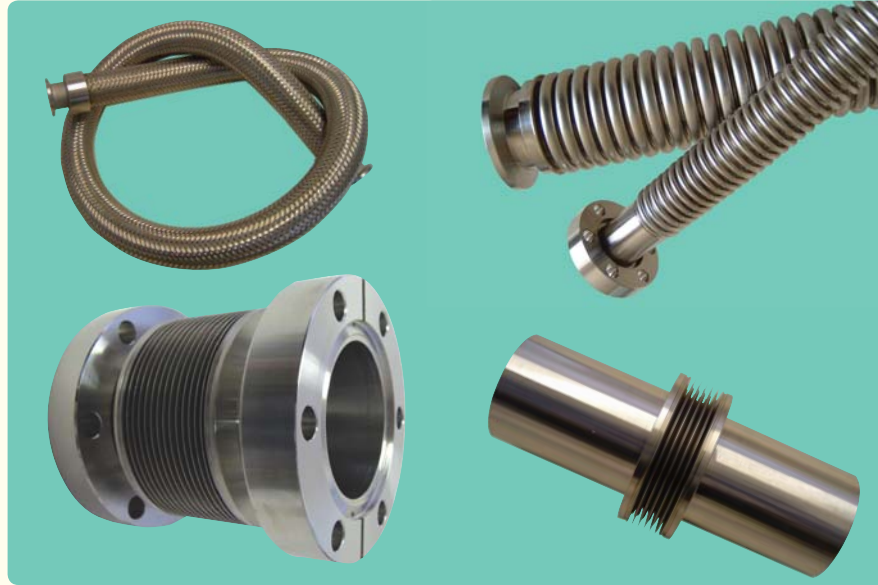


Bellows & Flexible Hoses



LewVac supplies flexible stainless steel hoses for use in applications where solid tube would not be practical or for purposes of vibration isolation. These hoses are manufactured from thin wall tube which is corrugated to allow flexing in all directions, along with a small amount of axial compression and extension. Also available are reinforced PVC hoses for backing or exhaust lines.

For applications which require greater flexibility, particularly axial compression and extension, LewVac offer a range of edge welded bellows. Edge welded bellows are manufactured from a series of formed metal diaphragms welded together, each diaphragm contributing to the overall extension allowable, so the more discs the greater the extension attainable and also the greater the lateral offset achievable.

Edge Welded Bellows



Specifications:

Material

Flanges 304 or 304L St.St.

Bellows 316L or AM350 St.St.

Temperature Range

316L -250°C to 450°C

AM350 -75°C to 450°C

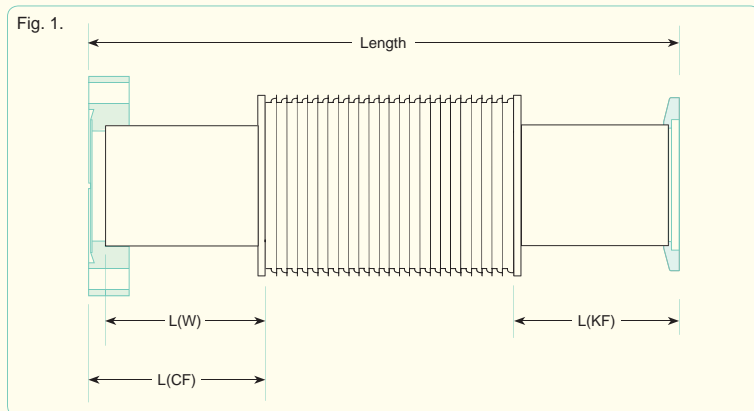
(May be limited by gasket / seal material)

Vacuum Range

CF flanged / weldable To below 1×10^{-11} TorrKF & LF flanged To below 1×10^{-8} Torr

Features:

- 316L stainless steel as standard for lower cycle requirement applications (typically 10,000 cycles).
- AM350 stainless steel also available for long lifetime (typically 1,000,000 cycles).
- Titanium, Inconel® or Hastelloy® available on request.
- Custom sizes and designs available upon request.



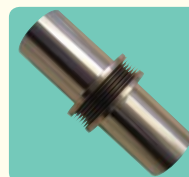
All dimensions are nominal in millimetres unless otherwise specified

DN16



Flange Type	Through Bore	Max Bellow OD	Stroke	Extended Length	Compressed Length	L	Part Code	Price £	Price €
CF	16.0	31.5	12.1	56.4	44.3	20.0	EWB16CF-12	POA	POA
CF	16.0	31.5	25.4	74.4	49.0	20.0	EWB16CF-25	POA	POA
CF	16.0	31.5	38.7	92.5	53.8	20.0	EWB16CF-38	POA	POA
CF	16.0	31.5	50.8	108.9	58.1	20.0	EWB16CF-50	POA	POA
CF	16.0	31.5	76.2	143.3	67.1	20.0	EWB16CF-76	POA	POA
KF	16.0	31.5	12.1	44.4	32.3	42.5	EWB16KF-12	POA	POA
KF	16.0	31.5	25.4	62.4	37.0	43.0	EWB16KF-25	POA	POA
KF	16.0	31.5	38.7	80.5	41.8	43.5	EWB16KF-38	POA	POA
KF	16.0	31.5	50.8	96.9	46.1	44.0	EWB16KF-50	POA	POA
KF	16.0	31.5	76.2	131.3	55.1	44.5	EWB16KF-76	POA	POA
Weldable	16.0	31.5	12.1	48.4	36.3	16.0	EWB16W-12	POA	POA
Weldable	16.0	31.5	25.4	66.4	41.0	16.0	EWB16W-25	POA	POA
Weldable	16.0	31.5	38.7	84.5	45.8	16.0	EWB16W-38	POA	POA
Weldable	16.0	31.5	50.8	100.9	50.1	16.0	EWB16W-50	POA	POA
Weldable	16.0	31.5	76.2	135.3	59.1	16.0	EWB16W-76	POA	POA

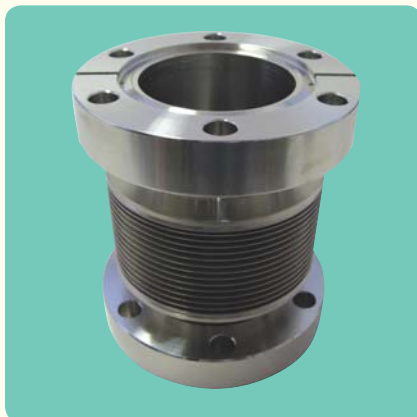
DN40



Flange Type	Through Bore	Max Bellow OD	Stroke	Extended Length	Compressed Length	L	Part Code	Price £	Price €
CF	38.4	59.0	12.0	74.6	62.6	30	EWB40CF-12	POA	POA
CF	38.4	59.0	26.0	91.7	65.7	30	EWB40CF-25	POA	POA
CF	38.4	59.0	38.0	106.4	68.4	30	EWB40CF-38	POA	POA
CF	38.4	59.0	50.0	121.0	71.0	30	EWB40CF-50	POA	POA
CF	38.4	59.0	76.0	152.7	76.7	30	EWB40CF-76	POA	POA
KF	38.4	59.0	12.0	44.6	32.6	15	EWB40KF-12	POA	POA
KF	38.4	59.0	26.0	61.7	35.7	15	EWB40KF-25	POA	POA
KF	38.4	59.0	38.0	76.4	38.4	15	EWB40KF-38	POA	POA
KF	38.4	59.0	50.0	91.0	41.0	15	EWB40KF-50	POA	POA
KF	38.4	59.0	76.0	122.7	46.7	15	EWB40KF-76	POA	POA
Weldable	38.4	59.0	12.0	64.0	52.0	24.7	EWB40W-12	POA	POA
Weldable	38.4	59.0	26.0	81.1	55.1	24.7	EWB40W-25	POA	POA
Weldable	38.4	59.0	38.0	95.8	57.8	24.7	EWB40W-38	POA	POA
Weldable	38.4	59.0	50.0	110.4	60.4	24.7	EWB40W-50	POA	POA
Weldable	38.4	59.0	76.0	142.1	66.1	24.7	EWB40W-76	POA	POA

All dimensions are nominal in millimetres unless otherwise specified

Edge Welded Bellows



Specifications:

Material

Flanges	304 or 304L St.St.
Bellows	316L or AM350 St.St.

Temperature Range

316L	-250°C to 450°C
AM350	-75°C to 450°C

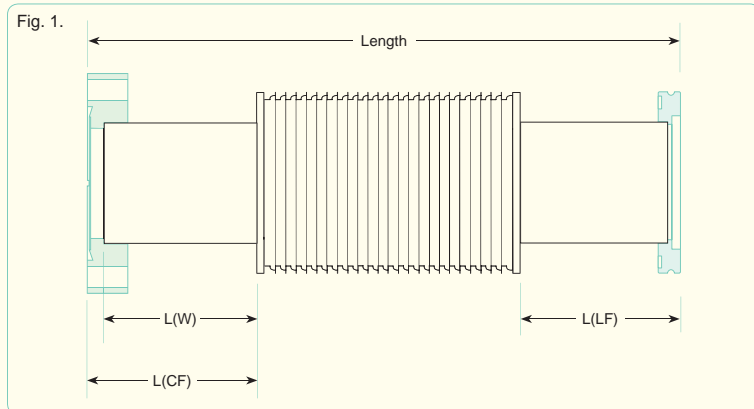
(May be limited by gasket / seal material)

Vacuum Range

CF flanged / weldable	To below 1×10^{-11} Torr
KF & LF flanged	To below 1×10^{-8} Torr

Features:

- 316L stainless steel as standard for lower cycle requirement applications (typically 10,000 cycles).
- AM350 stainless steel also available for long lifetime (typically 1,000,000 cycles).
- Titanium, Inconel® or Hastelloy® available on request.
- Custom sizes and designs available upon request.



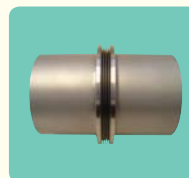
All dimensions are nominal in millimetres unless otherwise specified

DN63



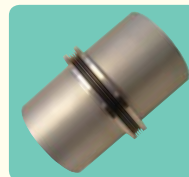
Flange Type	Through Bore	Max Bellow OD	Stroke	Extended Length	Compressed Length	L	Part Code	Price £	Price €
CF	65.0	90.0	12.7	86.2	73.5	35	EWB63CF-13	POA	POA
CF	65.0	90.0	25.5	102.5	77.0	35	EWB63CF-25	POA	POA
CF	65.0	90.0	38.3	118.8	80.5	35	EWB63CF-38	POA	POA
CF	65.0	90.0	51.0	135.0	84.0	35	EWB63CF-50	POA	POA
CF	65.0	90.0	76.5	167.5	91.0	35	EWB63CF-76	POA	POA
LF	65.0	90.0	12.7	86.2	73.5	35	EWB63LF-12	POA	POA
LF	65.0	90.0	25.5	102.5	77.0	35	EWB63LF-25	POA	POA
LF	65.0	90.0	38.3	118.8	80.5	35	EWB63LF-38	POA	POA
LF	65.0	90.0	51.0	135.0	84.0	35	EWB63LF-50	POA	POA
LF	65.0	90.0	76.5	167.5	91.0	35	EWB63LF-76	POA	POA
Weldable	65.0	90.0	12.7	67.2	54.5	25.5	EWB63W-12	POA	POA
Weldable	65.0	90.0	25.5	83.5	58.0	25.5	EWB63W-25	POA	POA
Weldable	65.0	90.0	38.3	99.8	61.5	25.5	EWB63W-38	POA	POA
Weldable	65.0	90.0	51.0	116.0	65.0	25.5	EWB63W-50	POA	POA
Weldable	65.0	90.0	76.5	148.5	72.0	25.5	EWB63W-76	POA	POA

DN100



Flange Type	Through Bore	Max Bellow OD	Stroke	Extended Length	Compressed Length	L	Part Code	Price £	Price €
CF	102.0	132.0	12.0	94.6	82.6	40	EWB100CF-12	POA	POA
CF	102.0	132.0	26.9	112.8	85.9	40	EWB100CF-25	POA	POA
CF	102.0	132.0	38.9	127.4	88.5	40	EWB100CF-38	POA	POA
CF	102.0	132.0	51.0	142.0	91.0	40	EWB100CF-50	POA	POA
CF	102.0	132.0	78	174.9	96.9	40	EWB100CF-76	POA	POA
LF	102.0	132.0	12.0	94.6	82.6	40	EWB100LF-12	POA	POA
LF	102.0	132.0	26.9	112.8	85.9	40	EWB100LF-25	POA	POA
LF	102.0	132.0	38.9	127.4	88.5	40	EWB100LF-38	POA	POA
LF	102.0	132.0	51.0	142.0	91.0	40	EWB100LF-50	POA	POA
LF	102.0	132.0	78	174.9	96.9	40	EWB100LF-76	POA	POA
Weldable	102.0	132.0	12.0	72.4	60.4	28.9	EWB100W-12	POA	POA
Weldable	102.0	132.0	26.9	90.6	63.7	28.9	EWB100W-25	POA	POA
Weldable	102.0	132.0	38.9	105.2	66.3	28.9	EWB100W-38	POA	POA
Weldable	102.0	132.0	51.0	119.8	68.8	28.9	EWB100W-50	POA	POA
Weldable	102.0	132.0	78	152.7	74.7	28.9	EWB100W-76	POA	POA

DN160



Flange Type	Through Bore	Max Bellow OD	Stroke	Extended Length	Compressed Length	L	Part Code	Price £	Price €
CF	150.0	185.0	27.2	123.2	96.0	45.0	EWB160CF-25	POA	POA
LF	150.0	185.0	27.2	123.2	96.0	45.0	EWB160LF-25	POA	POA
Weldable	150.0	185.0	27.2	97.8	70.6	32.3	EWB160W-25	POA	POA

All dimensions are nominal in millimetres unless otherwise specified

Formed Bellows - Weldable



Specifications:

Material

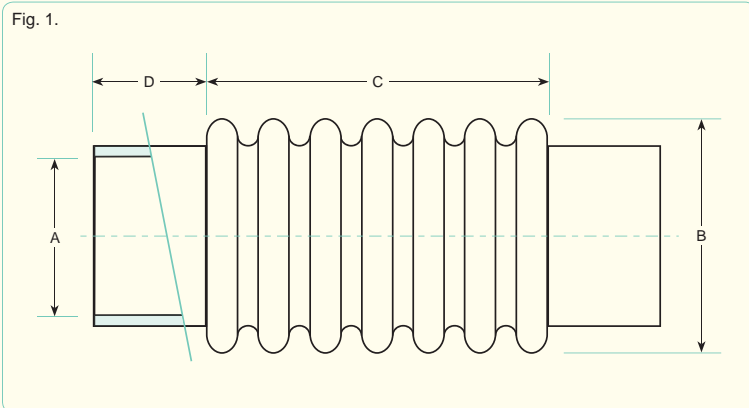
321 St.St.

Temperature Range

-250°C to 450°C

Features:

- Type 321 stainless steel as standard.
- Highly flexible.
- Flanged versions available upon request.
- Custom sizes and designs available upon request.



Weldable Formed Bellows



A	B	C	D	Wall Thickness	Axial Deflection +/-	Part Code	Price £	Price €
6.35	9.40	25.40	12.70	0.13	+2.54 / -6.35	FL-FB6.35	POA	POA
7.93	11.68	25.40	12.70	0.13	+2.54 / -6.35	FL-FB7.93	POA	POA
9.52	14.48	38.10	12.70	0.13	+3.81 / -9.40	FL-FB9.52	POA	POA
12.70	19.05	38.10	12.70	0.15	+3.81 / -9.40	FL-FB12.70	POA	POA
15.87	22.10	38.10	12.70	0.15	+3.81 / -9.40	FL-FB15.87	POA	POA
19.05	26.42	38.10	12.70	0.15	+3.81 / -9.40	FL-FB19.05	POA	POA
22.22	31.75	50.80	12.70	0.15	+5.08 / -12.70	FL-FB22.22	POA	POA
25.40	34.80	50.80	19.05	0.15	+5.08 / -12.70	FL-FB25.40	POA	POA
28.57	37.08	50.80	19.05	0.15	+5.08 / -12.70	FL-FB28.57	POA	POA
31.75	40.64	50.80	19.05	0.15	+5.08 / -12.70	FL-FB31.75	POA	POA
34.92	45.97	50.80	19.05	0.15	+5.08 / -12.70	FL-FB34.92	POA	POA
38.10	48.26	50.80	19.05	0.15	+5.08 / -12.70	FL-FB38.10	POA	POA
41.27	52.07	50.80	19.05	0.15	+5.08 / -12.70	FL-FB41.27	POA	POA
44.45	56.90	50.80	19.05	0.15	+5.08 / -12.70	FL-FB44.45	POA	POA
50.80	63.25	63.50	19.05	0.15	+6.35 / -15.24	FL-FB50.80	POA	POA
57.15	71.37	63.50	19.05	0.15	+6.35 / -15.24	FL-FB57.15	POA	POA
63.50	75.69	63.50	19.05	0.15	+6.35 / -15.24	FL-FB63.50	POA	POA
76.20	95.76	76.20	25.40	0.20	+7.62 / -19.05	FL-FB76.20	POA	POA
88.90	109.2	88.90	25.40	0.20	+8.89 / -22.10	FL-FB88.90	POA	POA
101.6	121.4	101.6	25.40	0.20	+10.16 / -25.40	FL-FB101.6	POA	POA
114.3	134.1	101.6	25.40	0.20	+10.16 / -25.40	FL-FB114.3	POA	POA
127.0	146.1	127.0	25.40	0.20	+12.7 / -31.75	FL-FB127.0	POA	POA
152.4	174.0	127.0	31.75	0.25	+12.7 / -31.75	FL-FB152.4	POA	POA
203.2	235.0	152.4	31.75	0.51	+15.25 / -38.10	FL-FB203.2	POA	POA
254.0	287.3	152.4	31.75	0.51	+15.25 / -38.10	FL-FB254.0	POA	POA
304.8	352.6	152.4	31.75	0.51	+15.25 / -38.10	FL-FB304.8	POA	POA

- Through ID of bellows is approximately 95% of cuff ID.
- Axial deflection is approximately +10% and -25% of length, C.
- Lateral deflection is approximately 10% of length, C.

Please note : A minimum order quantity may apply to some of these items. Please contact our sales office for further details.

Flexible Hoses



Specifications:

Material

304 St.St.

Temperature Range

CF flanged -250°C to 450°C

KF flanged -20°C to 150°C (200°C*)

Vacuum Range

CF flanged To below 1×10^{-11} TorrKF flanged To below 1×10^{-8} Torr

* - Increased upper limit for intermittent use.

Features:

- 304 stainless steel as standard.
- Highly flexible.
- Custom sizes and designs available upon request.

Fig. 1.

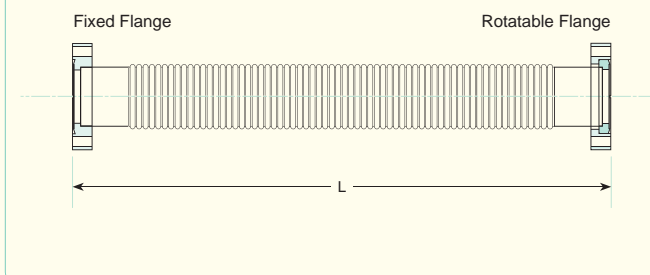
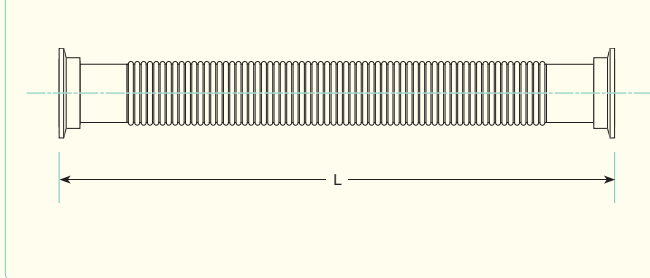


Fig. 2.



All dimensions are nominal in millimetres unless otherwise specified

CF Flanged Hoses



Braided flexible hoses are also available, please contact sales office for details.

Flange	Fig.	Bend Rad.	L	Part Code	Price £	Price €
DN16CF	1	60	250	FL-H250-16CF	£59	€74
DN16CF	1	60	500	FL-H500-16CF	£64	€80
DN16CF	1	60	750	FL-H750-16CF	£68	€85
DN16CF	1	60	1000	FL-H1000-16CF	£73	€92
DN40CF	1	115	500	FL-H500-40CF	£89	€112
DN40CF	1	115	750	FL-H750-40CF	£96	€120
DN40CF	1	115	1000	FL-H1000-40CF	£102	€128
DN63CF	1	150	500	FL-H500-63CF	£233	€292
DN63CF	1	150	750	FL-H750-63CF	£251	€314
DN63CF	1	150	1000	FL-H1000-63CF	£269	€337
DN100CF	1	275	500	FL-H500-100CF	£307	€384
DN100CF	1	275	750	FL-H750-100CF	£332	€415
DN100CF	1	275	1000	FL-H1000-100CF	£358	€448
DN160CF	1	275	500	FL-H500-160CF	£453	£567
DN160CF	1	275	750	FL-H750-160CF	£502	€628
DN160CF	1	275	1000	FL-H1000-160CF	£551	€689

KF Flanged Hoses



Braided flexible hoses are also available, please contact sales office for details.

Flange	Fig.	Bend Rad.	L	Part Code	Price £	Price €
DN10KF	2	60	250	FL-H250-10KF	£32	€40
DN10KF	2	60	500	FL-H500-10KF	£35	€44
DN10KF	2	60	750	FL-H750-10KF	£38	€48
DN10KF	2	60	1000	FL-H1000-10KF	£42	€53
DN10KF	2	60	1500	FL-H1500-10KF	£58	€73
DN10KF	2	60	2000	FL-H2000-10KF	£65	€829
DN16KF	2	60	250	FL-H250-16KF	£31	€39
DN16KF	2	60	500	FL-H500-16KF	£36	€45
DN16KF	2	60	750	FL-H750-16KF	£42	€53
DN16KF	2	60	1000	FL-H1000-16KF	£47	€59
DN16KF	2	60	1500	FL-H1500-16KF	£52	€65
DN16KF	2	60	2000	FL-H2000-16KF	£59	€74
DN25KF	2	68	250	FL-H250-25KF	£33	€42
DN25KF	2	68	500	FL-H500-25KF	£38	€48
DN25KF	2	68	750	FL-H750-25KF	£43	€54
DN25KF	2	68	1000	FL-H1000-25KF	£50	€63
DN25KF	2	68	1500	FL-H1500-25KF	£57	€72
DN25KF	2	68	2000	FL-H2000-25KF	£65	€82
DN40KF	2	115	250	FL-H250-40KF	£41	€52
DN40KF	2	115	500	FL-H500-40KF	£49	€62
DN40KF	2	115	750	FL-H750-40KF	£58	€73
DN40KF	2	115	1000	FL-H1000-40KF	£67	€84
DN40KF	2	115	1500	FL-H1500-40KF	£76	€95
DN40KF	2	115	2000	FL-H2000-40KF	£85	€107
DN50KF	2	125	250	FL-H250-50KF	£59	€74
DN50KF	2	125	500	FL-H500-50KF	£71	€89
DN50KF	2	125	750	FL-H750-50KF	£83	€104
DN50KF	2	125	1000	FL-H1000-50KF	£91	€114
DN50KF	2	125	1500	FL-H1500-50KF	£99	€124
DN50KF	2	125	2000	FL-H2000-50KF	£107	€134

All dimensions are nominal in millimetres unless otherwise specified

Flexible Hoses



Specifications:

Material

304 St.St.

Temperature Range

-20°C to 150°C (200°C*)

Vacuum Range

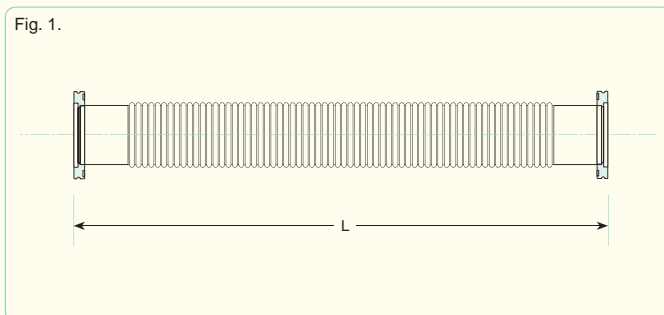
To below 1×10^{-8} Torr

* - Increased upper limit for intermittent use.

Features:

- 304 stainless steel as standard.
- Highly flexible.
- Custom sizes and designs available upon request.

Fig. 1.



LF Flanged Hoses



Braided flexible hoses are also available, please contact sales office for details.

Flange	Bend Rad.	L	Part Code	Price £	Price €
DN63LF	150	500	FL-H500-63LF	£105	€132
DN63LF	150	750	FL-H750-63LF	£130	€163
DN63LF	150	1000	FL-H1000-63LF	£138	€173
DN63LF	150	2000	FL-H2000-63LF	£202	€253
DN100LF	275	125	FL-H125-100LF	£108	€135
DN100LF	275	250	FL-H250-100LF	£113	€142
DN100LF	275	500	FL-H500-100LF	£156	€195
DN100LF	275	750	FL-H750-100LF	£166	€208
DN100LF	275	1000	FL-H1000-100LF	£166	€208
DN160LF	275	500	FL-H500-160LF	£247	€309
DN160LF	275	750	FL-H750-160LF	£289	€362
DN160LF	275	1000	FL-H1000-160LF	£332	€415

