



# Hamworthy Masterflue MF system

Fully Welded, Pressure Rated  
Stainless Steel, Twin Wall  
Flue & Chimney System



Heating *at work.*

# Masterflue MF system

Fully Welded, Stainless Steel  
Negative or Positive  
Pressure Rated Systems

The commercial heating industry is experiencing a drive towards the use of high efficiency and condensing products, which is creating demand for leak-free flues that are more suitable for high volumes of condensate.

Specifically optimised for condensing and high efficiency boiler applications, the Hamworthy Masterflue MF system is a modular, twin walled, insulated flue solution, constructed in stainless steel, so no problem with internal or external corrosion even if flue gases are acidic. Being fully welded means watertight and gastight performance, so no leaking of flue gases or condensate in to the surrounding area. The Masterflue MF range has an easy push fit build, eliminating the need to apply additional sealants. This removes any dependence on the quality of an applied sealant joint, and eliminates the waiting time previously needed for the mastic joint to dry. Ultimately these features reduce the time needed for installation and guarantee a perfect joint every time.

- **Leak-free design**
- **Deals with high levels on condensate**
- **High corrosion resistance**
- **No thermal bridging at joints**
- **Factory fitted seals, easy to assemble**
- **Handles thermal expansion**
- **Reduced installation time**

BENEFITS

**The trend towards condensing and high efficiency boilers demands flue systems that can handle large volumes of condensate in pressurised systems, and stay leak-free.**

The MF system incorporates a tri-lip silicone seal which adds to the prevention of leaking flue gases or condensate from the joints.



# Specification

## Masterflue MF

A flue system suitable for gas and oil fired appliances, the Masterflue MF range of components offers a comprehensive solution to most plant installations.

The Masterflue MF range of components is particularly suited to modern high efficiency and condensing boilers, where high levels of condensate are produced, and needs to be drained away from the system safely, without any risk of leakage.

### Construction

Masterflue MF is a metal prefabricated modular flue and chimney system, manufactured in stainless steel with twin wall construction using 316L grade on the inner wall and 304 grade on the outer.

The MF construction combines strength, weight and efficiency to optimum effect. The inner wall thickness is kept to a minimum to reduce the amount of heat lost from the flue gases in heating up the metal, ensuring the flue reaches operating temperature as quickly as possible.

On flue components up to 250mm diameter the inner wall thickness is 0.4mm and on larger components increases to 0.5mm.

The outer wall thickness on all sizes is 0.6mm, providing additional strength whilst retaining lightweight for ease of support and installation.

### Tri-Lip Seal Joints

All joints in the MF range of components are male/female push-fit spigot/socket design incorporating a silicone sealing ring that has three lip bands to provide a leak proof, high temperature seal, impervious to water and vapour.

Locking bands are supplied with each component as standard to complete the joint.

### Temperatures

The Hamworthy Masterflue MF range of components is designed for continuous operating temperatures up to 550°C in a negative pressure systems and up to 250°C in positive pressure systems. The system can operate at higher temperatures, up to 1000°C for short firing periods, up to 30 minutes.

### Insulation

The twin wall system is insulated with water repellent Rockwool which is 25 mm thick on components up to 400 mm diameter and 37.5 mm thick on larger diameters, and both ends of the insulation gap are covered to retain the insulation material. Rockwool is used with a density of at least 150kg/m<sup>3</sup> loose fibres to create continuous insulation without gaps.

### 4 Hour Fire Rating

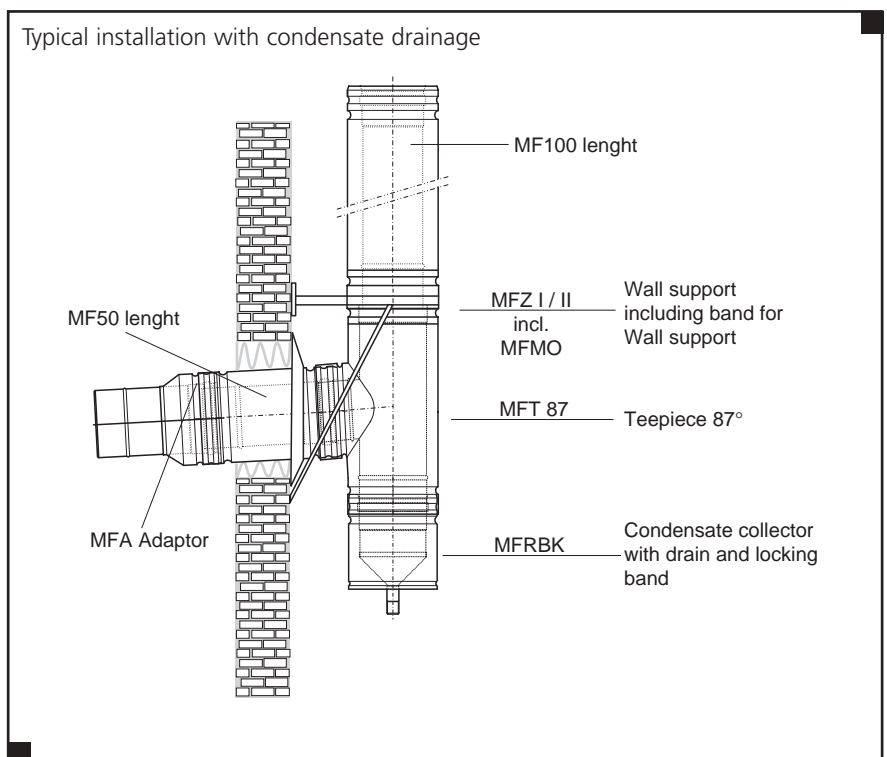
A four-hour fire rating has been awarded to the MF system, meaning it can be installed through a fire compartment wall.

### Drainage of Condensate

Like most standard flue ranges, the Masterflue MF includes 90 and 45 degrees elbows and tees, but in addition the MF system includes 87 and 43 degrees alternatives to create the advantage of a 3 degrees drainage slope, which enables condensate to run back to a suitable drain point, preventing a build up in the flue and simplifying the component installation with easier alignment.

### Supports & Fixings

In practice, walls and supporting structures are often built less than perfect, so the MF range includes adjustable wall brackets, which accommodate misalignments in the horizontal and vertical planes, enabling fast installation and a neat finish.



# Technical Details

## Masterflue MF

Applications		Chimney / Flue system
Operating mode		Dry / wet
Pressure		Negative / positive pressure
Max. working pressure		1000 Pa
Operating temperature		550°C (neg. pressure), 200°C (pos. pressure)
Max temperature for short firing		1000°C + 50°C (max 30 min), 250°C (pos.pressure)
Inner Wall:	material	316 grade stainless steel
	thickness	≤ 250 DIA, 0.4mm ≥300 DIA, 0.5mm
Outer Wall:	material	304 grade stainless steel
	thickness	0,6mm
Insulation	type	Rockwool
	thickness	25mm up to 400mm DIA Components
	thickness	37.5mm over 400mm DIA Components
Sealant		Elastomeer
Fuel type		Gas / Oil

Inner diameter	mm	100	130	150	180	200	250	300	350	400	450	500	600
Cross section	cm <sup>2</sup>	79	133	177	254	814	488	706	962	1256	1590	1963	2826
Outer diameter	mm	150	180	200	230	250	300	350	400	450	525	575	675
Weight	kg/m	4.3	5.3	6.0	7.0	7.6	9.4	11.9	14.8	19.1	22.8	25.1	29.8

### Condensing Boilers

Single or Twin Wall Flue?

Whilst some manufacturers may advocate the use of single wall flues for condensing boilers, there are certain factors that must be guaranteed for such a flue to work consistently and safely under all load conditions.

The boiler must only ever operate at condensing temperatures to maintain safe external surface temperatures on the flue.

The flue system must retain what little temperature is left in the flue gases, to support buoyancy in the flue.

Twin wall insulated flues will retain temperature in the flue gases and ensure a safe external temperature on the flue at all times.

The Hamworthy MF range of components is fully compatible with the Masterflue ME range, which is a fully welded single wall flue system, allowing twin wall and single wall systems to be linked where the design can benefit from such a feature.

Using this technique, it may be possible to construct a combined single and twin wall flue system to satisfy the requirements of a condensing system, and reducing the cost on long flue runs.

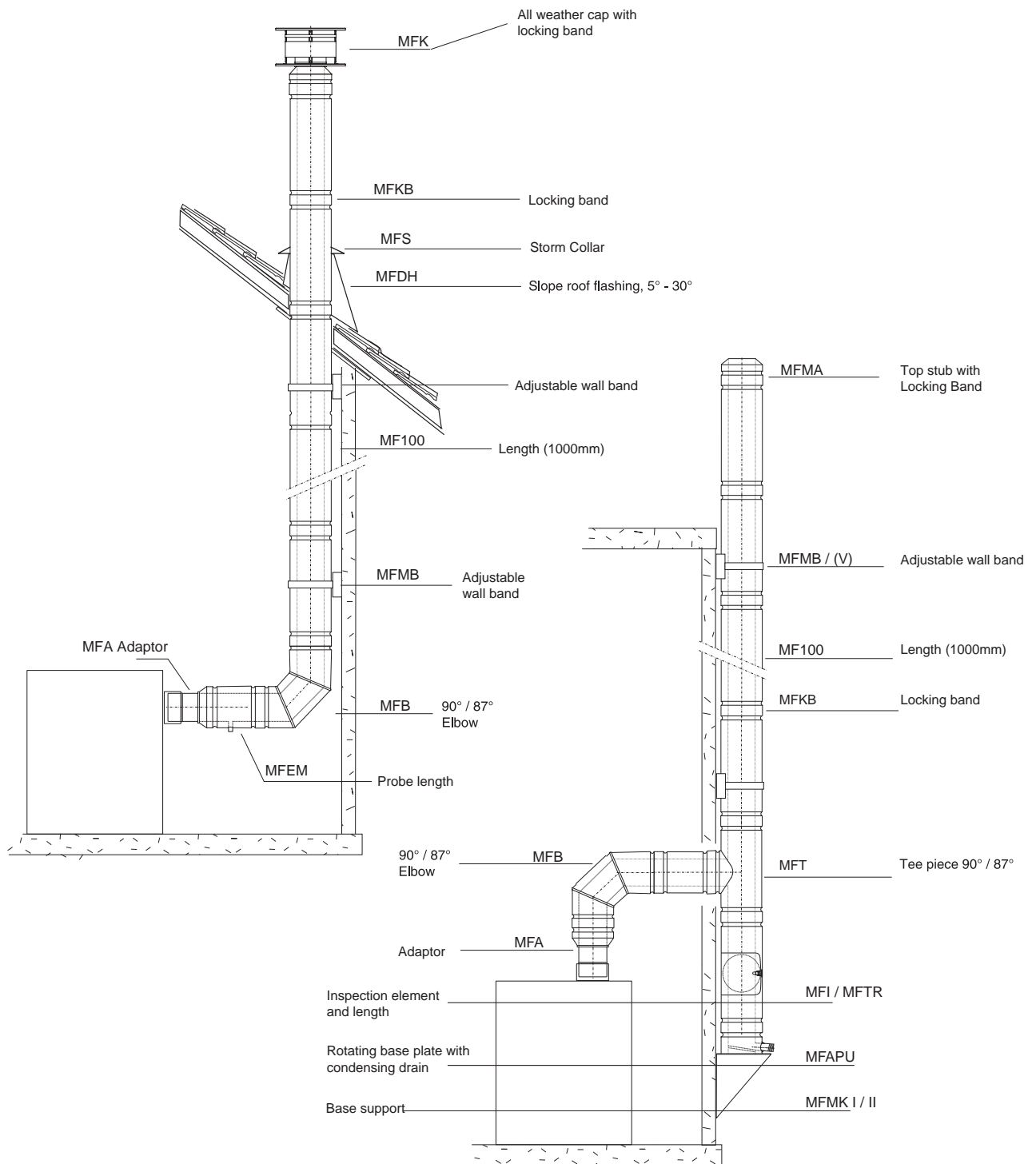
### CE Mark

British Standards for flues are being superseded by new European Standards under the Construction Products Directive and the harmonised norm for metal chimney systems is BS EN 1856-1:2003 Requirements for metal chimneys - part 1: System chimney products.

The Masterflue MF range has a European Certificate and bears the CE mark, the customers assurance of conformity with European Standards and requirements of the marketplace.

# Typical Installations

Masterflue MF



# Support & Load bearing data

Masterflue MF system

Support and load bearing (m)							
	A	B	C		D		
∅		MFZ	MFMB/V	MFMB	MFMB/SV	MFMB/V	MFMB
100	18	30	3	3	3	2	1.5
130	18	30	3	3	3	2	1.5
150	18	30	3	3	3	2	1.5
180	17	25	3	3	3	2	1.5
200	17	25	3	3	3	2	1.5
250	15	20	3	3	3	2	1.5
300	14	15	2	2	3	2	1.5
350	13	15	2	2	3	2	1.5
400	12	12	2	2	3	2	1.5
∅		SMD+MFMO	MFMB/V	MFMB	MFMB/V	MFMB	
450	12	13	4	2	2	1.5	
500	11	12	4	2	2	1.5	
600	10	10	4	2	2	1.5	

A - Maximum supportable height above tee piece when chimney is supported by the wall support at base.

B - Maximum supportable height that can be borne by the wall support.

C - Maximum distance between lateral supports i.e. wall bands and wall supports.

D - Maximum permitted free standing height above last support.

Selection table for supports MF 100 - 400					
Adjustment	50-90	50-200		50-400	
Wall band	MFMB	MFMB/V 1 MFMB/V 2	50-100 150-200	MFMB/V 3 MFMB/V 4	250-300 200-400
Wall support	MFZ 1 incl. MFMO	MFZ 1 incl. MFMO	-200	MFZ 2 incl. MFMO	-400
Wall band above last support		MFMB/SV 1 MFMB/SV 2 incl. MFSK (2X)	50-100 150-200	MFMB/SV 3 MFMB/SV 3 incl. MFSK (2X)	250-300 200-400
Wall support	MFMK 1 + MFAPU	MFMK 1 + MFAPU	50-200	MFMK 2 + MFAPU	50-400

Selection table for supports MF 450-600							
Diameter	Type of wallband	Adjustable distance wall-chimney (mm)					Max. allowed height on supports (m.)
		50 - 90	50 - 100	100 - 200	200 - 300	300 - 400	
450	MFMB	S MD0399					13
	MFMBV1		S MD0399				
	MFMBV2			S MD0599			
	MFMBV3				S MD0899		
	MFMBV4					S MD1199	
500	MFMB	S MD0499					12
	MFMBV1		S MD0499				
	MFMBV2			S MD0699			
	MFMBV3				S MD0999		
	MFMBV4					S MD1299	
600	MFMB	S MD0599					10
	MFMBV1		S MD0599				
	MFMBV2			S MD0799			
	MFMBV3				S MD1099		
	MFMBV4					S MD1399	

## Wall Supports SMD:

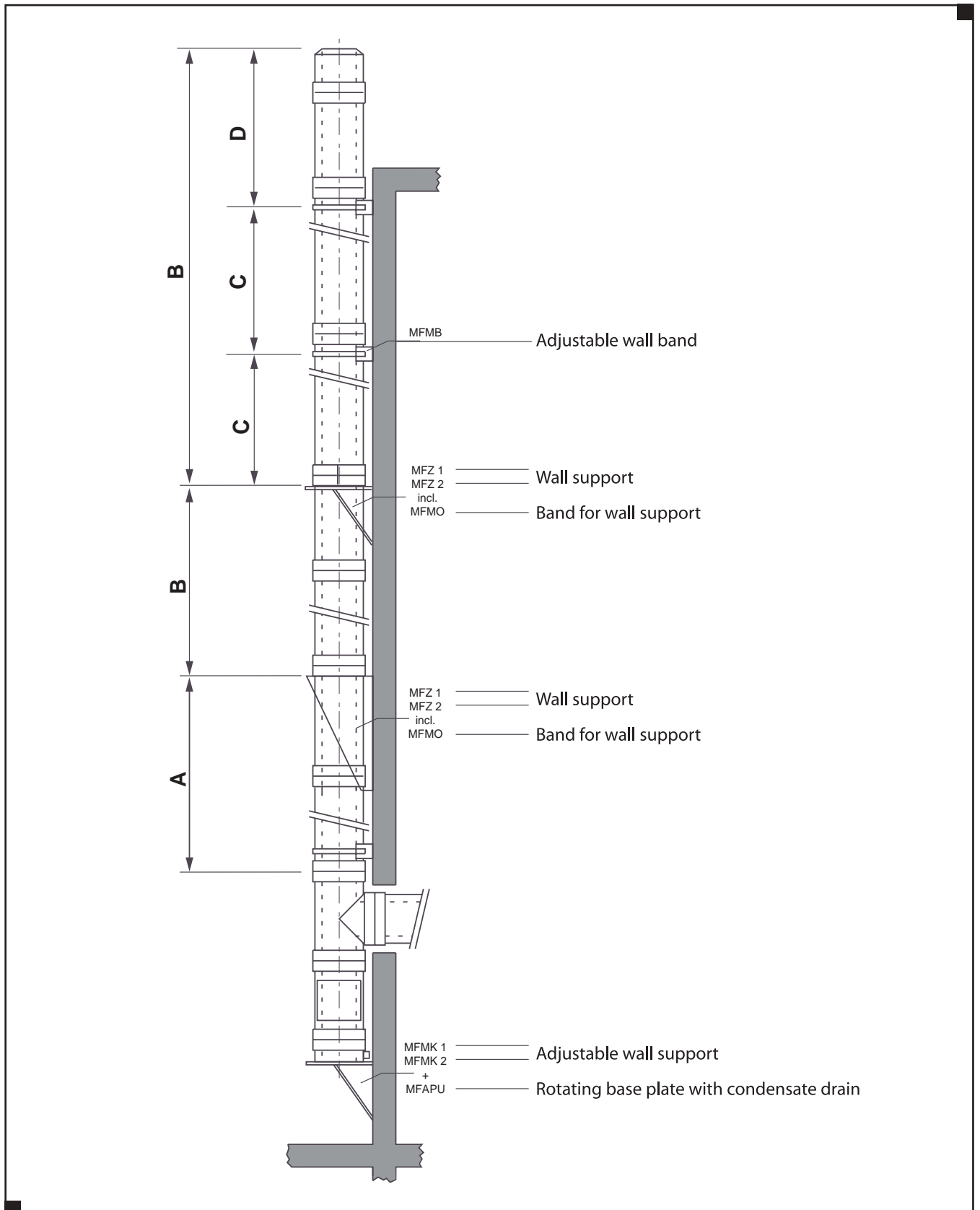
The wall support SMD comes in various sizes, depending on the chimney diameter and the required distance to the wall. The supports come as a pair, and can be used in combination with matching wall bands MFMB - MFMBV.

The selection table to the left can be used to determine the correct wall support and matching wall band. This table also indicates the maximum allowed height in metres on a support.

Please see page 24 for further details on this component.

# Installation Dimensions

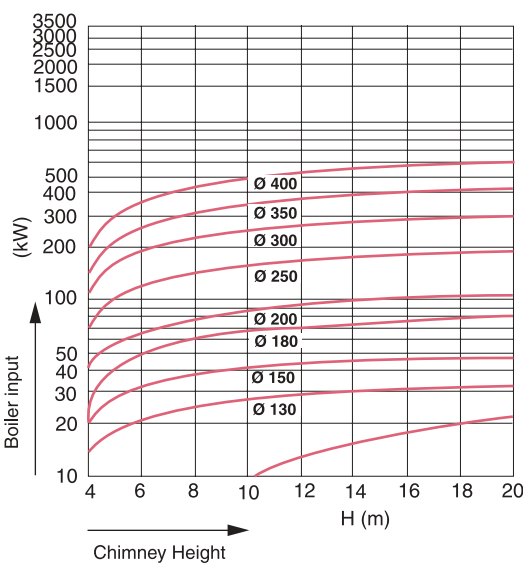
Masterflue MF system



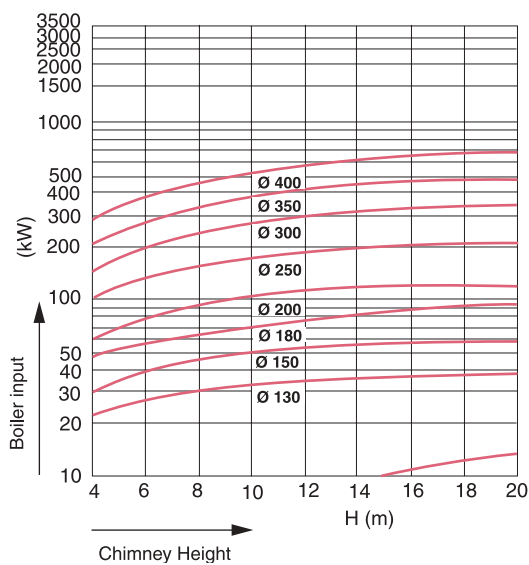
# Guide to Flue Capacity

Masterflue MF: Typical Atmospheric Appliance Application

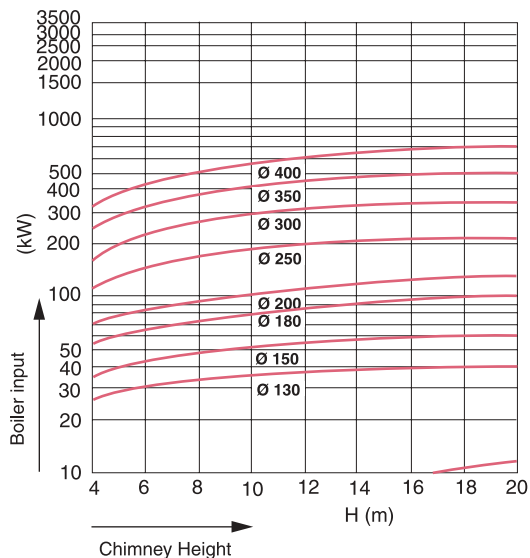
Gas negative pressure appliance  
80°C, negative pressure 3 Pa  
CO<sub>2</sub> 6%  
Ø = mm



Gas negative pressure appliance  
110°C, negative pressure 3 Pa  
CO<sub>2</sub> 6%  
Ø = mm



Gas negative pressure appliance  
130°C, negative pressure 3 Pa  
CO<sub>2</sub> 6%  
Ø = mm



The performance of a flue system is influenced by factors including boiler input (kW), flue gas temperature, flue pressure conditions and flue diameter.

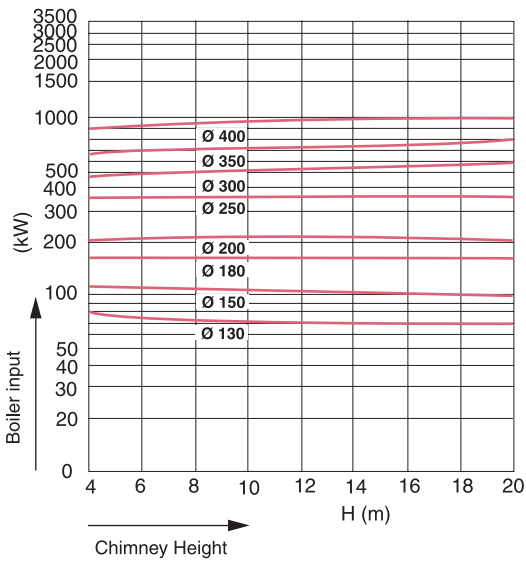
These charts show the effect flue gas temperatures and pressure have on the capacity of the flue throughput. As flue gas temperatures increase, the capacity to handle kW throughput increases, due to the improved buoyancy conditions.

For example, the chart on the left shows an atmospheric appliance of 200kW having a secondary flue gas temperature of 130°C, entering a 14m high flue, would require a flue diameter of 250 mm.

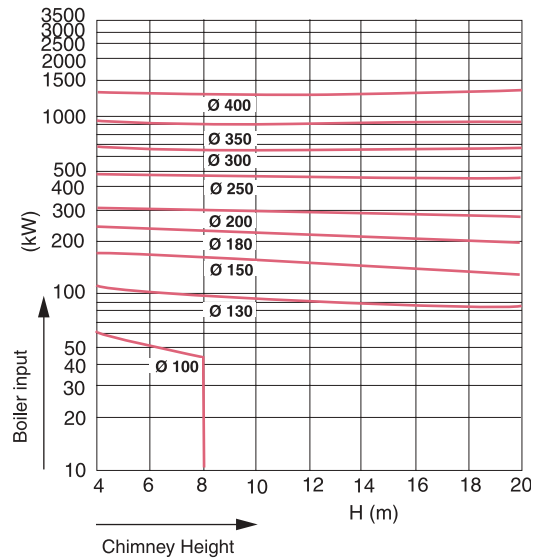
# Guide to Flue Capacity

Masterflue MF: Typical Condensing Fanned Appliance Application

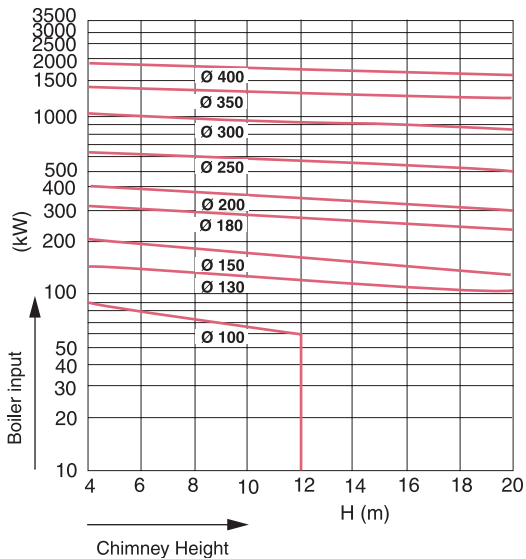
Gas, positive pressure appliance  
 30°C, positive pressure 10 Pa  
 CO<sub>2</sub> 10%  
 Ø = mm



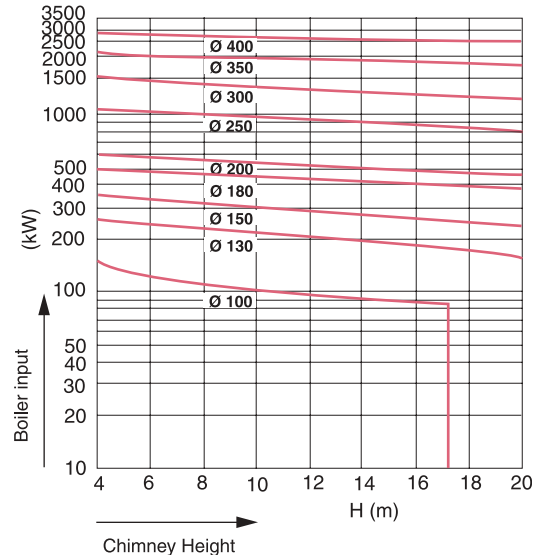
Gas, positive pressure appliance  
 30°C, positive pressure 20 Pa  
 CO<sub>2</sub> 10%  
 Ø = mm



Gas, positive pressure appliance  
 30°C, positive pressure 40 Pa  
 CO<sub>2</sub> 10%  
 Ø = mm



Gas, positive pressure appliance  
 30°C, positive pressure 100 Pa  
 CO<sub>2</sub> 10%  
 Ø = mm

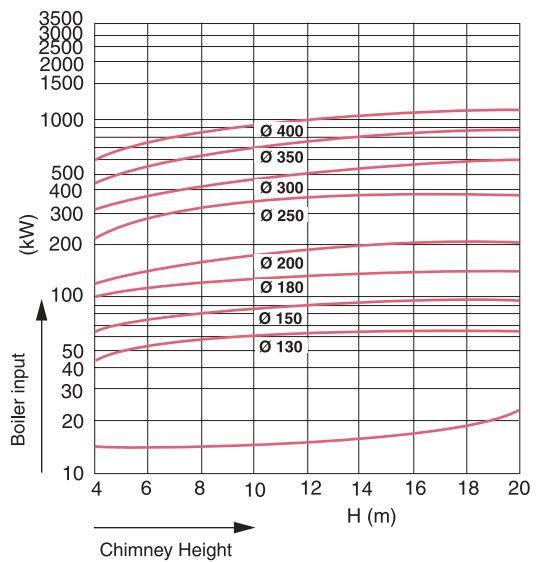
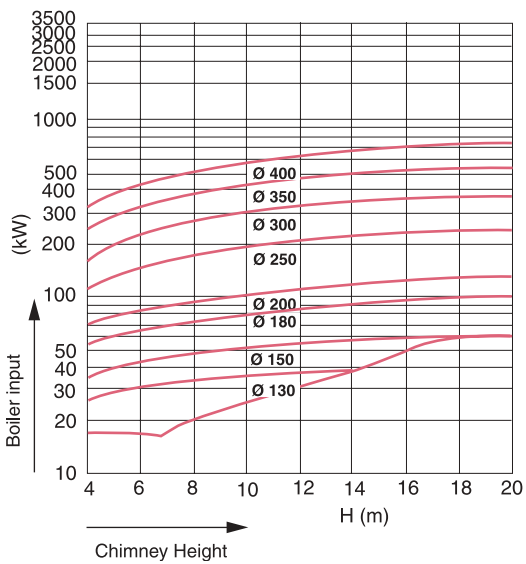


# Guide to Flue Capacity

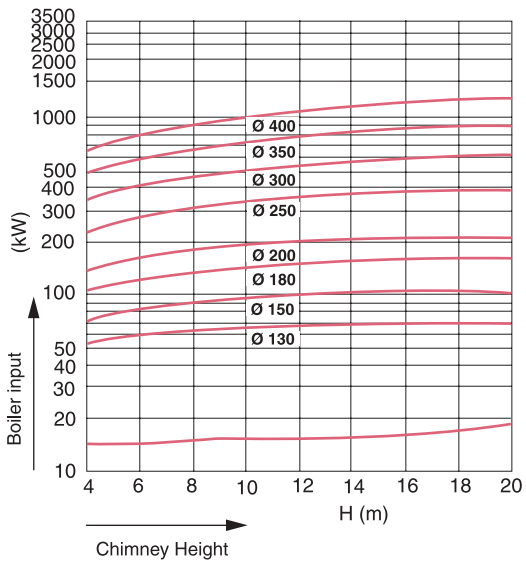
Masterflue MF: Typical High Efficiency Pre-Mix, Pressure Jet Appliance Application

Gas / Oil, positive pressure appliance  
 60°C, pressure 0 Pa  
 CO<sub>2</sub>: 10% / 13.5%  
 Ø = mm

Gas / Oil, positive pressure appliance  
 120°C, pressure 20 Pa  
 CO<sub>2</sub>: 10% / 13.5%  
 Ø = mm

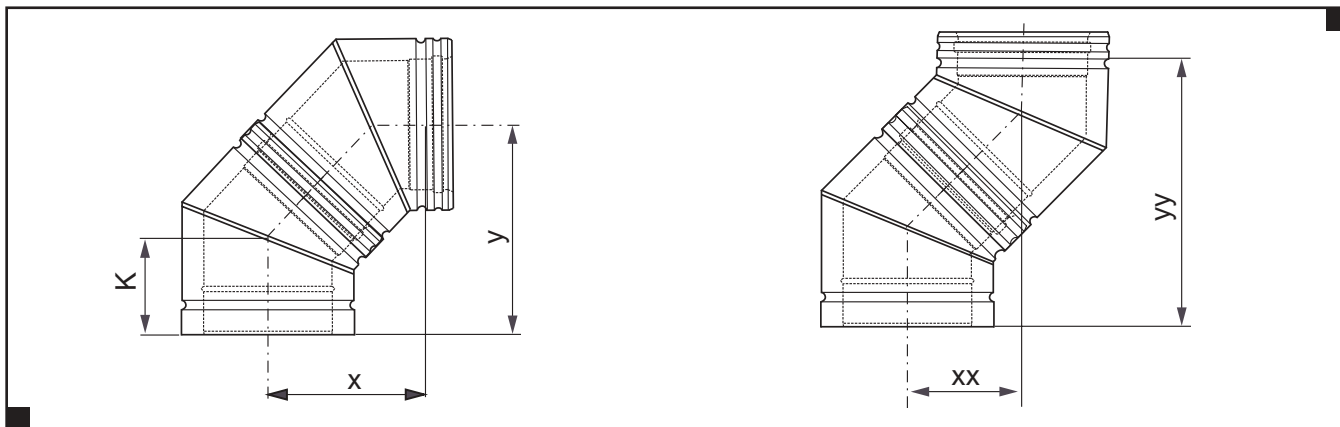


Gas / Oil, positive pressure appliance  
 160°C, positive pressure 0 Pa  
 CO<sub>2</sub>: 10% / 13.5%  
 Ø = mm



# Flue offset data

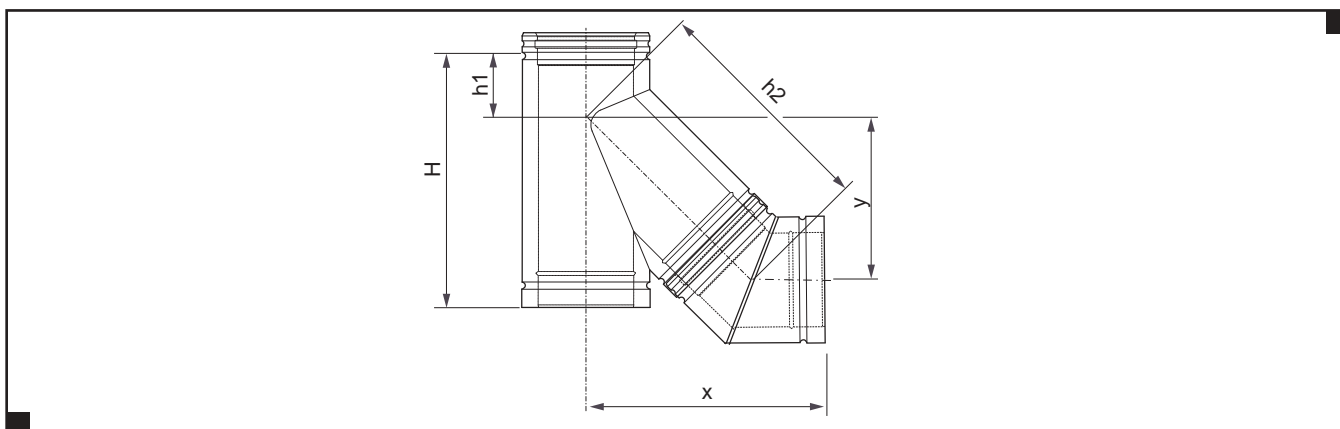
Masterflue MF System



Approximate mixed, hot and cold capacities of appliances in normal use.  
Cold water 10°C (50°F), hot water 60°C (140°F), mixed water 40°C (104°F)

## 2 MFB 45°

ÿ	100	130	150	180	200	250	300	350	400	450	500	600
K	88	93	98	103	108	118	143	143	153	175	185	206
x	151	163	176	187	199	223	284	284	308	422	446	497
y	187	199	212	223	235	259	320	320	344	422	446	497
xx	99	106	113	120	127	141	177	177	191	247	261	291
yy	239	256	273	290	307	341	427	427	461	597	631	703



## MFT 45° + MFB 45°

ÿ	130	150	180	200	250	300	350	400	450	500	600
H	400	400	450	500	600	700	750	850	1010	1010	1150
h1	100	100	113	125	150	175	188	225	180	190	200
h2	333	362	422	453	529	568	629	699	868	938	1156
x	330	355	401	428	482	545	598	647	788	848	1023
y	237	256	298	320	374	402	445	494	613	663	817

# Flue off-set Data

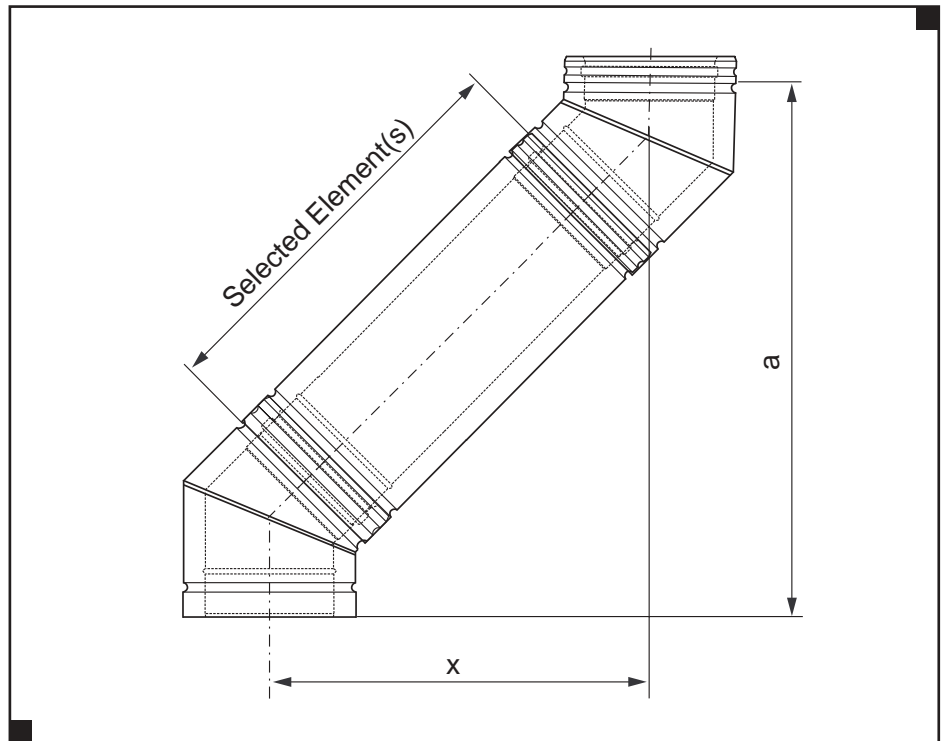
Masterflue MF system

Length	Angle	Dimension	100	130	150	180	200	250	300	350	400
0	15"	a x	273 36	293 39	313 41	332 44	352 46	391 52	391 52	391 52	490 64
	30"	a x	259 70	278 75	297 80	315 85	334 90	371 100	371 100	371 100	465 125
	45"	a x	239 99	256 106	273 113	290 120	307 127	341 141	427 177	427 177	461 191
250mm	15"	a x	515 101	534 103	554 106	574 108	593 111	633 116	633 116	633 116	731 129
	30"	a x	476 195	495 200	513 205	532 210	551 215	588 225	588 225	588 225	681 250
	45"	a x	416 276	433 283	450 290	467 297	484 304	518 318	604 354	604 354	638 368
500mm	15"	a x	756 165	776 168	796 171	815 173	835 176	874 181	874 181	874 181	972 194
	30"	a x	692 320	711 325	730 330	748 335	767 340	804 350	804 350	804 350	898 375
	45"	a x	593 453	610 460	627 467	644 474	661 481	695 495	780 530	780 530	814 544
750mm	15"	a x	998 230	1017 233	1037 235	1057 238	1076 240	1116 246	1116 246	1116 246	1214 259
	30"	a x	909 445	928 450	946 455	965 460	984 465	1021 475	1021 475	1021 475	1114 500
	45"	a x	769 629	786 636	803 643	821 651	838 658	872 672	957 707	957 707	991 721
1000mm	15"	a x	1239 295	1259 297	1279 300	1298 303	1318 305	1357 310	1357 310	1357 310	1455 323
	30"	a x	1125 570	1144 575	1163 580	1181 585	1200 590	1237 600	1237 600	1237 600	1331 625
	45"	a x	946 806	963 813	980 820	997 827	1014 834	1049 849	1134 884	1134 884	1168 898
1250mm	15"	a x	1481 359	1500 362	1520 365	1540 367	1559 370	1599 375	1599 375	1599 375	1697 388
	30"	a x	1342 695	1361 700	1379 705	1398 710	1417 715	1454 725	1454 725	1454 725	1547 750
	45"	a x	1123 983	1140 990	1157 997	1174 1004	1191 1011	1225 1025	1311 1061	1311 1061	1345 1075
1500mm	15"	a x	1722 424	1742 427	1761 429	1781 432	1801 435	1840 440	1840 440	1840 440	1938 453
	30"	a x	1558 820	1577 825	1596 830	1614 835	1633 840	1670 850	1670 850	1670 850	1764 875
	45"	a x	1300 1160	1311 1167	1334 1174	1351 1181	1368 1188	1402 1202	1487 1237	1487 1237	1522 1252
1750mm	15"	a x	1964 489	1983 491	2003 494	2023 497	2042 499	2082 504	2082 504	2082 504	2180 517
	30"	a x	1775 945	1794 950	1812 955	1831 960	1850 965	1887 975	1887 975	1887 975	1980 1000
	45"	a x	1476 1336	1494 1344	1511 1351	1528 1358	1545 1365	1579 1379	1664 1414	1664 1414	1698 1428

# Flue off-set Data

Masterflue MF system

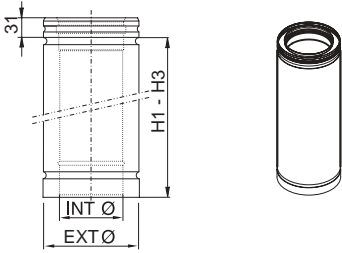
450	500	600
462	472	511
61	62	67
439	448	485
118	120	130
691	727	768
286	301	318
703	713	753
126	127	132
655	664	702
243	245	255
868	904	945
463	478	495
945	955	994
190	192	197
872	881	918
368	370	380
1045	1081	1122
640	655	672
1186	1196	1236
255	256	261
1088	1097	1135
493	495	505
1222	1258	1299
817	832	849
1428	1438	1477
320	321	326
1305	1314	1351
618	620	630
1398	1434	1475
993	1008	1025
1669	1679	1719
384	386	391
1521	1530	1568
743	745	755
1575	1611	1652
1170	1185	1202
1911	1921	1960
449	450	456
1738	1747	1784
868	870	880
1752	1788	1829
1347	1362	1379
2152	2162	2202
514	515	520
1954	1963	2001
993	995	1005
1929	1965	2006
1524	1539	1556



# Components

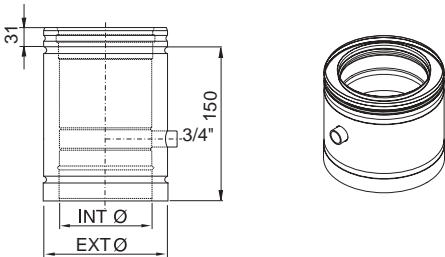
Masterflue MF System

## MF100/50/25 LENGTH



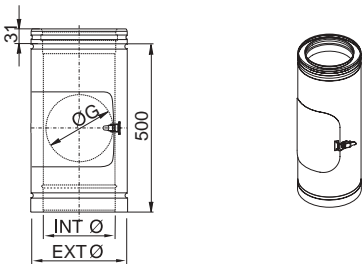
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H1</b>	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000
<b>H2</b>	500	500	500	500	500	500	500	500	500	500	500	500
<b>H3</b>	250	250	250	250	250	250	250	250	250	250	250	250
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFEM PROBE LENGTH



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	150	150	150	150	150	150	150	150	400	170	170	170
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFI INSPECTION ELEMENT

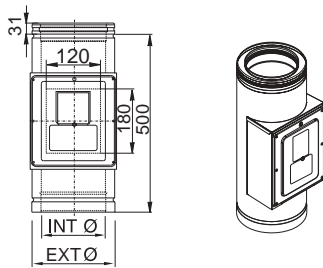


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>G</b>	100	130	140	140	140	180	180	180	240	240	240	240
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

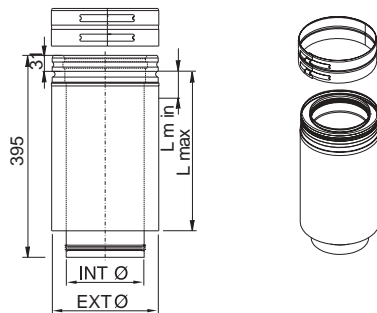
Masterflue MF System

## MFNL DRAUGHT STABILIZER



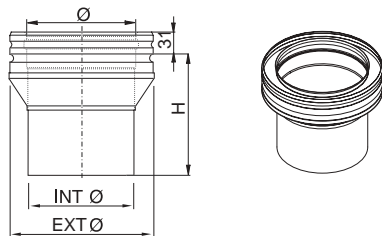
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

## MFPP ADJUSTABLE LENGTH WITH LOCKING BAND



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	97	127	147	177	197	247	297	347	397	449	499	599
<b>Lmin</b>	50	50	50	50	50	50	50	50	50	100	100	100
<b>Lmax</b>	300	300	300	300	300	300	300	300	300	400	400	400
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFA 00 ADAPTOR, REDUCING, INCREASING

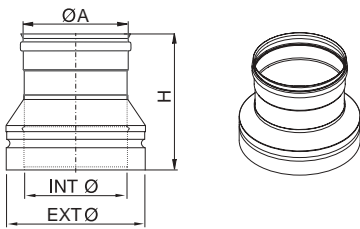


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	134	134	154	154	154	154	154	134	134	170	170	170
<b>X</b>	to be specified on order											
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

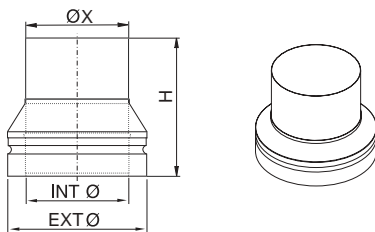
Masterflue MF System

## MFAC COUNTER ADAPTOR



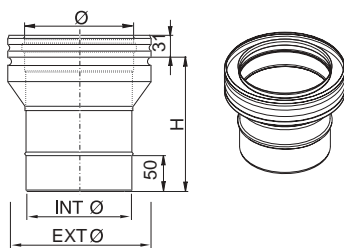
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	165	165	185	185	185	185	185	165	165	180	180	180
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFAC 00 COUNTER ADAPTOR, REDUCING, INCREASING



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	170	170	190	190	190	190	190	170	170	180	180	180
<b>X</b>	to be specified on order											
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFA ADAPTOR

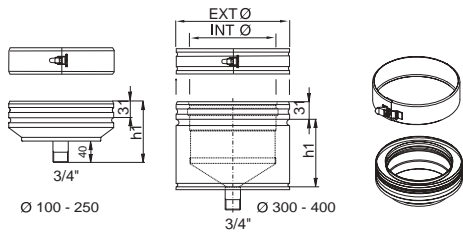


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	134	134	154	154	154	154	154	134	134	170	170	170
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

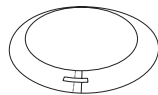
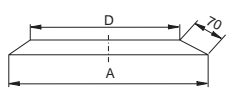
Masterflue MF System

## MFRBK CONDENSATE COLLECTOR WITH DRAIN & LOCKING BAND



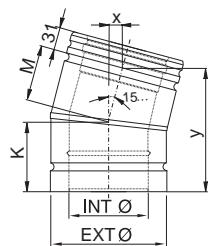
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>h1</b>	116	116	116	116	116	116	155	175	175	155	155	155
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>Drain</b>	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	1"	1"	1"

## MFS STORM COLLAR



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	275	305	325	355	375	425	475	525	575	650	700	800
<b>D</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFB15 ELBOW 15°

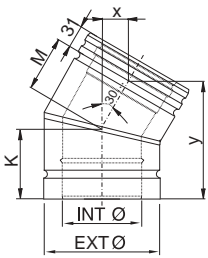


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>K</b>	88	93	98	103	108	118	118	118	143	110	110	110
<b>M</b>	52	57	62	67	72	82	82	82	107	110	110	110
<b>x</b>	14	16	17	18	19	22	22	22	28	28	28	28
<b>y</b>	138	148	158	167	177	197	197	197	246	216	216	216
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

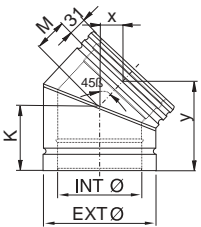
Masterflue MF System

## MFB 30 ELBOW 30"



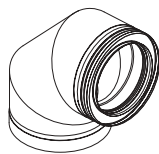
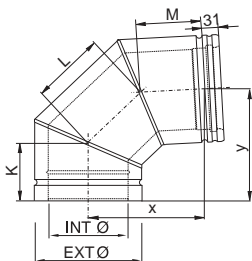
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>K</b>	88	93	98	103	108	118	118	143	143	136	143	156
<b>M</b>	52	57	62	67	72	82	82	82	107	136	143	156
<b>x</b>	28	30	33	35	38	43	43	43	55	68	72	78
<b>y</b>	133	142	151	161	170	189	189	189	235	254	267	292
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFB45 ELBOW 45"



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>K</b>	88	93	98	103	108	118	143	143	153	175	185	206
<b>M</b>	52	57	62	67	72	82	107	107	117	175	185	206
<b>x</b>	38	41	45	18	52	59	76	76	88	124	131	146
<b>y</b>	125	134	142	151	159	177	220	220	233	299	316	352
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFB 87 ELBOW 87"

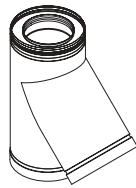
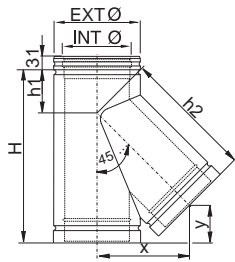


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>K</b>	88	93	98	103	108	118	143	143	153	175	185	206
<b>L</b>	105	115	125	140	145	165	185	205	225	300	320	365
<b>M</b>	52	57	62	67	72	82	107	107	117	175	185	206
<b>x</b>	127	140	150	163	171	195	234	248	271	392	419	473
<b>y</b>	165	178	190	208	216	241	282	297	322	389	413	464
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

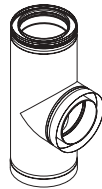
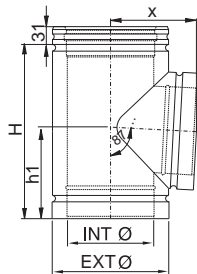
Masterflue MF System

## MFT 45 TEE-PIECE 45°



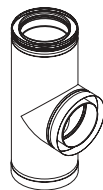
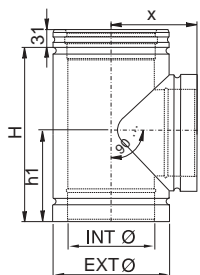
<b>INT DIA</b>	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	400	400	450	500	600	700	750	850	1000	1000	1150
<b>h1</b>	100	100	113	125	150	175	188	225	830	820	1000
<b>h2</b>	277	301	338	362	422	482	543	426	693	753	873
<b>x</b>	196	213	239	256	298	341	384	425	490	530	618
<b>y</b>	104	87	98	119	152	184	179	198	340	290	382
<b>EXT DIA</b>	180	200	230	250	300	350	400	450	525	575	675

## MFT 87 TEE-PIECE 87°



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	500	500	500	500	500	500	500	600	650	700	800	1000
<b>h1</b>	250	250	250	250	250	250	250	300	350	350	400	500
<b>x</b>	125	141	151	167	179	206	232	258	284	332	358	409
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFT 90 TEE-PIECE 90°

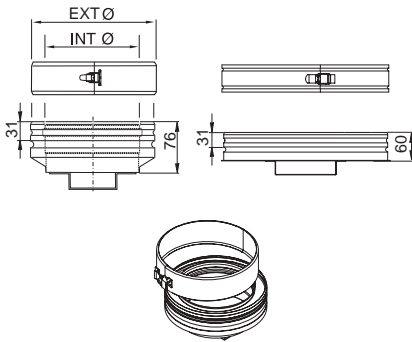


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>H</b>	500	500	500	500	500	500	500	600	650
<b>h1</b>	250	250	250	250	250	250	250	300	350
<b>x</b>	127	143	153	169	179	206	232	258	284
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

# Components

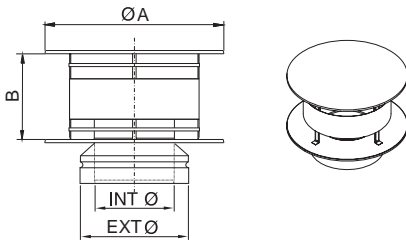
## Masterflue MF System

### MFTE END CAP FOR TEE-PIECE



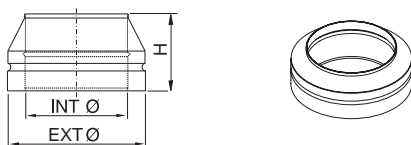
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

### MFK ALL WEATHER CAP WITH LOCKING BAND



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>A</b>	220	286	330	396	440	550	660	770	880
<b>B</b>	110	143	165	198	220	275	330	385	440
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

### MFMA TOP STUB WITH LOCKING BAND

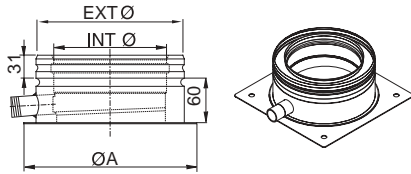


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>H</b>	75	75	115	115	115	115	115	75	75	100	100	100
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

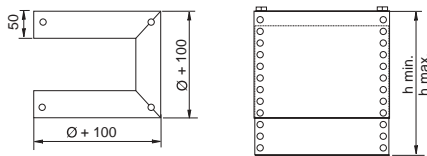
Masterflue MF System

## MFAPU ROTATING BASE PLATE WITH CONDENSATE DRAIN



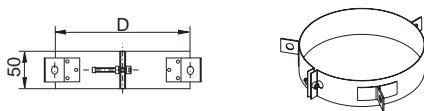
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	200	230	250	280	300	350	400	450	500	550	600	700
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>Drain</b>	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	3/4"	1"	1"	1"

## MFTS TELESCOPIC SUPPORT FOR MFAPU



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>H</b>	270	270	270	270	270	270	270	270	270
<b>A</b>	500	500	500	500	500	500	500	500	500
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

## MFBT GUY-WIRE BAND

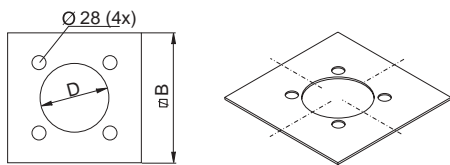


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>D</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

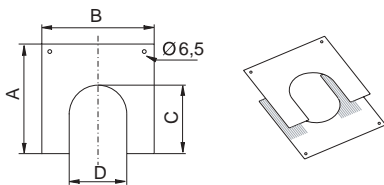
## Masterflue MF System

### MFBS FIRE STOP SPACER



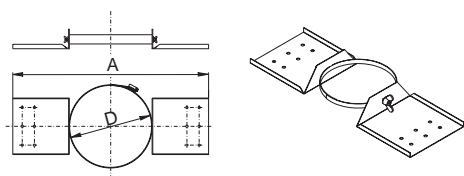
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>B</b>	275	305	325	355	375	425	475	525	575
<b>D</b>	155	185	205	235	255	305	355	405	455
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

### MFCPRV ADJUSTABLE COVER PLATES



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	372	372	372	390	420	467	467	465	540	575	625	725
<b>B</b>	465	465	465	467	530	552	600	624	624	725	775	875
<b>C</b>	235	277	250	268	298	343	346	348	350	475	525	625
<b>D</b>	151	181	201	231	251	301	351	401	451	525	575	675
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

### MFDQ ROOF SUPPORT

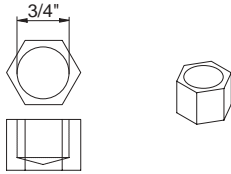


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	450	480	500	530	550	600	650	700	750	925	975	1075
<b>B</b>	150	180	200	230	250	300	350	400	450	200	200	200
<b>D</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

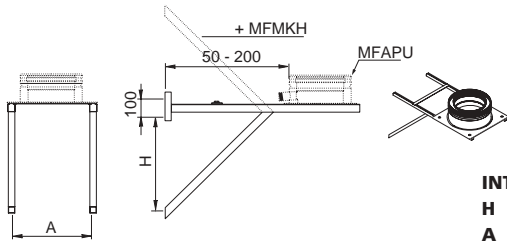
## Masterflue MF System

### MFE CAP, STAINLESS STEEL



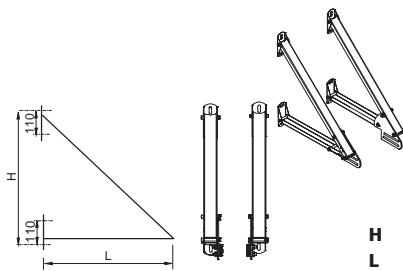
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

### MFMK1 WALL SUPPORT, ADJUSTABLE

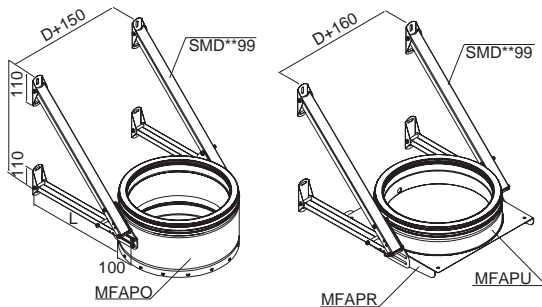


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>H</b>	153	153	153	193	193	233	273	273	313
<b>A</b>	150	180	200	230	250	300	350	400	450
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

### S MD - 82, WALL SUPPORT, ADJUSTABLE - for 450 - 600 Diameter components



	S MD03 99	S MD04 99	S MD05 99	S MD06 99	S MD07 99	S MD08 99	S MD09 99	S MD010 99	S MD011 99	S MD012 99	S MD013 99
<b>H</b>	380	440	480	505	555	580	605	655	680	705	755
<b>L</b>	265	325	365	390	440	465	490	540	565	590	640
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575

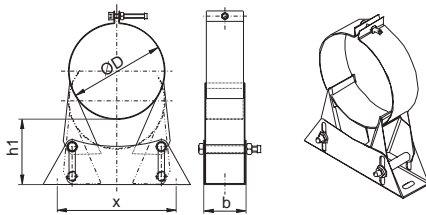


The support is designed to support the MF system on internal or external walls. The wall support can be used as an intermediate support, in combination with the support band MFMO. Also the support can be used underneath the MF chimney, in combination with the brackets MFAPR and the base plate MFAP/U. See drawing for mounting details.

# Components

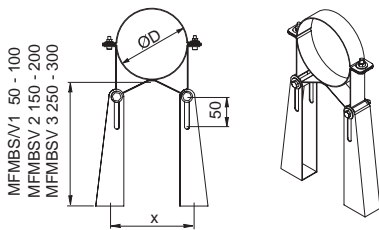
Masterflue MF System

## MFMB WALL BAND ADJUSTABLE



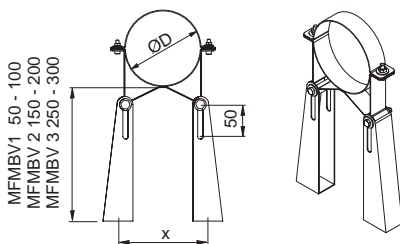
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>D</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>x</b>	116	160	160	160	160	160	360	360	360	360	510	510
<b>b</b>	35	57	57	57	57	57	57	57	57	58	58	58
<b>h1</b>	50-75	50-75	50-90	50-90	50-90	50-90	50-105	50-105	50-105	50-90	50-90	50-90
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFMBSV1, MFMBSV2, MFMBSV3 WALL BAND ADJUSTABLE (incl. MFSK 2x)



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>D</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>x</b>	188	218	238	268	288	338	388	438	488	525	575	675
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFMBV1, MFMBV2, MFMBV3 WALL BAND ADJUSTABLE

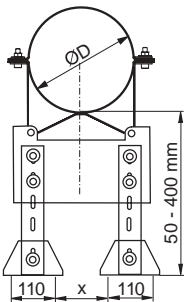


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>D</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>x</b>	188	218	238	268	288	338	388	438	488	525	575	675
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

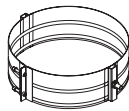
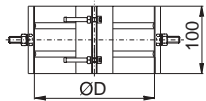
Masterflue MF System

## MFMBV4 / MFMBSV4\* WALL BAND ADJUSTABLE



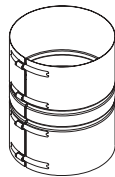
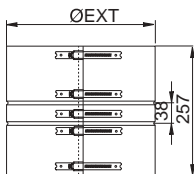
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>D</b>	30	78	78	128	128	178	228	278	378	525	575	675
<b>x</b>	150	180	200	230	250	300	350	400	450	525	575	675
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFMO BAND FOR WALL SUPPORT



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>D</b>	150	180	200	230	250	300	350	400	450
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

## MFSK REINFORCED LOCKINGBAND

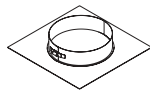
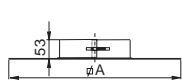


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

# Components

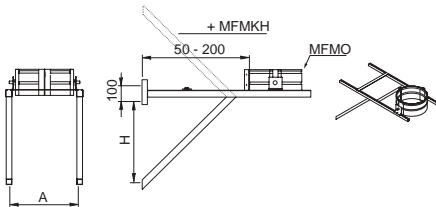
## Masterflue MF System

### MFVQ CEILING SUPPORT, STAINLESS STEEL



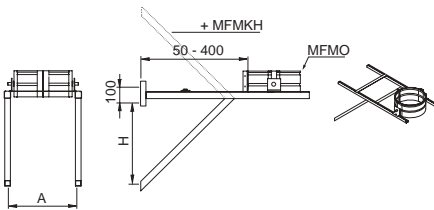
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>A</b>	275	305	325	355	375	425	475	525	575
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

### MFZ 1 WALL SUPPORT (incl. MFMO)



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>A</b>	225	225	275	305	325	375	425	475	525
<b>B</b>	375	400	425	450	475	525	575	625	675
<b>H</b>	153	153	153	193	193	233	273	273	313
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

### MFZ 2 WALL SUPPORT (incl. MFMO)

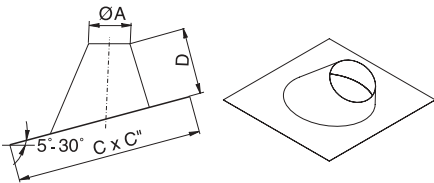


<b>INT DIA</b>	100	130	150	180	200	250	300	350	400
<b>A</b>	225	225	275	305	325	375	425	475	525
<b>B</b>	575	600	625	650	675	725	775	825	875
<b>H</b>	273	273	273	273	313	353	353	393	473
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450

# Components

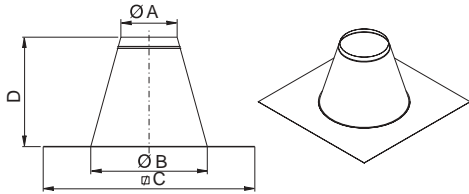
Masterflue MF System

## MFDH SLOOP ROOF FLASHING 5° - 30°



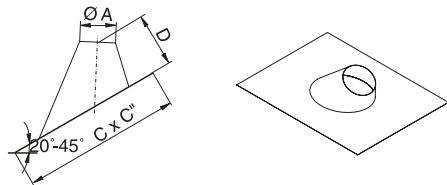
<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	155	185	205	235	255	305	359	411	465	530	580	680
<b>C</b>	520	550	575	607	630	685	740	795	850	933	988	1100
<b>C''</b>	500	530	550	580	600	655	705	760	810	889	941	1047
<b>D</b>	160	190	190	190	190	190	205	235	270	213	221	237
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFDP FLAT ROOF FLASHING



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	160	190	210	240	260	310	360	410	460	535	585	685
<b>B</b>	200	230	250	280	300	350	400	450	500	575	625	725
<b>C</b>	440	470	490	520	540	590	640	690	740	815	865	965
<b>D</b>	315	315	315	315	315	315	315	315	315	315	315	315
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675

## MFLS LEAD SLOPE ROOF FLASHING 20° - 45°



<b>INT DIA</b>	100	130	150	180	200	250	300	350	400	450	500	600
<b>A</b>	155	185	205	235	255	305	359	411	461	535	585	685
<b>C</b>	500	750	750	750	750	750	750	750	1000	1100	1200	1300
<b>C''</b>	500	1000	1000	1000	1000	1000	1000	1000	1200	1200	1300	1400
<b>D</b>	200	230	230	230	230	270	270	270	270	120	120	120
<b>EXT DIA</b>	150	180	200	230	250	300	350	400	450	525	575	675



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