

TECHNICAL PRODUCT GUIDE 2021



Pressed Aluminium Gutters



Box Gutter Profile

	100mm	125mm	150mm	200mm
Box Profile	✓	✓	✓	✓
Bespoke profiles made to order				

Legion Pressed Aluminium Gutters have become a popular choice for contemporary designs within the Industrial, Housing and Self-build markets.

With sizes from 100x75mm up to 200x150mm as standard, we can supply bespoke sizes made to order.

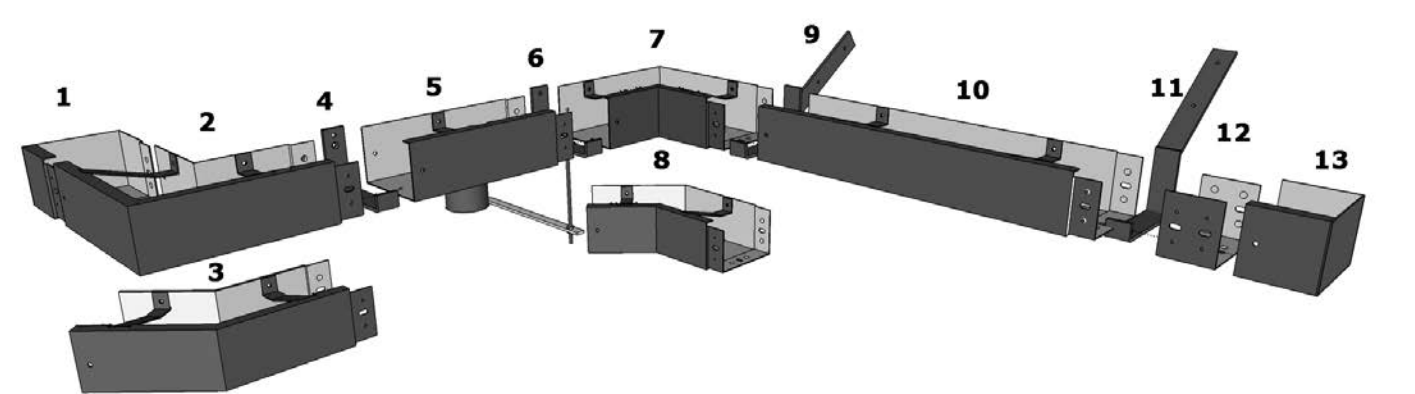
- Made from high strength aluminium sheet 1050AH14.
- 100% recyclable.
- Lightweight.
- Variety of profiles available.
- Radius and special fittings can be provided.
- Mill finish or powder coated to your choice of RAL/BS Colour.
- Fitting instructions included with every delivery.



All dimensions shown in mm unless otherwise stated.



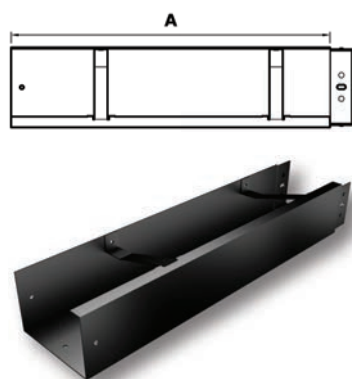
System Overview



Number	Item	Number	Item
1	Left Hand Stopend	8	135° Internal Angle
2	90° External Angle	9	Side Fix Rafter Bracket
3	135° External Angle	10	Gutter Length
4	Fascia Bracket	11	Top Fix Rafter Bracket
5	Running Outlet	12	Union Connector
6	Rise and Fall Bracket	13	Right Hand Stopend
7	90° Internal Angle		

All dimensions shown in mm unless otherwise stated.

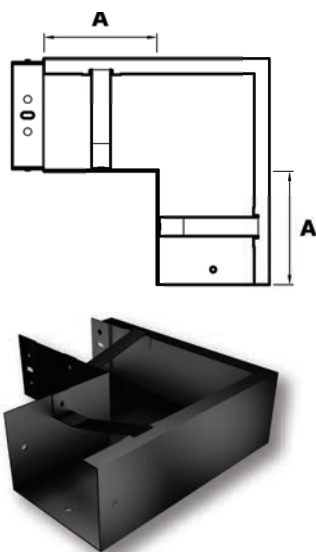
Gutter Lengths



Note: The effective gutter length of the 3.0m length is 2.96m

GUTTER SIZE	A	PRODUCT CODE
100 x 75	3000*	43BG3S
100 x 75	2500	43BG2.5S
100 x 75	2000	43BG2S
100 x 75	1000	43BG1S
100 x 75	500	43BG0.5S
125 x 100	3000*	54BG3S
125 x 100	2500	54BG2.5S
125 x 100	2000	54BG2S
125 x 100	1000	54BG1S
125 x 100	500	54BG0.5S
150 x 100	3000*	64BG3S
150 x 100	2500	64BG2.5S
150 x 100	2000	64BG2S
150 x 100	1000	64BG1S
150 x 100	500	64BG0.5S
150 x 150	3000*	66BG3S
150 x 150	2500	66BG2.5S
150 x 150	2000	66BG2S
150 x 150	1000	66BG1S
150 x 150	500	66BG0.5S
200 x 150	3000*	86BG3S
200 x 150	2500	86BG2.5S
200 x 150	2000	86BG2S
200 x 150	1000	86BG1S
200 x 150	500	86BG0.5S

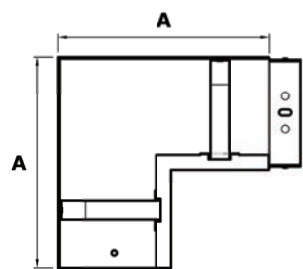
90° External Angle



GUTTER SIZE	A	PRODUCT CODE
100 x 75	150	43BAX90
125 x 100	150	54BAX90
150 x 100	150	64BAX90
150 x 150	150	66BAX90
200 x 150	150	86BAX90

Non standard angles available on request.

90° Internal Angle

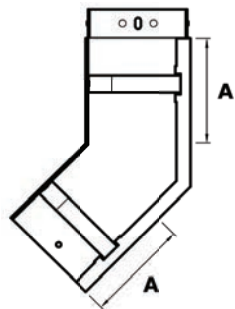


GUTTER SIZE	A	PRODUCT CODE
100 x 75	250	43BAI90
125 x 100	275	54BAI90
150 x 100	300	64BAI90
150 x 150	300	66BAI90
200 x 150	350	86BAI90

Non standard angles available on request.



135° External Angle

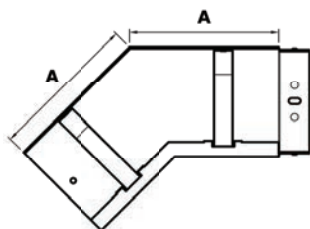


GUTTER SIZE	A	PRODUCT CODE
100 x 75	250	43BAX135
125 x 100	275	54BAX135
150 x 100	300	64BAX135
150 x 150	300	66BAX135
200 x 150	350	86BAX135

Non standard angles available on request.



135° Internal Angle

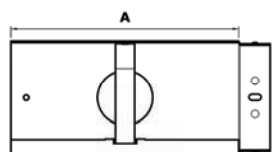


GUTTER SIZE	A	PRODUCT CODE
100 x 75	250	43BAI135
125 x 100	275	54BAI135
150 x 100	300	64BAI135
150 x 150	300	66BAI135
200 x 150	350	86BAI135

Non standard angles available on request.



Running Outlet



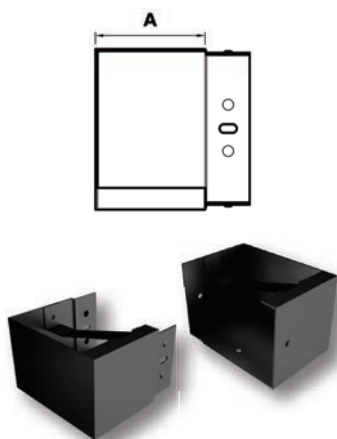
GUTTER SIZE	OUTLET SIZE	A	PRODUCT CODE
100 x 75	Ø63	300	43BO2R
100 x 75	Ø76	300	43BO3R
100 x 75	Ø101	300	43BO4R
100 x 75	63 Sq	300	43BO2S
100 x 75	76 Sq	300	43BO3S
100 x 75	101 x 76 Rect	300	43BO43
100 x 75	101 Sq	300	43BO4S
125 x 100	Ø63	300	54BO2R
125 x 100	Ø76	300	54BO3R
125 x 100	Ø101	300	54BO4R
125 x 100	63 Sq	300	54BO2S
125 x 100	76 Sq	300	54BO3S
125 x 100	101 x 76 Rect	300	54BO43
125 x 100	101 Sq	300	54BO4S
150 x 100	Ø63	300	64BO2R
150 x 100	Ø76	300	64BO3R
150 x 100	Ø101	300	64BO4R
150 x 100	63 Sq	300	64BO2S
150 x 100	76 Sq	300	64BO3S
150 x 100	101 x 76 Rect	300	64BO43
150 x 100	101 Sq	300	64BO4S
150 x 150	Ø63	300	64BO2R
150 x 150	Ø76	300	66BO3R
150 x 150	Ø101	300	66BO4R
150 x 150	63 Sq	300	66BO2S
150 x 150	76 Sq	300	66BO3S
150 x 150	101 x 76 Rect	300	66BO43
150 x 150	101 Sq	300	66BO4S
150 x 150	Ø63	300	66BO2R
200 x 150	Ø76	300	86BO3R
200 x 150	Ø101	300	86BO4R
200 x 150	63 Sq	300	86BO2S
200 x 150	76 Sq	300	86BO3S
200 x 150	101 x 76 Rect	300	86BO43
200 x 150	101 Sq	300	86BO4S

See our range of Colonnade Aluminium Downpipes and Hoppers to complement your aluminium gutters



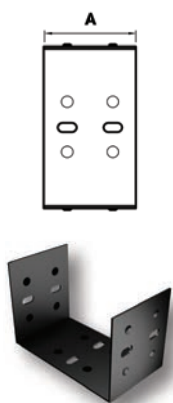
All dimensions shown in mm unless otherwise stated.

Stopends



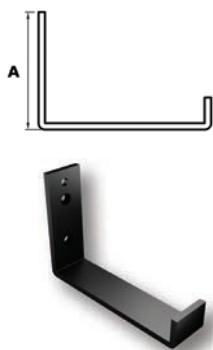
GUTTER SIZE	A	PRODUCT CODE LH	PRODUCT CODE RH
100 x 75	300	43BSEL	43BSER
125 x 100	300	54BSEL	54BSER
150 x 100	300	64BSEL	64BSER
150 x 150	300	66BSEL	66BSER
200 x 150	300	86BSEL	86BSER

Union Connector



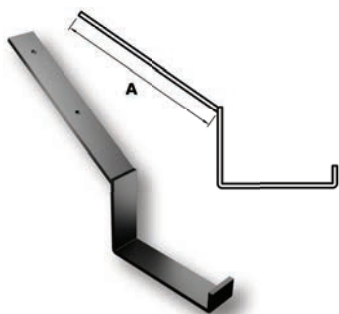
GUTTER SIZE	A	PRODUCT CODE
100 x 75	80	43BUC
125 x 100	80	54BUC
150 x 100	80	64BUC
150 x 150	80	66BUC
200 x 150	80	86BUC

Fascia Brackets



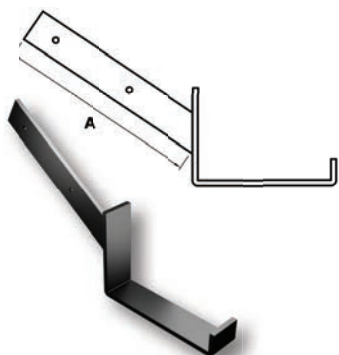
GUTTER SIZE	A	PRODUCT CODE
100 x 75	81	43BBF
125 x 100	106	54BBF
150 x 100	106	64BBF
150 x 150	156	66BBF
200 x 150	156	86BBF

Top Fix Rafter Bracket



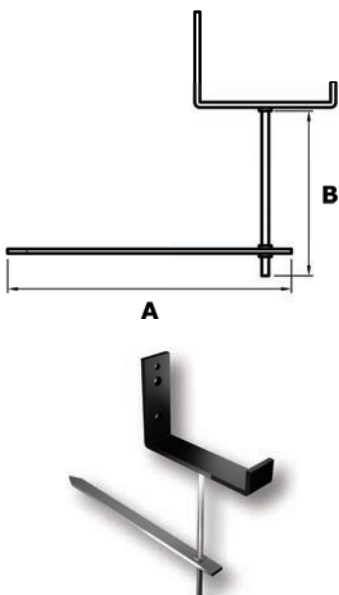
GUTTER SIZE	A	PRODUCT CODE
100 x 75	230	43BBRT
125 x 100	230	54BBRT
150 x 100	230	64BBRT
150 x 150	230	66BBRT
200 x 150	230	86BBRT

Side Fix Rafter Bracket



GUTTER SIZE	A	PRODUCT CODE
100 x 75	230	43BBRS
125 x 100	230	54BBRS
150 x 100	230	64BBRS
150 x 150	230	66BBRS
200 x 150	230	86BBRS

Rise and Fall Bracket



GUTTER SIZE	A	B	PRODUCT CODE
100 x 75	330	200	43BBRFS
125 x 100	330	200	54BBRFS
150 x 100	330	200	64BBRFS
150 x 150	330	200	66BBRFS
200 x 150	330	200	86BBRFS

Box c/w Apron



Type 1

GIRTH
425
LENGTH
3000
PRODUCT CODE
PG450-2-3/3

Simple Ogee



Type 2

GIRTH
385
LENGTH
3000
PRODUCT CODE
PG400-2-3/3

Radius Front



Type 3

GIRTH
300
LENGTH
3000
PRODUCT CODE
PG300-2-3/3

Angled Face



Type 4

GIRTH
385
LENGTH
3000
PRODUCT CODE
PG400-2-3/3

Parapet



Type 5

GIRTH
500
LENGTH
3000
PRODUCT CODE
PG500-2-3/3

Angled Box



Type 6

GIRTH
375
LENGTH
3000
PRODUCT CODE
PG400-2-3/3



We manufacture and powder coat in-house, with short lead times, and items available from stock.

Call us to discuss your requirements on **0116 289 4400**.

All dimensions shown in mm unless otherwise stated.

BEFORE YOU START

General Site Working

BS 8000 Workmanship on building sites, Parts 13 through to 16 with respect to above ground drainage and sanitaryware appliances are relevant in general terms.

Handling and Storage

Gutters, downpipes and fittings, particularly with polyester powder coat finish should be handled with care and preferably stored under cover on racks to prevent scratching. Whilst not known to pose any health hazard, it is recommended that protective gloves be worn when handling mill finish aluminium.

All lengths are supplied in a protective polythene wrapping with components similarly wrapped and stored in cardboard boxes. If painted product is to be stored outside, cover with a tarpaulin to protect against rainfall and direct sunlight. Failure to do this may allow water to get trapped inside the protective wrapper and could lead to permanent watermarks on the paint finish. Mill finish items should be stored under cover to avoid uneven oxidization prior to being fitted.

Cutting and Drilling

Gutter sections may be cut and drilled on site using standard metalworking tools, however the use of angle grinders is not recommended. Where gutters or fittings are powder coated, then cut edges should be de-burred and repainted with touch-up paint (available from ARP).

Setting Out

Gutters may be installed level or to a fall of 1:600. If level, make sure that the gutter is set at the correct height at the centre point and use a string line or level make a series of marks to indicate the correct height along the run length. When trying to achieve a fall the lowest point needs to be the outlet, so mark this position first, followed by the end of the run and then use a string line to mark regular points of reference.

Materials Checklist

- Spirit level/straight edge ☐
- Suitable screwdriver/attachment ☐
- Sealant caulking gun ☐
- Pencil or chalk ☐
- String or laser line ☐
- Hacksaw/electric jigsaw/chopsaw ☐
- Tape measure ☐
- Small wrench ☐

Jointing

Any use of sealant must not be carried out in wet weather or in temperatures below 5°C or above 50°C. All Joint surfaces must be perfectly clean and dry. Only a low modulus sealant must be used to prevent early failure. Ensure that the gutter joint sockets/spigots are correctly aligned with each other to ensure free thermal movement (3-4mm) within the gutter joint.

Fixing

It is important that all fixings are suitable for both the substrate and the load. They must therefore be of the appropriate size and of a compatible material to ensure no electrolytic corrosion occurs. ARP recommends that stainless steel (preferably austenitic) screws must be used to fix gutters, whether direct, fascia or rafter bracket fixed.

Gutter Position

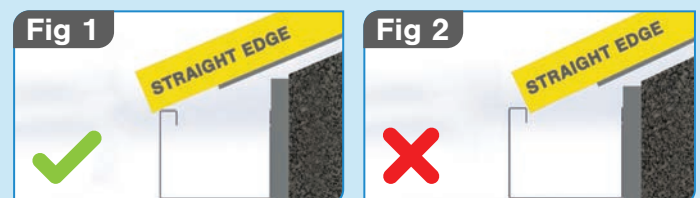
The current recommendations from the Metal Gutter Manufacturers Association (MGMA) is to position gutters as Fig 1.

Fig 1. As the line of the roof passes the gutter, a good proportion of debris sliding down the roof, such as leaves or snow will pass by without being collected. This position will also reduce potential snow build up back up the roof, which can put additional strain on brackets and fascia board adhesion.

There are certain conditions where a Fig 1 installation might allow water to over shoot the gutter in high wind conditions however this is deemed to be better than the above stated issues.

Fig 2. As the line of the roof sits inside the gutter profile, this encourages

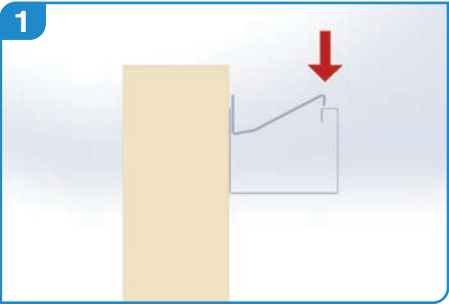
debris, such as leaves or snow, to be collected and could cause an increase in debris clearing regularity and issues with bracket and fascia board adhesion strength in heavy snow conditions.



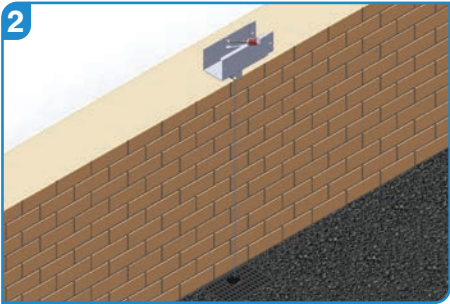
GUTTER FIXING

We advise that you ensure the fixing background (e.g fascia board) is securely fixed, level and able to support the weight of the gutter at full capacity and that the roof overhang is correct – see gutter position.

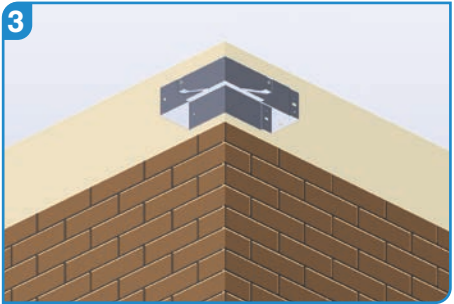
Legion box guttering can be directly fixed, so no need for extra bracketry.



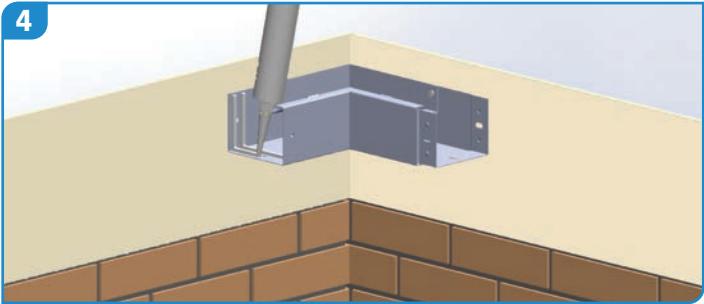
Legion joggle joint guttering is fitted direct to the fascia board at 750 mm centres and has pre-drilled holes for fixing. Start by deciding whether to fit the gutter level or with a fall to 1:600.



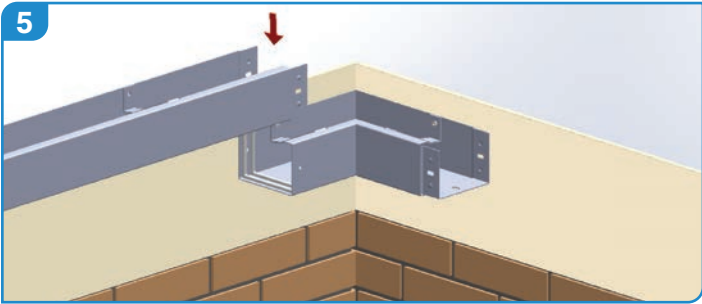
Ideally using a string line or laser level, set out position from bottom edge of gutter. Fit outlets and angles first. With the use of a plumb or laser line to set outlets over gullies.



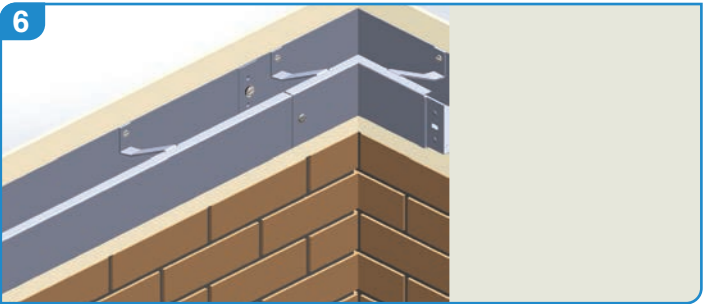
Fix gutter lengths utilising the pre-drilled fixing holes at 750 mm centres in the rear face of the gutter.



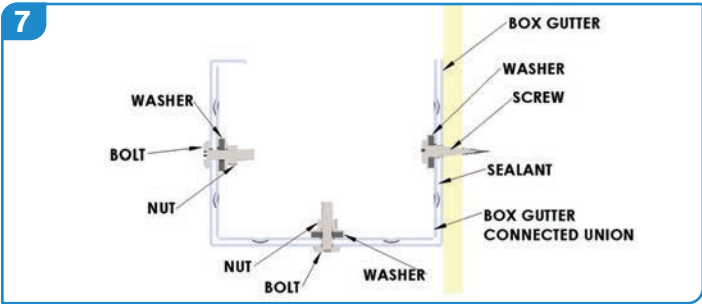
Ensure all fixing surfaces are clean and dry. Apply 2 x 6 mm beads of low modulus sealant to the plain end of the gutter.



Position the spigot end over the joint, push bolts through the slots of the gutter from the outside, making sure the slotted holes are filled with sealant.



Apply nuts and washers and gently tighten (Do not overtighten as this may force the sealant out of the joint).



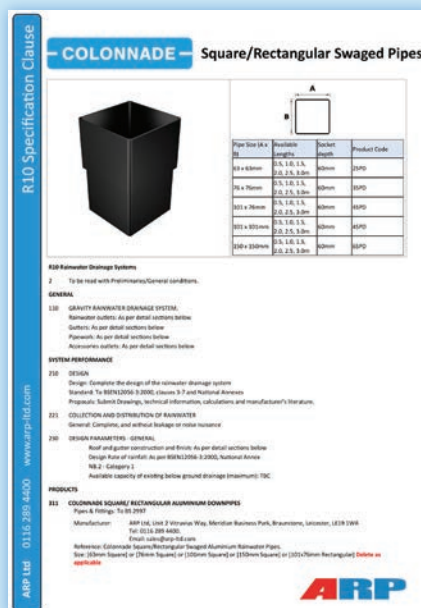
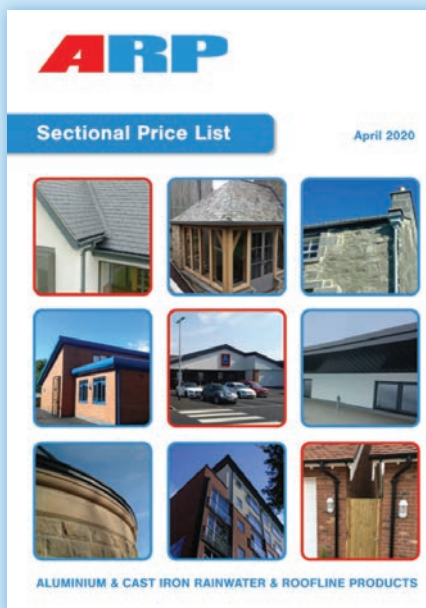
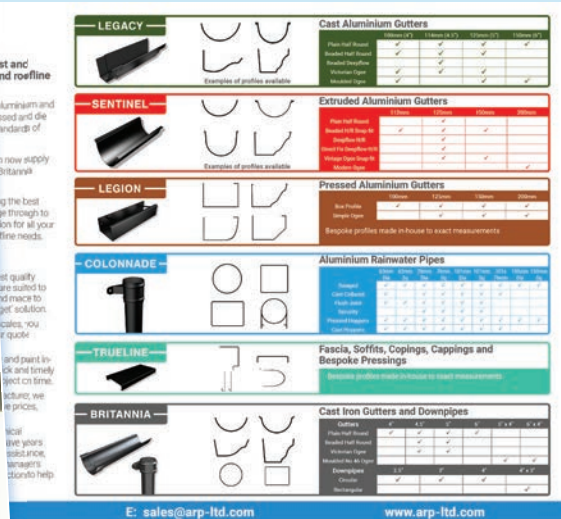
Clean off any excess sealant to either side of the joint or apply additional as required to create a smooth bead.



Any cut lengths should be de-burred and touched up with touch-up paint supplied prior to installation. For more information or further assistance, please contact us.

ACCESS FURTHER DOCUMENTS AND ARP'S LITERATURE

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LEGACY



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LEGION



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