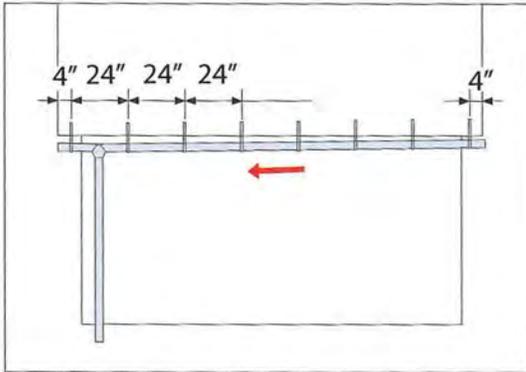


PoliGuard™ Gutter System  
Assembly Instructions

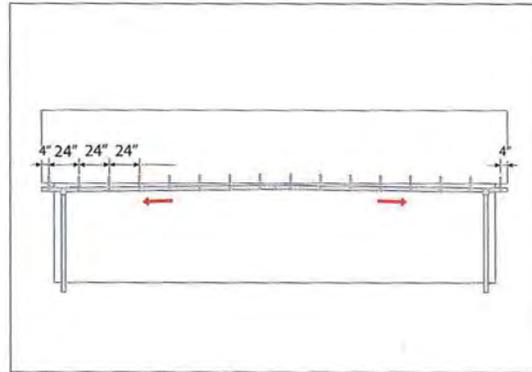
**poligon**<sup>®</sup>  
[www.poligon.com](http://www.poligon.com)

# Assembly Instructions

Gutter Hangers should be mounted @ 24" O.C. and 4" from roof ends.



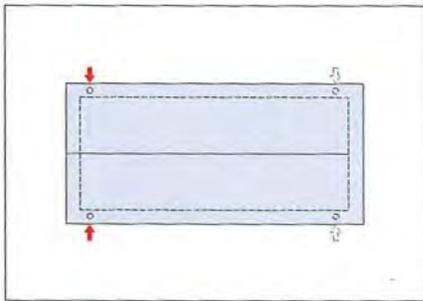
One downspout for every 24 ft. of gutter



Two downspouts for gutter length exceeding 24 ft.

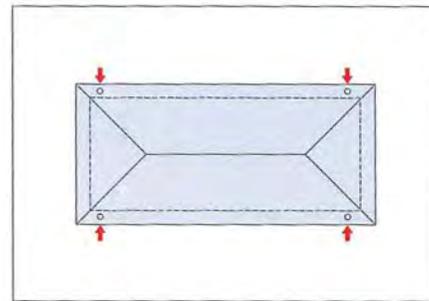
## Where to place downspouts\*

The pictures below show the recommended placement of downspouts for different roof types



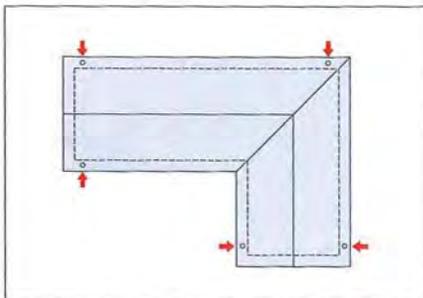
### Gable Roof Shelters

1 downspout per side up to 24', adding 1 downspout\* for each additional 24' of shelter length.



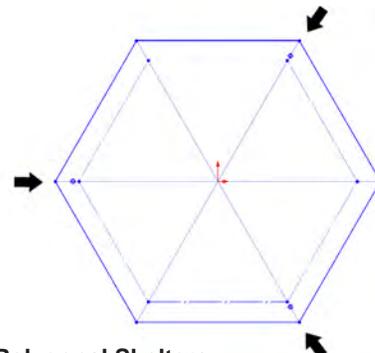
### Hip Roof Shelters

1 downspout at each corner up to 24', then adding 2 downspouts\* per side for each additional 24' of shelter length.



### L Shaped Shelters

Install downspouts as shown. Add downspouts\* when the distance between downspouts exceeds 24'.



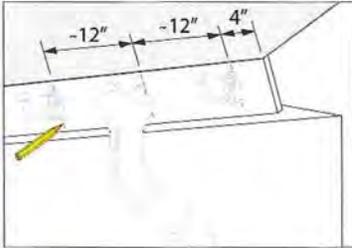
### Polygonal Shelters

Install downspouts\* at every other corner

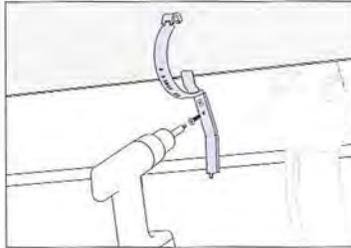
- Hexagon - 3 downspouts
- Octagon - 4 downspouts
- Dodecagon - 6 downspouts

# Assembly - Roof Drainage System

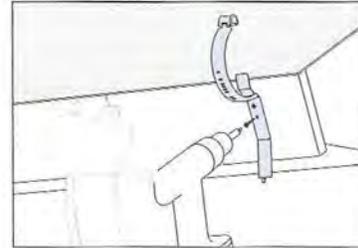
## Hanger installation to fascia



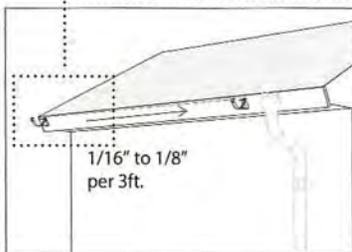
Mark out for the hangers around the downspout.



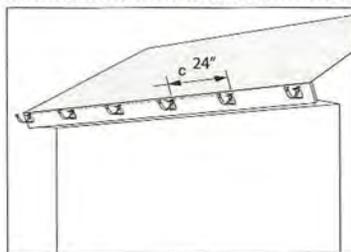
Fasten the "low hanger" 12" left of the downspout mark.



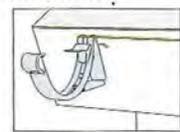
Fasten the hanger right of the downspout mark - 1/16" to 1/8" higher than the low hanger.



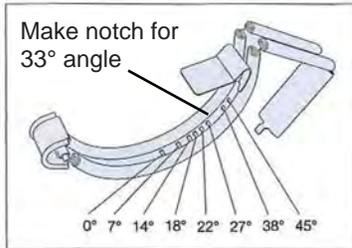
Fasten "high hanger" at the opposite end of roof base. To the slope to the pipes should be 1/16" to 1/8" per 3ft.



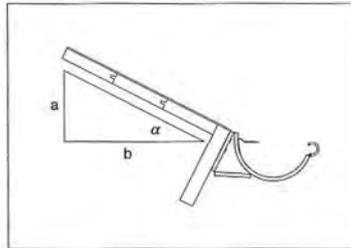
Fasten the other hangers with 24" o.c. along the string.



Put a string between the high and low bracket. It will help you to place the other brackets.



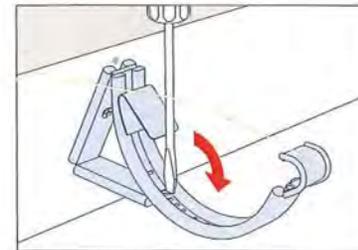
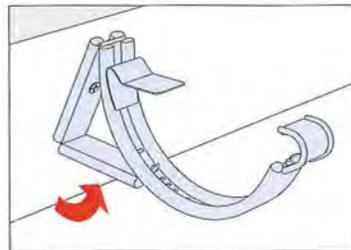
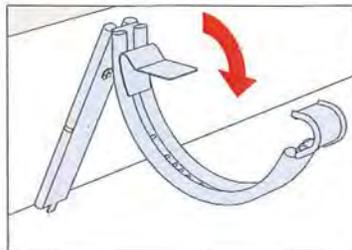
The adjustable hanger can be adjusted for different roof pitches.



Calculate your roof pitch and adjust the hanger accordingly. See roof layout pages for building pitch.

Pitch	Angle
12:12	45°
10:12	38°
8:12**	33°
6:12	27°
5:12	22°
4:12	18°
3:12	14°
1.5:12	7°
0:12	0°

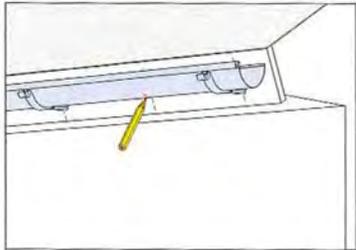
\*\*For 8:12 roof pitch, create additional notch between the 27° and 38° notches.



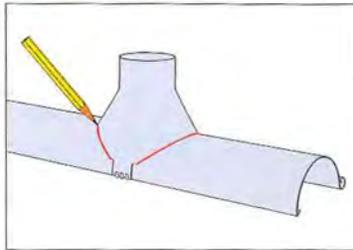
Use screwdriver to fold the tab forward for low angles and back for angles greater than 22°

# Assembly - Roof Drainage System

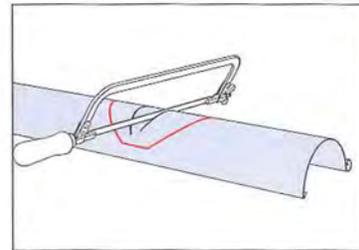
## Gutter assembly



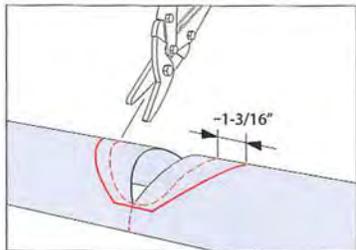
Place the gutter in the hangers and mark out for the plug-in outlet on the gutter.



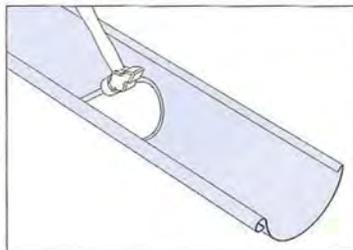
Use the outlet as template on the gutter.



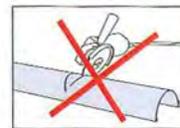
Use a hacksaw to make a hole in the gutter.



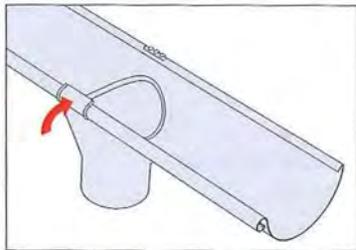
Finish by cutting up to the bead and backside as shown in the picture.



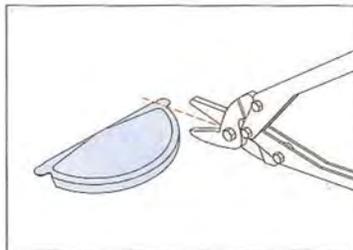
To get a smooth water fall, use a hammer or pliers to turn down edges.



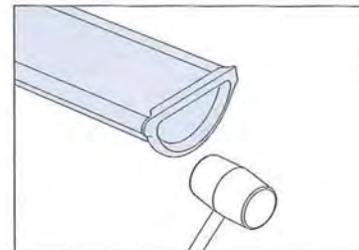
**Heat generated by high speed sawing or grinding will burn finish resulting in corrosion.**  
• See warranty notice •



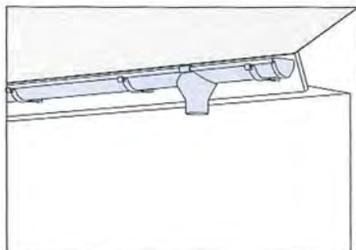
The plug-in outlet snaps easily on the gutter.



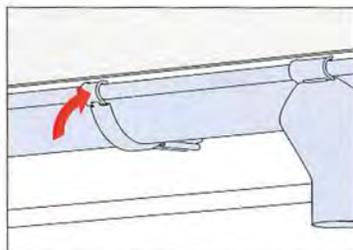
Use metal shear to remove unneeded ear.



The universal end cap is self sealing. Use a rubber hammer to fix it to the gutter.



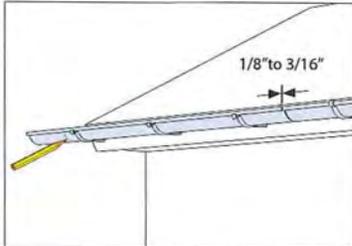
Place the gutter in the brackets.



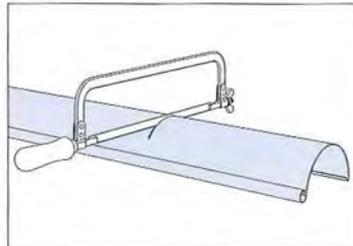
Just snap on the bracket hooks on the gutter.

# Assembly - Roof Drainage System

## Gutter assembly



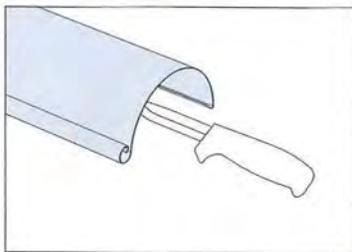
Place the gutter to be joined in the hangers and mark out correct length.



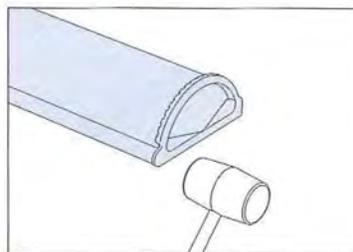
Use a hack saw to cut the gutter.

### WARRANTY NOTICE:

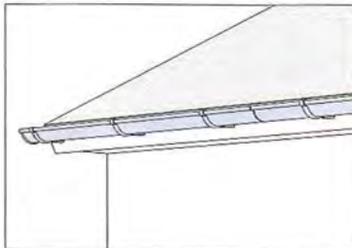
Do not cut the gutter and downspout using a conventional power saw. The heat generated during the cutting process will burn away trace zinc distributed along the cut from the surrounding Galvanized surfaces, resulting in corrosion. Instead, we advise using a hacksaw, snips or a Cold/Dry Cut power saw. The use of a heat generating conventional power saw will void the warranty.



Remove the filings.



Assemble the trimmed end cap.



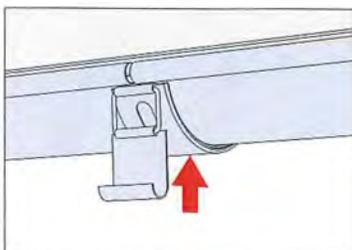
Snap on the gutter.



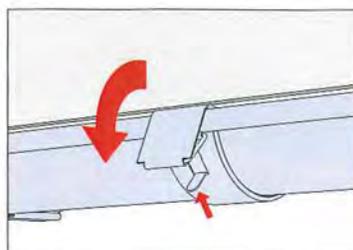
Use self-sealing gutter connector.



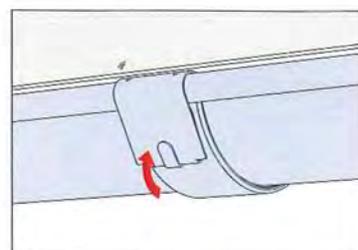
Silicone should not be used.



Press the rubber to the gutter.



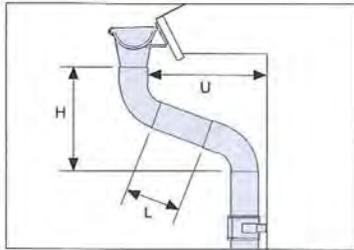
Snap on the gutter connector



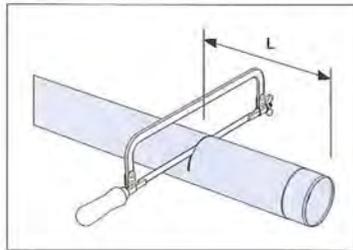
and lock.

# Assembly - Roof Drainage System

## Downspout bends



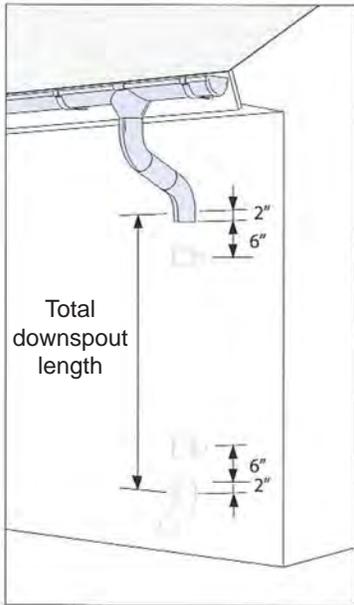
Check the measurement to get the length of the bridge pipe. Use table on right.



Use a hack saw to cut the bridge pipe. Remove sharp metal fillings.

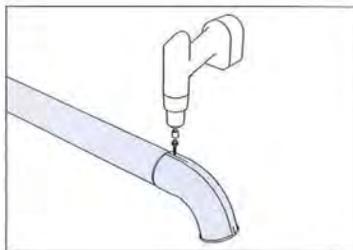
**Bridge Pipe Length with 85° elbows:**

U	L	H
12.50	0	12.50
14	3	12.625
16	5.125	12.75
18	7.25	13
20	9.50	13.125
22	11.50	13.375
24	13	13.50
26	15	13.625
28	17.125	13.875
30	19.125	14
32	21.125	14.125
34	23.125	14.375
36	28.125	14.50

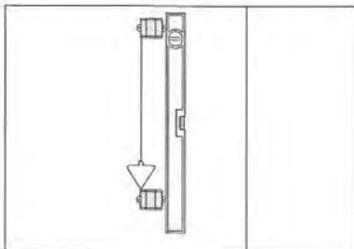


Measure the length of the downspout. Mark out the brackets.

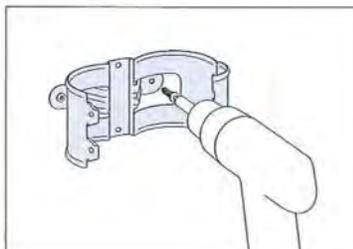
Install two downspout brackets. Add additional brackets if downspout length exceeds 10'.



Attach the ground level beaded elbow using self tapping screw on back side.



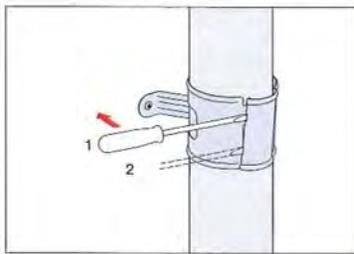
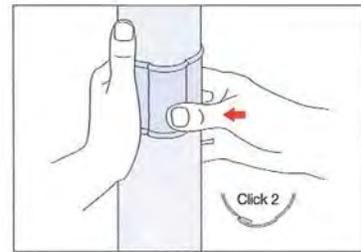
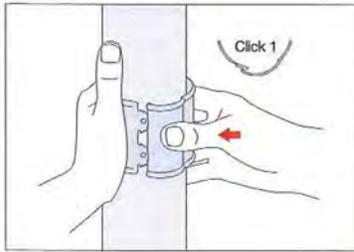
Level the brackets with level or plum.



Fasten the brackets on the column.

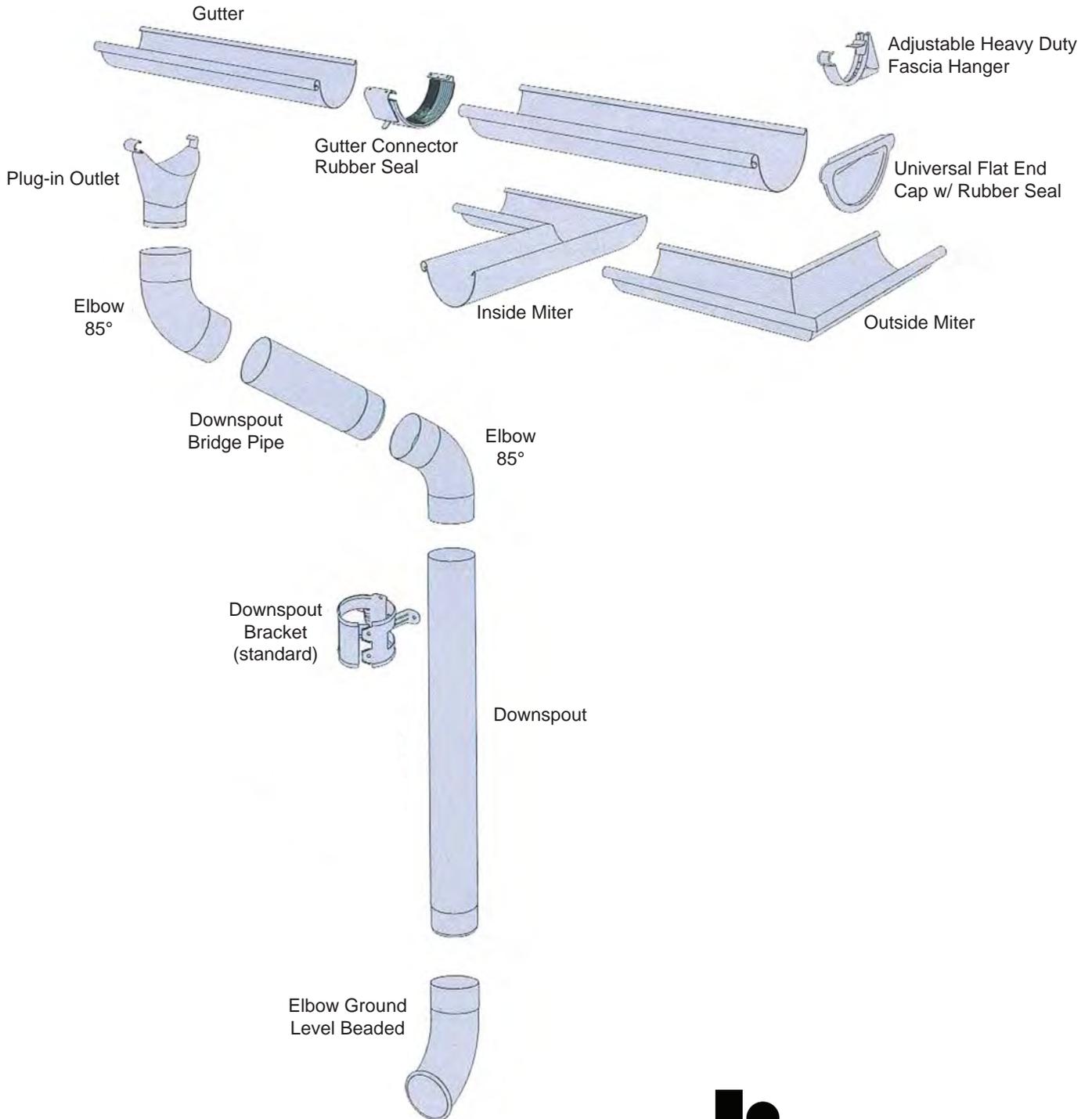
# Assembly - Roof Drainage System

## Close up assembly of downspout bracket



Dismounting the downspout bracket is easy.

# PoliGuard™ Gutter System Components



# poligon®

4240 136th Avenue Holland, MI 49424  
T-616.399.1963 F-616.399.9123 E-info@poligon.com

[www.poligon.com](http://www.poligon.com)