

Installation requires moderate mechanical skill. If this job is beyond your abilities, seek the services of a qualified technician.

If you do not understand any part of these instructions, please call Flowmaster Technical Support at (866) 464-6553 for assistance.

Apply penetrating oil generously to clamps, fasteners, pipes, and hanger rods for ease of disassembly.

REVIEW THE INSTRUCTIONS & VERIFY THE KIT CONTENTS

Take a moment to read and understand these instructions before installing your Flowmaster exhaust kit.

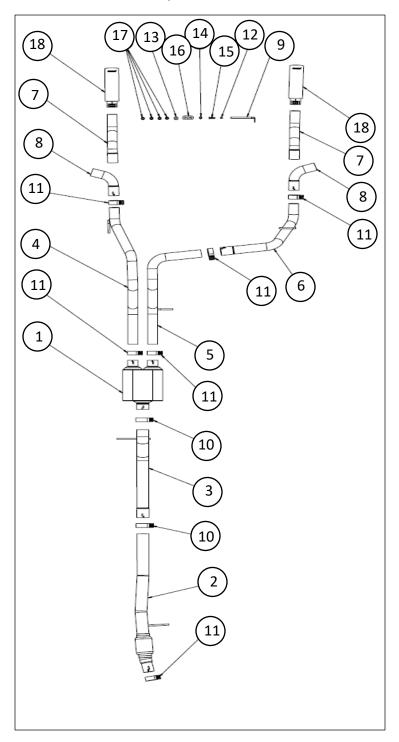
ITM#	Part #	Description	Qty.
1	8530013-Z	Muffler	1
2	26783S	Inlet Pipe	1
3	26917S	Inlet Pipe Ext.	1
4	86754S	Right Tailpipe	1
5	86757S	Left Front Tailpipe	1
6	86758S	Left Rear Tailpipe	1
7	86756S	Rear Exit Pipe	2
8	86755S	Side Exit Pipe	2
9	534HA	Frame Hanger	1
10	MC300BS	3" Band Clamp	2
11	MC250BS	2.5" Band Clamp	6
12	HW103	3/8-16 Nut	1
13	HW303	3/8 Flat Washer	1
14	HW309	3/8 Split Washer	1
15	HW209	3/8-16 x 1 ¼ Bolt	1
16	HA168	Rubber Exhaust Hanger	1
17	HW502	Push Nut 7/16	4
18	ST461	Polished Tip	2

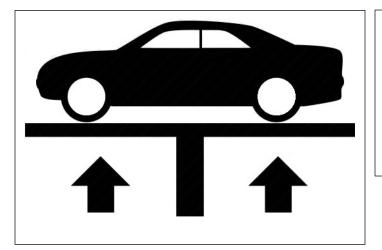
Installation Instructions

818158

2019-2023 Ford Ranger With 2.3L EcoBoost Engine 2 or 4-Wheel Drive







Vehicle Compatibility

Model Year: 2019-2023 Make: Ford Ranger Engine: 2.3L EcoBoost Super Crew Cab 5 ft. Bed Super Cab 6 ft. Bed

BEFORE STARTING:

Your vehicle must be raised a minimum of 18 inches. A floor hoist is ideal. If no hoist is available, we strongly urge the use of axle stands as a safety measure. Please read and understand these instructions and disclaimer in their entirety before attempting installation.

CAUTION! WORK ONLY ON A SOLID, LEVEL SURFACE. USE JACKS /JACK STANDS OF SUFFICIENT CAPACITY TO LIFT AND SUPPORT YOUR VEHICLE. NEVER WORK UNDER A VEHICLE SUPPORTED BY A FLOOR OR BUMPER JACK.

Removing the OEM Exhaust.

NOTE: Cutting the factory tailpipe just after the muffler will simplify the removal of the factory exhaust. If you elect to cut the tailpipe after the muffler, you may skip **Ste. 2** and remove the muffler and front pipe as one piece.

1. Apply penetrating oil to the (x2) 15mm nuts at the mid-pipe clamp, muffler clamp, and each rubber hanger on the exhaust.

*Cutting the tailpipe after the muffler and removing it from the vehicle, should be done at this point if that option is being used.

- 2. Loosen the band clamp at the muffler inlet and spray the slip joint liberally with penetrating oil.
- 3. Support the muffler and inlet pipe assembly.
- 4. Remove the tailpipe hanger isolator from the frame rail just after the rear axle (H3).
- 5. Remove the rubber hanger isolator at the hanger assembly before the muffler (H1) and at the rear of the muffler (H2).
- **6.** Remove the muffler and tailpipe assembly.

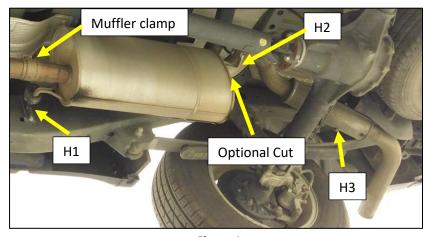


Figure 1

- 7. Loosen the 15mm nut on the clamp of the mid-pipe at the catalytic converter outlet. Fig. 2
- 8. Spray the slip joint liberally with penetrating oil.
- 9. Remove the 13mm bolt at the mid-pipe hanger isolator assembly on the crossmember. Fig.3
- **10.** Remove the mid-pipe from the vehicle.

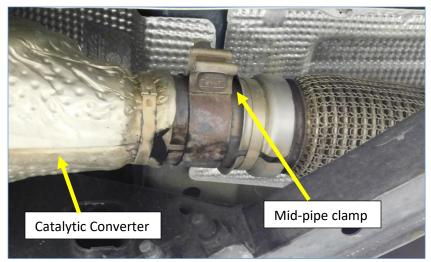


Figure 2

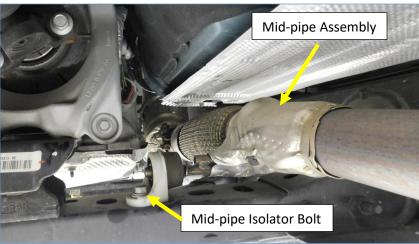


Figure 3

INSTALL YOUR FLOWMASTER EXHAUST SYSTEM



Before installing clamps in the following steps, remove their nuts, apply anti-seize compound to the bolt threads, and re-install the nuts.

1. Install a supplied 2.5" band clamp (11) on to the expanded end of the inlet pipe with the flex. Position the clamp with the bolt on top of the pipe and the nut facing towards the transmission at the 10 o'clock position. Fig.4

IMPORTANT: Be sure the clamp is fully installed on to the pipe and completely covering the narrow notch in the pipe to prevent exhaust leaks. The larger notch at the opening of the pipe will remain uncovered and allow the alignment pin to index the pipe to the catalytic converter.

- 2. Install the inlet pipe (2) onto the catalytic converter and align the indexing slot to the pin on the pipe. Fig.4
- 3. Install the hanger Isolator on to the Inlet pipe hanger rod and install the 13mm bolt. Fig.5

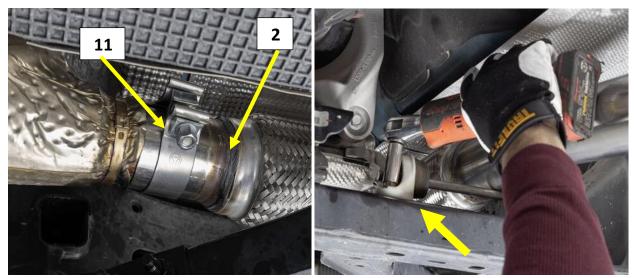


Figure 4 Figure 5

- 4. Install a 3.0" band clamp (10) onto the expanded end of the inlet extension pipe (3).
- 5. Install the extension pipe (3) on to the Inlet pipe (2) and insert the hanger rod into the rubber isolator (H1) on the frame. Tighten the clamp to hold the pipe, but allow for adjustment.
- 6. Install a 3.0" band clamp (10) onto the 3" single inlet of the muffler (1).
- 7. Install the muffler (1) on to the extension pipe (3) with the logo on the bottom. Tighten the clamp to hold the muffler, but allow for adjustment.

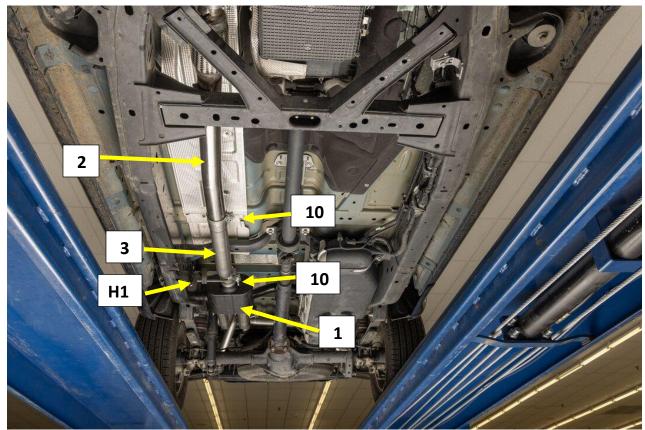


Figure 6

- 8. Install a 2.5" band clamp (11) on each of the muffler outlet pipes.
- 9. Install the Right tailpipe assembly (4) over the axle and align the pipe with the muffler (1).
- 10. Insert the Right pipe into the muffler fully.
- 11. Install the Right tailpipe isolator assembly at the rear of the tailpipe on to the tailpipe hanger rod (H3) and install to the frame with the M8 bolt. See inset below.
- 12. Install the Left Front tailpipe (5) into the muffler and align the hanger rod with the hanger rod on the rear crossmember above the muffler (H2).
- 13. Install the rubber hanger isolator on to tailpipe and frame hanger rods (H2) at the rear of the muffler.
- 14. Tighten the band clamps to hold pipes in place, but allow for adjustment.

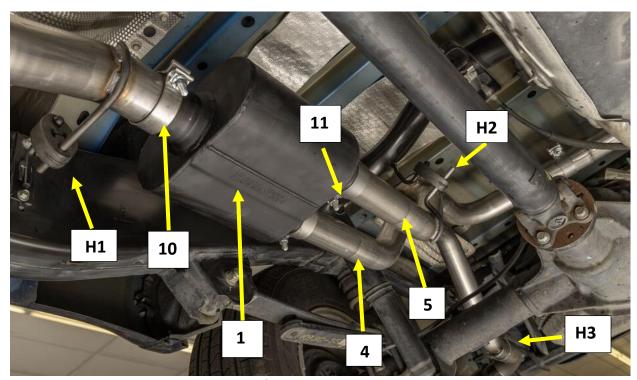


Figure 7



15. Install the frame hanger rod on to the driver frame rail.

NOTE: Removing the spare tire is not required, but is recommended for installing the frame hanger assembly

- Install the supplied 3/8-16 x 1 1/4" bolt (15) and flat washer (13) through the existing hole in the driver's side frame rail just behind the shock. Use a 6" extension and socket to guide and hold the bolt as you guide it through the frame rail Fig.8, Fig.9
- Install the supplied frame hanger rod assembly (9) over the bolt on the inside of the frame rail with the rod facing the spare tire and above the bolt. Fig.9, 10
- Install the split Washer (14), Nut (12), and then tighten. Fig.10
- Install the red rubber isolator onto the hanger rod. Fig.10

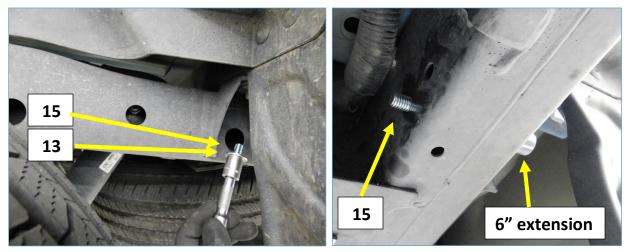


Figure 8 Figure 9

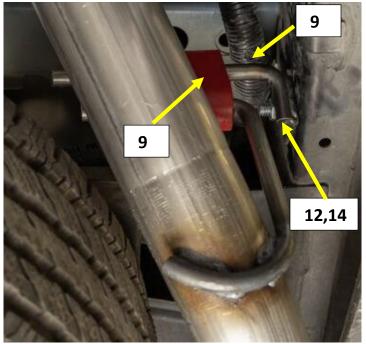


Figure 10

- 16. Install a 2.5" band clamp (11) on to the expanded end of the left rear tailpipe assembly (6)
- 17. Install the left rear tailpipe (6) into the vehicle and slide the expanded end over the outlet of the left front tailpipe (5) just over the differential. Fig.11
- 18. Align the hanger rod (H4) with the frame hanger and install the red rubber isolator, tighten the band clamp (11) to allow for adjustment. Fig. 10

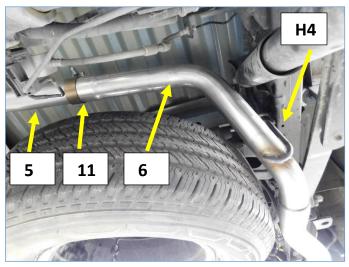


Figure 11

- 19. Install a 2.5" band clamp on to the expanded end of the **Rear Exit Pipes (7) Fig.11.** or the **Side Exit Pipes (8) Fig.12.** Depending on your personal preference.
- 20. Install the tip assembly on to the exit pipe, align the Flowmaster Logo, and tighten the clamp to allow adjustment.
- 21. Starting at the front of the exhaust, align and tighten all clamps and hardware for best fit and clearance.
- 22. Install the push retainers on to the hanger rods.

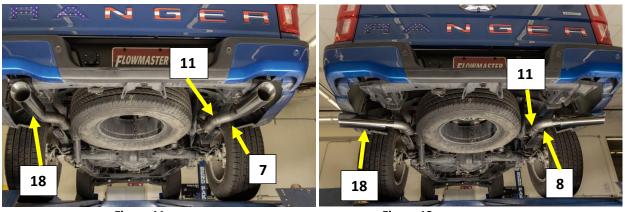


Figure 11 Figure 12

Enjoy your Flowmaster Exhaust!