



INSTALLATION GUIDE: AWE CAT-BACK EXHAUST SUITE FOR THE CAMARO SS/ZL1

For up-to-date fitment information, please visit the product page on <u>AWE-Tuning.com</u>.

THIS GUIDE IS INTENDED FOR THE FOLLOWING PART NUMBERS:

3020-32048	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS - Non-Resonated - Chrome Silver Tips (Dual Outlet)
3020-33052	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS - Non-Resonated - Diamond Black Tips (Dual Outlet)
3015-32100	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS - Resonated - Chrome Silver Tips (Dual Outlet)
3015-33100	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS - Resonated - Diamond Black Tips (Dual Outlet)
3020-32050	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS - Non-Resonated - Chrome Silver Tips (Dual Outlet)
3020-33054	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS - Non-Resonated - Diamond Black Tips (Dual Outlet)
3015-32102	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS - Resonated - Chrome Silver Tips (Dual Outlet)
3015-33102	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS - Resonated - Diamond Black Tips (Dual Outlet)
3020-42066	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Non-Resonated - Chrome Silver Tips (Quad Outlet)
3020-43074	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Non-Resonated - Diamond Black Tips (Quad Out- let)
3015-42090	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Resonated - Chrome Silver Tips (Quad Outlet)
3015-43112	AWE Track Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Resonated - Diamond Black Tips (Quad Outlet)
3020-42068	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Non-Resonated - Chrome Silver Tips (Quad Out- let)
3020-43076	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Non-Resonated - Diamond Black Tips (Quad Outlet)
3015-42092	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Resonated - Chrome Silver Tips (Quad Outlet)
3015-43114	AWE Touring Edition Cat-back Exhaust for Gen6 Camaro SS / ZL1 - Resonated - Diamond Black Tips (Quad Outlet)

Welcome to the AWE family, and congratulations on your purchase of the AWE Exhaust System for the Camaro SS/ZL1.

Exquisite build quality and craftsmanship, coupled with industry leading performance, distinguish this exhaust system from all others.

*For up to the minute fitment information, be sure to visit the AWE website. As always, AWE Performance Specialists are standing by for any questions, <u>right here</u>.

PARTS LIST

INSPECT ALL PARTS PRIOR TO DISASSEMBLY OF VEHICLE; IF DAMAGED OR MISSING, PLEASE CONTACT THE PLACE OF PURCHASE IMMEDIATELY.

Conditional Mid-pipe Exhaust Parts:

- 1 Non-resonated section driver (part B13)
- 1 Non-resonated section pass. (part B14)

Exhaust Parts:

1 X-Pipe section (part B15)

-OR-

NPP OPTIONS

Touring Edition Parts:

- 1 180 Technology[®] rear section driver (*part B18*)
- 1 180Technology[®] rear section pass. (*part B19*)

Track Edition Parts:

- 1 Tailpipe section driver (part B16)
- 1 Tailpipe section pass. (part B17)

Hardware Kit:

- 4 4.5" slash-cut tips (optional finish)
- 2 2.75" Accu-Seal clamps
- 4 3.00" Accu-Seal clamps
- 4 3.0" Tip clamps

1 Resonated section - pass. (part B21)

Resonated section - driver (part B20)

NON-NPP OPTIONS

Touring Edition Parts:

1

- 1 180 Technology[®] rear section driver (*part B24*)
- 1 180Technology[®] rear section pass. (part B25)

Track Edition Parts:

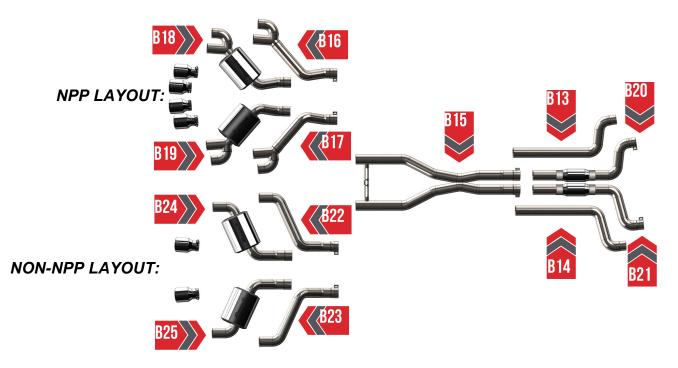
- 1 Tailpipe section driver (part B22)
- 1 Tailpipe section pass. (part B23)

Hardware Kit:

- 2 4.5" slash-cut tips (optional finish)
- 2 2.75" Accu-Seal clamps
- 4 3.00" Accu-Seal clamps
- 2 3.0" Tip clamps



PRO-TIP: Installation of any exhaust should be performed by an experienced professional with the necessary equipment and know-how to effectively complete the install.





STEP 1



NOTE: The factory exhaust will need to be **CUT** from the car to install the AWE Performance Exhaust System, **unless** the 2nd Cat-delete Kit (3010-11096) has been purchased.

Always refer to the manufacturer service manual for precise torque specifications on all OEM fasteners.



WARNING: Allow the exhaust ample time to cool; serious injury and burns can occur if handled at operating temperature.

NPP Equipped Only:

Locate and unplug the factory valve control harnesses from the factory valve control motors, driver side location shown by the arrow in **Figure 1-1**, second motor is in the same location on passenger side.

Loosen and remove the chassis brace, shown by the arrow in **Figure 1-2**.



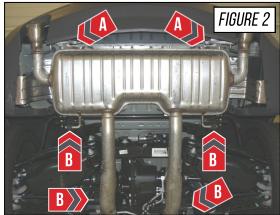




NOTE: Prior to exhaust removal, be sure the system is properly supported with pole jacks or recruit an extra set of hands to help.

Locate and spray the factory hanger bracket bolts with a penetrant oil to assist in removal, location shown by **Arrows A** in **Figure 2**.

Spray the hanger post and bushings with the same penetrant oil, locations shown by **Arrows B** in **Figure 2**.





STEP 3

Secondary Cat-delete Kit installation only: If the cat-back system has been purchased, skip to Step 4.

Locate and spray the factory clamp bolt with a penetrant oil to assist in removal, location shown by **Arrows A** in **Figure 3**.

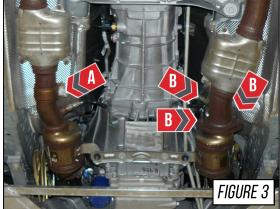
Spray the flange bolts and post-cat O_2 sensor with the same penetrant oil, locations shown by **Arrows B** in **Figure 3**.

Loosen and remove the hardware and O_2 sensor.

The factory exhaust is ready to be removed, skip to Step 5.

PRO-TIP: O₂ sensors are important to how the car manages engine power; during removal, take

measures to insure they do not get damaged or contaminated with dirt or debris.





Marking & Cutting the Factory Exhaust:

PRO-TIPS:

- Use a metal-cutting saw or a chain-style pipe cutter to make the cuts outlined below.
- Masking tape can help provide a guide to make a straight cut.

Cutting the DRIVER side exhaust tube:

Measure from the edge of the weld, as shown by **Arrow A** in Figure 4-1.

Measuring 3-inches back (towards the rear of the car) from the weld, and mark with tape or a marker, as shown by Arrows B in Figure 4-1.

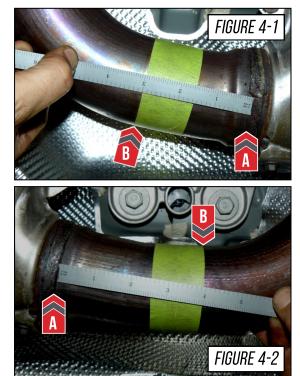
Cutting the PASSENGER side exhaust tube:

Measure from the edge of the weld, as shown by **Arrow A** in Figure 4-2.

Measuring 4-inches back (towards the rear of the car) and mark with tape or a marker, as shown by Arrows B in Figure 4-2.



NOTE: In order to achieve the best fitment and seal, these cuts must be as straight as possible.





NOTE: Use a pole-jack or another person to help remove the factory exhaust.

If Step 3 was performed:

Cut the bracket that secures the driver side clamp onto the outlet tube from the primary catalytic converter, located by the arrow, closer to the heat shielding, in Figure 5-1.

Exhaust removal:

Remove the rear muffler brackets and separate the bushings that were called out in Step 2, this will allow the factory exhaust to be removed from the vehicle

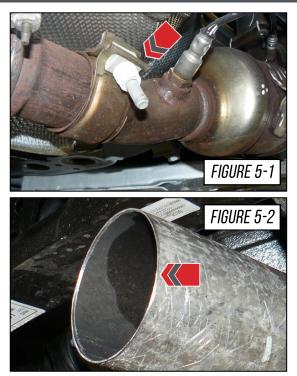
If Step 4 was performed:

Deburr the cut ends of the factory exhaust system, shown by the arrow in Figure 5-2.

For NPP installations:

Before installing the AWE Performance Exhaust, use an electrical tape to seal the open ends of the valve motor harnesses that were disconnected in Step 1.

Secure each harness up and out of the path of potential hot exhaust components or moisture.





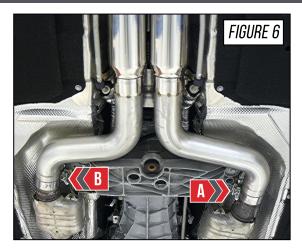
Installing the AWE Performance Cat-Back System:

Place the included 2.75" Accu-Seal clamp over the inlet of the driver side mid-pipe section (*part B13 or B20*) and install onto the corresponding outlet from the factory exhaust, as shown by **Arrow A** in **Figure 6**.

Place the final 2.75" Accu-Seal clamp over the inlet of the passenger side mid-pipe section (part B14 or B21) and install onto the corresponding outlet from the factory exhaust, as shown by **Arrow B** in **Figure 6**.



NOTE: DO NOT torque any clamps until the entire system has been installed and adjusted.



STEP 7

Use two (2) of the included 3.0" Accu-Seal clamps to install the X-pipe section (*part B15*).

Orient the clamps so that once the X-pipe is installed the clamps clear the chassis brace and are rotated as high as possible, as shown by **Arrow A** in **Figure 7-1**.

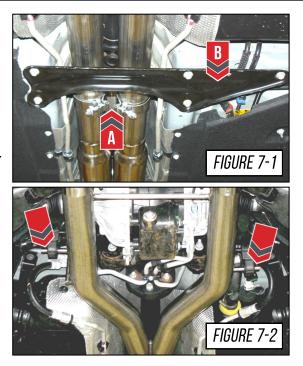


NOTE: Orienting the clamps correctly is needed in order to maintain current ground clearance. Ground contact may occur if the clamps are incorrectly placed.

Insert the posts, located at the outlet ends of the X-pipe section, into the hanger bushings as shown by the arrows in **Figure 7-2**.

Reinstall the chassis brace, as shown by **Arrow B** in **Figure 7-1**.

Torque all five (5) bolts for the chassis brace to factory specification.



STEP 8

Place an included 3.0" Accu-Seal clamp over the driver side tailpipe section (*part B16, B18, B22 or B24*) and install onto the corresponding outlet on the X-pipe section, as shown by **Arrow A** in **Figure 8**.

Place the final 3.0" Accu-Seal clamp over the inlet side of the passenger side tailpipe section (*part B17, B19, B23 or B24*) and install onto the corresponding outlet on the X-pipe section, as shown by **Arrow B** in **Figure 8**.





Transfer the hanger brackets from the factory muffler to the corresponding AWE Tailpipe Sections, as shown by the arrow in **Figure 9**.



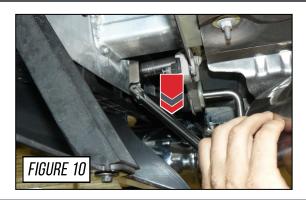
NOTE: The factory hanger brackets are driver and passenger side specific, mixing them up will cause a fitment issue.





Reinstall the factory nuts to secure the hanger brackets into the original location, driver side shown by the arrow in **Figure 10**.

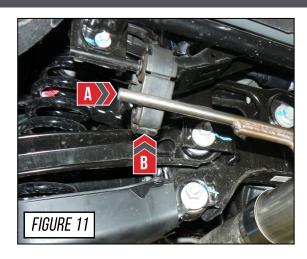
Torque to factory specification.





Insert the hanger bar, shown by **Arrow A** in **Figure 11**, into the factory hanger bushing shown by **Arrow B**.

Repeat for passenger side.





It is crucial to install each section and Accu-Seal clamp correctly to prevent loose joints and exhaust leaks between the tubing connections.

Arrow A in **Figure 12** shows the expanded pipe and the preinstalled Accu-Seal clamp being brought up to the corresponding pipe.

Arrow B in **Figure 12** shows the overlapping pipe installed correctly over the corresponding pipe.

Arrow C in **Figure 12** shows the Accu-Seal clamp being brought to the edge of the expanded pipe.

NOTES:



• Do not torque any Accu-Seal clamp until the entire exhaust has been installed and adjusted.

Torque specification is a minimum of 60 ft/lbs.

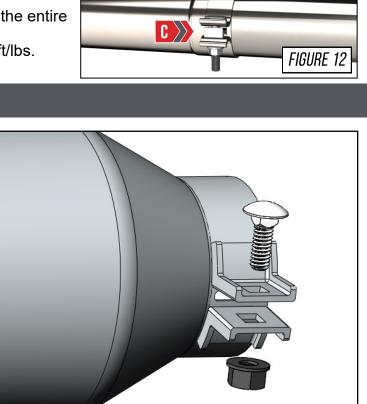


To install the exhaust tips with integrated clamps, first, attach the exhaust tip in the proper orientation onto the exhaust outlet tube.

Insert one of the carriage bolts from the hardware kit (**3910-41010**) through the tab on the exhaust tip and thread on one of the corresponding nuts.

Using anti-seize on the bolt threads will help installation and prevent breakage of hardware.

If exhaust system only has 2 exhaust tips while the integrated clamp kit has enough hardware for our 4 tip exhaust systems. You will have 2 sets of hardware left over that will not be used.

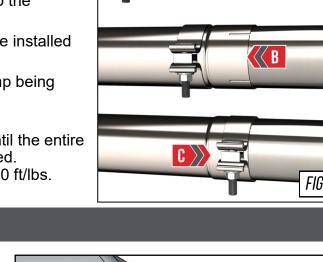




Using the integrated clamp kit, install the 4.5" slash-cut tips as shown in **Figure 14**.

Do not torque the clamps until completely satisfied with placement.







Once tip and tailpipe alignment is satisfactory, torque the Accu-Seal clamps to specification, followed by the tip clamps.

Installation is complete!







Issue	Solution
Exhaust is not fitting correctly	Most fitment issues are due to improperly adjusted exhaust. This includes tip fitments and rattling due to chassis contact. Check out our <u>fitment guide</u> for more installation tips.
Incorrect or missing parts	Double check the parts list for your system and compare them with what you received. Fill out our contact form, found below and let us know what parts you need.



Once installed properly, your AWE exhaust will provide years of trouble-free performance.

The exhaust volume and sound will settle with usage; 800-1000 miles is required to break-in new exhaust systems.

Also, please note that the rear **180Technology**® resonator has a small drain hole to allow condensation to escape. Water drops from this area are normal.

Periodic cleaning of exhaust tips is necessary to maintain proper finish, especially in areas prone to road salt and caustic deicing solutions. Use a mild soap and water solution or car wax to clean the finish. Avoid using abrasive polishes, as they can scratch the finish.

Any questions or comments, please do not hesitate to contact us:

AWE

215-658-1670 CONTACT FORM



WARRANTY

Up-to-date warranty information is found <u>HERE</u>.