

# P/N 2291HKR (painted), 2291-1HKR (ceramic coated), & 2291-2HKR (stainless steel) SUPER COMPETITION HEADERS 2000-2002 Camaro, Firebird, Trans Am

#### To complete (Off Highway) your system, use P/N 16723HKR or 16723-1HKR Y-Pipe.

Thank you for making HOOKER HEADERS your choice in a high-performance exhaust system. Extensive dyno/track testing has enabled HOOKER to offer the most advanced design in exhaust systems. The installation, while not complex, will take a certain amount of time. However, the additional horsepower and improved performance will more than justify your efforts. Proper installation and maintenance will ensure long life and maximum performance from your hooker exhaust system.

#### WARNING! Breaking in an engine with ceramic-coated headers WILL result in damage to the coating and will VOID all warranties. Ceramic-coated headers require several heat cycles to fully cure before they will withstand extreme heat. HOOKER recommends using a cast-iron exhaust manifold or an old header to break in new engines to avoid coating damage.

### **BEFORE STARTING**

Your vehicle must be raised a minimum of 36 inches. A floor hoist is ideal. If no hoist is available, we strongly urge the use of axle stands as a safety measure. <u>CAUTION!</u> YOUR CAR SHOULD NOT BE SUPPORTED ON A BUMPER JACK.

## HELPFUL HINTS FOR HEADER INSTALLATION AND MAINTENANCE

- 1. Verify the header part number with the part number on the box and invoice.
- 2. Unless otherwise noted, Hooker Headers are designed to fit without modifying the header (denting, cutting). DO NOT modify the header. Call Holley's Technical Department at (270) 781-9741.
- 3. Unless other wise noted, Hooker Headers are designed to fit with original equipment (i.e. Oil pan, cylinder heads, mounts, bell housings, starters, etc.).
- 4. When using Hooker Headers, it is recommended to use Hooker gaskets for correct port match. When using other than the recommended Hooker gaskets, match the gaskets to the head ports for a good seal.
- 5. Heat wrapping is not recommended, because it will prematurely fatigue the header.
- 6. Headers that are subjected to extreme conditions (mud, road salt, etc.) should be cleaned on a regular basis to help prevent corrosion.
- 7. When installing the headers, use anti-seize on header bolts and Y-pipe bolts.

## SPECIAL COMPONENTS NEEDED FOR ASSEMBLY

- 1. 145° plug wires are recommended for this application (ex. MSD-32813 or equivalent)
- Oxygen Sensor Simulator: May be purchased from the following: SLP/ Part # 31036/ Phone # 732-349-2109 or Mid-America Designs Inc./ Part # 609132/ Phone # 217-347-5591
- 3. Oxygen Sensor Wire Extension(s) 2 each ------ 28" Long (Included with Header)
- **NOTE:** These Oxygen Sensor Wire Extensions are made long enough to use either the Oxygen Sensor with the 8" wire length or the Oxygen Sensor with the 12" wire length. Any excess wire length after installation should be looped and secured into a non-used and non-heated cavity or pocket.

### HEADER INSTALLATION PROCEDURE / DISASSEMBLY & ASSEMBLY INSTRUCTIONS PLEASE READ THOROUGHLY & CAREFULLY

#### DISASSEMBLY

- 1. Disconnect the battery. Raise the car and support it with jack stands
- 2. Disconnect & remove the four oxygen sensors. Mark their location, so they may be reinstalled in their proper location.
- 3. Remove the drive-shaft safety brace. Remove the Y-pipe from the vehicle.

NOTE: FOR 2001 & 2002 YEAR MODELS, USE THE SUPPLIED BLOCK-OFF PLATE ON THE RIGHT SIDE HEADER E.G.R. PROVISION.

#### **DISASSEMBLY OF THE LEFT SIDE**

- 1. From below, remove the left-side catalytic converter.
- 2. Disconnect and remove the left-side A.I.R. tube assembly and spark plug wires.
- 3. Remove the spark plugs and the left-side exhaust manifold.
- 4. Point the steering wheel straightforward and turn the key to the lock position and remove the key. Remove the steering shaft. <u>Please take note of G.M. Pt. Notice # 26068010 which states:</u> To help avoid damage and possible malfunction of the air bag, do not rotate the steering shaft with the steering shaft disconnected. See the G.M. service manual before disconnecting.
- 5. Remove the small left-side heat shield / deflector. Remove the oil filter

## **DISASSEMBLY OF THE RIGHT SIDE**

- 1. Disconnect and remove the right-side A.I.R. tube assembly. Unbolt and remove the oil dipstick.
- 2. Disconnect and remove the spark plug wires.
- 3. Disconnect the EGR tube by removing the (2) two 8mm bolts. DO NOT try to remove the tube.
- 4. Remove the spark plugs and the right-side exhaust manifold.
- 5. It is not necessary to remove the starter for installation. However, it will allow for better access to the right side #4 spark plug removal and header bolt installation.

## ASSEMBLY OF THE LEFT SIDE WITH HEADER

## NOTE: Use anti-seize on all header bolts and oxygen sensor threads.

- 1. Insert the left-side header through the chassis from below.
- 2. From above, install the gasket.
- 3. Using the supplied 8mm lock washers over the factory exhaust bolts, start all the header bolts prior to tightening, then evenly tighten all the header bolts to 20-25 ft./lbs.
- 4. Reinstall the steering shaft and tighten the bolt to factory specifications.
- 5. Reinstall the spark plugs and tighten.
- 6. Reinstall the spark plug wires. Check to ensure that they do not contact the header.
- 7. Reinstall the left-side A.I.R. tube assembly.
- Install the left-side pre-catalytic converter oxygen sensor into the left-side header collector. NOTE: The oxygen sensor simulator needs to be installed according to directions supplied by the simulator manufacturer. Use the 28" supplied extension to complete the simulator install.
- **NOTE:** These Oxygen Sensor Wire Extensions are made long enough to use either the Oxygen Sensor with the 8" wire length or the Oxygen Sensor with 12" wire length. Any excess wire length after installation should be looped and secured into a non-used and non-heated cavity or pocket.
- 9. Reinstall the small left-side heat shield/ deflector and oil filter.

#### ASSEMBLY OF THE RIGHT SIDE WITH HEADER

- 1. Insert the right-side header through chassis from below.
- 2. From above, install the gasket.
- 3. Using the supplied 8mm lock washers over the factory exhaust bolts, start all the header bolts prior to tightening, then evenly tighten all the header bolts to 20-25 ft./lbs.
- 4. Reinstall the spark plugs and tighten. Reinstall the spark plug wires. Check to ensure that they do not contact the header.
- 5. Reattach the EGR tube by reinstalling the (2) two 8mm bolts through the EGR plate.
- 6. Reinstall the dipstick and tighten the retainer bolt. Reinstall the right-side A.I.R. tube assembly.
- Install the right-side pre-catalytic converter oxygen sensor into the right-side header collector. NOTE: The oxygen sensor simulator needs to be installed according to directions supplied by the simulator manufacture. Use the 28" supplied extension to complete the simulator install.
- 8. Reinstall the starter (if removed).
- **NOTE:** These Oxygen Sensor Wire Extensions are made long enough to use either the Oxygen Sensor with the 8" wire length or the Oxygen Sensor with 12" wire length. Any excess wire length after installation should be looped and secured into a non-used and non-heated cavity or pocket.

## PRIOR TO FINISHING CHECK LIST

- 1. Inspect the steering shaft for proper installation.
- 2. Check to ensure that no wires will come in contact with the headers.
- 3. Check to ensure that no (I/s and r/s) heat shields come in contact with the headers.
- 4. Check to ensure that all emission A.I.R. hoses are clamped properly.
- 5. Check to ensure that any and all electrical connections that were disconnected are properly reconnected.
- 6. Check to ensure that all oxygen sensor wires are looped and secured in a non-used and non-heated cavity or pocket.
- 7. NOTE: Y-PIPE PART NUMBER 16787HKR OR 16787-1HKR IS RECOMMENDED TO BE USED AND INSTALLED WITH THIS HEADER P/N 2291HKR OR 2291-1HKR.
- 8. Reconnect the battery. Start the car and check for leaks.

## LIMITATION OF LIABILITY - DISCLAIMER:

The regulation of emissions production, noise levels, and safety standards is undertaken by the federal government, each of the fifty state legislatures, and by many local municipalities, towns, and counties.

HOOKER makes no warranties of merchantability, of fitness for particular purpose, or that its products are approved for general use, or that its products are approved for general use, or that its products comply with laws, regulations, or ordinances in the state where they may be sold to the ultimate purchaser, the consumer.

Unless expressly stated to the contrary in the catalog, instruction sheet; or price list, the entire risk as to the conformity of any company product in any such state and as to repair should the product prove to be defective or non-conforming, is on the retail purchaser, the buyer, the ultimate consumer, of such product and it is not upon the seller, distributor, or manufacturer.

In this connection, the retail purchaser, the buyer, the ultimate consumer assumes the burden of the entire cost of any and all necessary service, alterations, or repair.

#### THE FOREGOING STATEMENT LIMITS THE LIABILITY OF THE MANUFACTURER.

California vehicle code, sections 27156 AND 38391, prohibits the advertising, offering for sale, or installation of any device, which modifies a vehicle's emission control system, unless exempted, unless otherwise noted. HOOKER Headers have not received an exemption from these code sections and are to legal for sale or use in California on vehicles originally equipped with catalytic converters, it is illegal, except for racing vehicles, which may never be driven upon a highway. To remove or otherwise render inoperative any emission control device on the regulated motor vehicles – check catalog listings to ensure proper application in the other 49 states, unless otherwise noted, HOOKER Headers are not legal for pollution-controlled motor vehicles, except for racing vehicles, which may never be used upon a highway and are not intended or applicable for highway use.

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