

State of California  
AIR RESOURCES BOARD

EXECUTIVE ORDER D-216-2  
Relating to Exemptions Under Section 27156  
of the Vehicle Code

J. BITTLE AMERICAN, INC.  
SHORTY HEADER, MODEL NOS. 1627 & 1628

Pursuant to the authority vested in the Air Resources by Section 27156 of the Vehicle Code; and

Pursuant to the authority vested in the undersigned by Section 39515 and 39516 of the Health and Safety Code and Executive Order G-45-5;

IT IS ORDERED AND RESOLVED: That the installation of the Shorty Header Model Nos. 1627 & 1628 manufactured by J. Bittle American, Inc. of 9630 Aero Dr., San Diego, CA 92123, has been found not to reduce the effectiveness of required motor vehicle pollution control devices, and therefore is exempt from the prohibitions of Section 27156 of the Vehicle Code for 1985-91 model-year Ford light-duty trucks powered by a 5.0 or 5.8 liter V-8 gasoline engine.

This Executive Order is valid provided that installation instructions for this device will not recommend tuning the vehicle to specifications different from those submitted by the device manufacturer.

Changes made to the design or operating conditions of the device, as exempted by the Air Resources Board, that adversely affect the performance of a vehicle's pollution control system shall invalidate this Executive Order.

Marketing of this device using an identification other than that shown in this Executive Order or marketing of this device for an application other than those listed in this Executive Order shall be prohibited unless prior approval is obtained from the Air Resources Board. Exemption of a kit shall not be construed as an exemption to sell, offer for sale, or advertise any component of the product as an individual device.

This Executive Order does not constitute any opinion as to the effect that the use of this device may have on any warranty either expressed or implied by the vehicle manufacturer.

THIS EXECUTIVE ORDER DOES NOT CONSTITUTE A CERTIFICATION, ACCREDITATION, APPROVAL, OR ANY OTHER TYPE OF ENDORSEMENT BY THE AIR RESOURCES BOARD OF ANY CLAIMS OF THE APPLICANT CONCERNING ANTI-POLLUTION BENEFITS OR ANY ALLEGED BENEFITS OF THE J. BITTLE AMERICAN, INC. SHORTY HEADER MODEL NOS. 1627 & 1628.

No claim of any kind, such as "Approved by the Air Resources Board" may be made with respect to the action taken herein in any advertising or other oral or written communications.

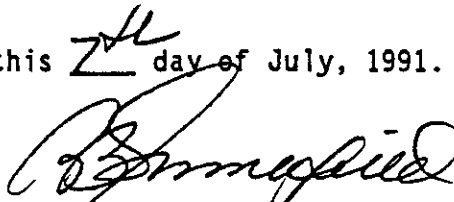
Section 17500 of the Business and Professions Code makes untrue or misleading advertising unlawful, and Section 17534 makes violation punishable as a misdemeanor.

Section 43644 of the Health and Safety Code provides as follows:

"43644, (a) No person shall install, sell offer for sale, or advertise or except in an application to the state board for certification of a device, represent, any device as a motor vehicle pollution control device for use on any used motor vehicle unless that device has been certified by the state board. No person shall sell, offer for sale, advertise, or represent any motor vehicle pollution control device as a certified device which, in fact, is not a certified device. Any violation of this subdivision is a misdemeanor."

Any apparent violation of the conditions of this Executive Order will be submitted to the Attorney General of California for such action as he deems advisable.

Executed at El Monte, California, this 24 day of July, 1991.



R.B. Summerfield  
Assistant Division Chief  
Mobile Source Division

State of California  
AIR RESOURCES BOARD

EVALUATION OF J. BITTLE AMERICAN, INC. SHORTY HEADER  
MODEL NOs. 1627 & 1628 FOR EXEMPTION FROM THE PROHIBITIONS OF VEHICLE CODE  
SECTION 27156 IN ACCORDANCE WITH SECTION 2222, TITLE 13, OF THE  
CALIFORNIA CODE OF REGULATIONS

July 1991

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by

Mobile Source Division  
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Air Resources Board  
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(This report has been reviewed by the staff of the California Air Resources Board and approved for publication. Approval does not signify that the contents necessarily reflect the views and policies of the Air Resources Board, nor does mention of trade names or commercial products constitute endorsement or recommendation for use.)

## SUMMARY

J. Bittle American, Inc. (JBA) of 9630 Aero Dr., San Diego, CA. 92123 has applied for an exemption from the prohibitions in Section 27156 of the California Vehicle Code (VC) for the Shorty Header, Model Nos. 1627 & 1628. The Shorty Header is designed for installation on 1985-1991 Ford light-duty trucks powered by a 5.0 or 5.8 liter V-8 with EFI gasoline engine.

JBA has submitted a completed application and all the required information including comparative exhaust emissions test data from an independent laboratory which shows that the Shorty Header does not have any adverse effects on the emissions of the applicable vehicles.

The staff recommends that JBA be granted an exemption as requested and that Executive Order D-216-2 be issued for their Shorty Header, Model Nos. 1627 & 1628.

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I. INTRODUCTION

J. Bittle American, Inc. (JBA) of 9630 Aero Dr., San Diego, CA. 92123 has applied for an exemption from the prohibitions in Section 27156 of the California Vehicle Code (VC) for the Shorty Header, Model Nos. 1627 & 1628. The Shorty Header is designed for installation on 1985-1991 Ford light-duty trucks powered by a 5.0 or 5.8 liter V-8 with EFI gasoline engine. JBA has submitted a completed application and all the required information including comparative exhaust emissions test data performed at Milton Roy Company.

II. CONCLUSIONS

Based on submitted data from emissions testing performed at an independent laboratory, the staff concludes that the Shorty Header does not have any adverse effects on emissions of the applicable vehicles.

III. RECOMMENDATION

The staff recommends that JBA be granted an exemption as requested and that Executive Order D-216-2 be issued for their Shorty Header, Model Nos. 1627 & 1628.

IV. SHORTY HEADER DESCRIPTION

The JBA Shorty Header is designed to replace the original equipment manufacturer's (OEM) exhaust manifold. Compared to the OEM which has variable diameters and bottle necks in all four pipes, the tube diameter of Shorty Header's four individual tubes remains constant from the engine block to the four way junction which connects to a single exhaust pipe.

The manufacturer claims this feature enhances exhaust flow. All other characteristics of the OEM exhaust manifold are the same as the Shorty Header.

V. DISCUSSION OF THE SHORTY HEADER

JBA Shorty Header, Model Nos. 1627 & 1628 is designed for installation on 1985-1991 model-year Ford light-duty trucks powered by a 5.0 or 5.8 liter V-8 gasoline engine. Model Nos. 1627 is applicable only to vehicles powered with a 5.0 liter engine and Model Nos. 1628 is applicable only to vehicles powered with a 5.8 liter engine. A 1991 F-150 powered by a 5.0 liter gasoline engine with Shorty Header, Model Nos. 1627 installed was used as the test vehicle. Testing consisted of one cold-start CVS-75 Federal Test Procedure with the JBA Shorty Header installed. Test results were compared against the vehicle's emission standards.

The following are the emissions test results from testing conducted at Milton Roy Company.

Independent Laboratory:

Milton Roy Company, 1238 West Grove Ave., Orange, CA 92665-4134

Data

	THC	CO	NOx
Standard	0.50	9.0	1.0
W/Device	0.11	0.64	0.57
D. F.	1.119	1.000	1.036

Results from test conducted at Milton Roy Company show the vehicle emissions with the JBA Shorty Header installed to be lower than the emission standards. Therefore, the Shorty Header kit Model Nos. 1627 and 1628 has demonstrated compliance with the requirements for the VC 27156 exemption.



APPENDIX

part # 1627

**\*\*THIS PART IS NOT PRESENTLY  
LEGAL FOR STREET USE ON EMISSION  
CONTROLLED VEHICLES\*\***

**INSTALLATION INSTRUCTIONS FOR F-  
150 SHORTY HEADERS ON '85-'90  
TRUCK AND BRONCO**

**PLEASE READ THESE INSTRUCTIONS  
BEFORE STARTING INSTALLATION**

- 1) Disconnect battery cable.
- 2) Remove air inlet hoses from engine and air box. Remove sparkplug wires and looms.
- 3) Unbolt manifolds from exhaust system, then engine.
- 4) Install new headers with new bolts and gaskets. Make sure all bolts are started before final tightening. Dipstick may require modification before final assembly.
- 5) Reattach exhaust system.
- 6) Reinstall plug looms and wires on plugs. Reconnect battery.
- 7) Start engine and let warm up. Retighten all fasteners.

Parts List:

Right and Left header assy., 2 flange gaskets, 16 header bolts.

# **JBA**

**J. Bittle American Inc.**

A JBA Shorty consists of:

Each of the following for the right and left side of the engine.

- One 3/8" mild steel head flange
- Four 1-1/2" diameter tubes
- One collector
- One flange collector flange
- One Collector to exhaust-pipe sealing dome.
- One high temperature head flange gasket
- All fasteners required for installation

The Principle of operation is simple:

The manifold collects the exhaust gases from the exhaust ports, collects them, and provides a single passage to deliver the gases to the OEM catalytic convertors.

These exhaust manifolds are to be built exclusively by JBA

J. B I T T L E A M E R I C A N

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*Racing into the future.*