

**State of California
AIR RESOURCES BOARD**

EXECUTIVE ORDER DE-05-005

Pursuant to the authority vested in the Air Resources Board by Health and Safety Code, Div. 26, Part 5, Chap. 2; and pursuant to the authority vested in the undersigned by Health and Safety Code section 39515 and 39616 and Executive Order G-02-003;

Relating to Exemptions under Section 27156 of the Vehicle Code, and Verification under Sections 2700 through 2710 of Title 13 of the California Code of Regulations

International Truck & Engine Corporation
DPX™ Catalyzed Soot Filter System

The California Air Resources Board (ARB) has reviewed International Truck & Engine Corporation's request for verification of the DPX™ Catalyzed Soot Filter System. Based on an evaluation of the data provided, and pursuant to the terms and conditions specified below, the Executive Officer of the ARB hereby finds that the DPX™ Catalyzed Soot Filter System reduces emissions of diesel particulate matter (PM) consistent with a Level 3 device (greater than or equal to 85 percent reductions) (Title 13 California Code of Regulations (CCR) sections 2702 (f) and (g) and section 2708). Accordingly, the Executive Officer determines that the system merits verification and, subject to the terms and conditions specified below, classifies the DPX™ Catalyzed Soot Filter System as a Level 3 system, for the applications listed in Table 1 and engine families listed in Attachment 1.

Table 1: Appropriate Applications for the DPX Catalyzed Soot Filter System

Diesel Emission Control Strategy	Application
DPX™ Catalyzed Soot Filter System	On-road Application

The aforementioned verification is subject to the following terms and conditions:

- The engines are originally manufactured from model years 1994 – 2003 with the engine family names listed in Attachment 1.
- The engines do not employ exhaust gas recirculation (EGR).
- The application must have a duty cycle with a temperature profile at least 225 degrees Celsius for 50 percent of the duty cycle and 300 degrees Celsius for 10 percent of the duty cycle.
- The engine may not have a pre-existing original equipment manufacturer oxidation catalyst.

- The engine must not have a pre-existing diesel particulate filter (DPF).
- The engine must be certified in California for on-road applications.
- The engine must be certified at a PM emission level of at most 0.1 grams per brake horsepower-hour (g/bhp-hr) and greater than 0.01 g/bhp-hr.
- The engine must be four-stroke.
- The engine must be turbocharged.
- The engine can be mechanically or electronically injected
- The engine should be well maintained and not consume lubricating oil at a rate greater than that specified by the engine manufacturer.
- Lube oil, or other oil, should not be mixed with the fuel.
- The engine must be operated on diesel fuel (e.g. not biodiesel blends or alternative diesel fuels) with a sulfur content of no more than 15 parts per million by weight.
- The other terms and conditions specified below.

IT IS ALSO ORDERED AND RESOLVED: That installation of DPX™ Catalyzed Soot Filter System, manufactured by International Truck & Engine Corporation of 4201 Winfield Road, Warrenville, Illinois 60555, has been found not to reduce the effectiveness of the applicable vehicle pollution control system, and therefore, the DPX™ Catalyzed Soot Filter System is exempt from the prohibitions in Section 27156 of the Vehicle Code for installation on heavy-duty on-road vehicles listed in Attachment 1.

This exemption is only valid provided the engines meet the aforementioned conditions.

The DPX™ Catalyzed Soot Filter System consists of a catalyzed passive DPF and a backpressure monitor. The major components of the DPX™ Catalyzed Soot Filter System are identified in Attachment 2.

This Executive order is valid provided that installation instructions for the DPX™ Catalyzed Soot Filter System do not recommend tuning the vehicle to specifications different from those of the vehicle manufacturer.

Changes made to the design or operating conditions of the DPX™ Catalyzed Soot Filter System, as exempted by ARB, which adversely affect the performance of the vehicle's pollution control system, shall invalidate this Executive Order.

No changes are permitted to the device. The ARB must be notified in writing of any changes to any part of the DPX™ Catalyzed Soot Filter System. Any changes to the device must be evaluated and approved by ARB. Failure to do so shall invalidate this Executive Order.

Marketing of the DPX™ Catalyzed Soot Filter System using identification other than that shown in this Executive Order or for an application other than that listed in this Executive Order shall be prohibited unless prior approval is obtained from ARB.

This Executive Order shall not apply to any DPX™ Catalyzed Soot Filter System advertised, offered for sale, sold with, or installed on a motor vehicle prior to or concurrent with transfer to an ultimate purchaser.

As specified in the Diesel Emission Control Strategy Verification Procedure (Title 13 CCR section 2706 (g)), ARB assigns each Diesel Emission Control Strategy a family name. The designated family name for the verification as outlined above is:
CA/ITE/2005/PM3/N00/ON/DPF01.

Additionally, as stated in the Diesel Emission Control Strategy Verification Procedure, International Truck & Engine Corporation is responsible for honoring their warranty (Section 2707) and conducting in-use compliance testing (Section 2709).

In addition to the foregoing, ARB reserves the right in the future to review this Executive Order and the exemption and verification provided herein to assure that the exempted and verified add-on or modified part continues to meet the standards and procedures of California Code of Regulations, Title 13, Section 2222, et seq and California Code of Regulations, Title 13, Sections 2700 through 2710.

Systems certified under this Executive Order shall conform to all applicable California emissions regulations.

Violation of any of the above conditions shall be grounds for revocation of this Executive Order.

Executed at El Monte, California, this 17th day of June 2005.

//s//

Robert H. Cross, Chief
Mobile Source Control Division

Attachment 1: ARB Approved Model Year 1994 to 2003 Engine Families for the DPX™ Catalyzed Soot Filter System

Attachment 2: Part Numbers and Model Numbers of the DPX™ Catalyzed Soot Filter System and Standard Part Numbers of Backpressure Monitor