

State of California  
AIR RESOURCES BOARD

EXECUTIVE ORDER A-6-708  
Relating to Certification of New Motor Vehicles

GENERAL MOTORS CORPORATION

Pursuant to the authority vested in the Air Resources Board by the Health and Safety Code, Division 26, Part 5, Chapter 2; and

Pursuant to the authority vested in the undersigned by Health and Safety Code Sections 39515 and 39516 and Executive Order G-45-9;

IT IS ORDERED AND RESOLVED: That 1996 model-year General Motors Corporation exhaust emission control systems are certified as described below for passenger cars:

Emission Standard Category: Transitional Low-Emission Vehicle (TLEV)

Fuel Type: Gasoline

Engine Family: TGM2.4VJG2EK Displacement: 2.4 Liters (145 Cubic Inches)

Exhaust Emission Control Systems and Special Features:

Exhaust Gas Recirculation  
Oxygen Sensor  
Heated Oxygen Sensor  
Three Way Catalytic Converter  
Sequential Multiport Fuel Injection

Vehicle models, transmissions, engine codes and evaporative emission control families are listed on attachments.

The TLEV certification exhaust emission standards for this engine family in grams per mile are:

<u>Miles</u>	<u>Non-Methane Organic Gas</u>	<u>Carbon Monoxide</u>	<u>Nitrogen Oxides</u>	<u>Formaldehyde</u>	<u>Carbon Monoxide (20<sup>0</sup>F)</u>
50,000	0.125	3.4	0.4	0.015	10.0
100,000	0.156	4.2	0.6	0.018	n/a

Reactivity Adjustment Factor (RAF) for NMOG Mass Emission: 0.98

The certification exhaust emission values set forth for non-methane organic gas (NMOG) reflect application of a 0.98 RAF for 1996 model-year TLEVs. The TLEV certification exhaust emission values for this engine family in grams per mile are:

<u>Miles</u>	<u>Non-Methane Organic Gas</u>	<u>Carbon Monoxide</u>	<u>Nitrogen Oxides</u>	<u>Formaldehyde</u>	<u>Carbon Monoxide (20<sup>0</sup>F)</u>
50,000	0.077	1.6	0.1	0.001	5.5
100,000	0.092	2.3	0.2	0.002	n/a

BE IT FURTHER RESOLVED: That the vehicle manufacturer is certifying the listed vehicle models to the aforementioned exhaust emission standards based on its submitted plan to comply with the fleet average NMOG exhaust mass emission requirements as set forth in "California Exhaust Emission Standards and Test Procedures for 1988 and Subsequent Model Passenger Cars, Light-Duty Trucks, and Medium-Duty Vehicles".

BE IT FURTHER RESOLVED: That under the submitted NMOG fleet average compliance plan, if the manufacturer incurs a NMOG debit for the aforementioned model year based on the projected NMOG fleet average exceeding the value required by the above-referenced standards and test procedures, all incurred NMOG debits by the manufacturer shall be equalized as required by the standards and test procedures.

BE IT FURTHER RESOLVED: That the vehicle manufacturer is certifying the listed vehicle models to the 50,000-mile evaporative emission standards applicable to 1980 through 1994 model-year vehicles in the "California Evaporative Emission Standards and Test Procedures for 1978 and Subsequent Model Motor Vehicles," and the listed vehicle models comply with those standards.

BE IT FURTHER RESOLVED: That, based on the evaporative emission phase-in compliance schedule submitted by the vehicle manufacturer, the listed vehicle models shall not be subject to the running loss and useful life standards set forth in the "California Evaporative Emission Standards and Test Procedures for 1978 and Subsequent Model Motor Vehicles."

BE IT FURTHER RESOLVED: That the listed vehicle models also comply with the Board's "Specifications for Fill Pipes and Openings of Motor Vehicle Fuel Tanks" for the aforementioned model year (Title 13, California Code of Regulations, Section 2235).

BE IT FURTHER RESOLVED: That the listed vehicle models also comply with the Board's high-altitude requirements and highway emission standards, and with the California Inspection and Maintenance emission standards in place at the time of certification, as stipulated in "California Exhaust Emission Standards and Test Procedures for 1988 and Subsequent Model Passenger Cars, Light-Duty Trucks, and Medium-Duty Vehicles".

BE IT FURTHER RESOLVED: That the listed vehicle models also comply with the "California Motor Vehicle Emission Control Label Specifications" for the aforementioned model year (Title 13, California Code of Regulations, Section 1965).

BE IT FURTHER RESOLVED: That the listed vehicle models also comply with the "Malfunction and Diagnostic System Requirements--1994 and Subsequent Model-Year Passenger Cars, Light-Duty Trucks, and Medium-Duty Vehicles and Engines" (Title 13, California Code of Regulations, Section 1968.1) for the aforementioned model year.


BE IT FURTHER RESOLVED: That for the listed vehicles, the manufacturer has submitted and the Executive Officer hereby approves the materials to demonstrate certification compliance with the Board's emission control system warranty provisions (Title 13, California Code of Regulations, Section 2035 et seq.).

BE IT FURTHER RESOLVED: That the vehicle manufacturer has demonstrated compliance with the exhaust emission standards at 50 degrees Fahrenheit as stipulated in "California Exhaust Emission Standards and Test Procedures for 1988 and Subsequent Model Passenger Cars, Light-Duty Trucks, and Medium-Duty Vehicles."

Vehicles certified under this Executive Order must conform to all applicable California emission regulations.

The Bureau of Automotive Repair will be notified by copy of this order and attachment.

Executed at El Monte, California this 7 day of July 1995.

  
R. B. Summerfield for  
Assistant Division Chief  
Mobile Source Division

## 1996 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: TGM2.4VJG2EK EVAP. FAMILY: TGM1089AYM0A  
 ALL ENGINE CODES IN ENGINE FAMILY: CA X 49S     50S     AB965      
 EXH STD: CA Tier-1     TLEV X LEV     ULEV     ZEV    ; U.S. EPA Tier-1 NA  
 EVAP STD: 50K X USEFUL LIFE WITH R/L    ; IN-USE EXH STD: FULL X ALTERNATIVE      
 VEH CLASS(ES): PC X LDT1     LDT2     MDV1     MDV2     MDV3     MDV4     MDV5      
 SINGLE CERT STD FOR MULTI-CLASS ENGINE FAMILY: NA  
 FUEL TYPE(S): DEDICATED X GASOLINE X; EMISS TEST FUEL(S): INDO     PHASE 2 X  
 SERVICE ACCUM: STD AMA     MFR ADP X; NMOG TEST PROC:     EQUIV X  
 R/L TEST PROC: NA PT SOURCE    ; HYBRID TYPE: NA APU CYCLE: NA  
 ENGINE CONFIGURATION: I4 X V6     V8     DISPLACEMENT: 2.4 LITERS/ 145 CU. IN.  
 VALVES/CYLINDER: 2     4 X RATED HP: 150 @ 6000 RPM  
 ENGINE LOCATION: FRONT X DRIVE: FWD X RWD     4WD-FT     4WD-PT      
 EXHAUST EMISSION CONTROL SYSTEM: EGR, O2S, HO2S, SFI, TWC  
 RLHP/DPA VALUES: SECTION 08.13.02.00

ENG CODE (LOC)	VEH MODELS (SEE PAGE 1)	TRANS. (M5, A4 ETC.)	EQUIV. TEST WEIGHT	IGNITION (ECM/PCM) PART NO.	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
31	2NE37 2NE69 3NL37 3NL69 4NJ37 4NJ69 2NW37 2NW69	A4/CUW	3250	16231613/BSUF	17096100, 17096306	25160529
			3375			

CARLINE NAME	CARLINE CODE
PONTIAC GRAND AM	33025
OLDSMOBILE ACHIEVA	29010
BUICK SKYLARK	08055

ISSUED: ML-TP095

REVISED:

17-TGM2.4VJG2EK-2

AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET  
GASOLINE-FUELED PASSENGER CARS

VEHICLE MODELS: 1 J C 3 7 (EXAMPLE)

Digit 1 - Selling Division

- 1 - Chevrolet
- 2 - Pontiac
- 3 - Oldsmobile
- 4 - Buick
- 6 - Cadillac
- 8 - Saturn

Digit 2 - Body Designation

- A - Cutlass Ciera, Cutlass Cruiser, Century, Century Wagon
- B - Caprice, Caprice Wagon, Roadmaster Wagon, Coachbuilder Wagon, Roadmaster
- C - Ninety-Eight, Park Avenue
- D - Fleetwood, Limousine, Funeral Coach/Hearse
- E - Eldorado
- F - Camaro, Firebird/Formula
- G - Riviera, Aurora
- H - Bonneville, Eighty-Eight, LeSabre
- J - Cavalier, Sunfire
- K - Seville
- Ksp - Deville/Concours
- L - Corsica, Beretta
- N - Grand Am, Achieva, Skylark
- W - Grand Prix, Regal, Cutlass Supreme, Lumina, Monte Carlo
- Y - Corvette
- Z - Saturn SC, SL, SW

Digit 3 - Trim Level

B, C, D, E, F, G, H, J, K, L, M, N, P, R, S, T, U, V, W, X, Y, Z

Digits 4 & 5 - Body Style

- |                            |                            |
|----------------------------|----------------------------|
| 07 - 2Dr Sport Coupe       | 37 - 2Dr Hardtop Coupe     |
| 08 - 2Dr Hatchback Coupe   | 47 - 2Dr Hardtop Coupe     |
| 11 - 2Dr Notchback         | 57 - 2Dr Hardtop Coupe     |
| 15 - 2Dr Station Wagon     | 67 - 2Dr Convertible Coupe |
| 19 - 4Dr Sedan             | 68 - 4Dr Hatchback Sedan   |
| 23 - 4Dr Aux. Seat Sedan   | 69 - 4Dr (Notchback) Sedan |
| 27 - 2Dr (Notchback) Coupe | 77 - 2Dr Hatchback Coupe   |
| 29 - 4Dr Sedan             | 87 - 2Dr Hatchback Coupe   |
| 35 - 4Dr Station Wagon     | 90 - Commercial Chassis    |

ISSUED: ML-TP095

REVISED:

17-TGM2.4VJG2EK-1

## 1996 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: TGM2.4VJG2EK EVAP. FAMILY: TGM1089AYM0A

<u>ENG CODE (LOC)</u>	<u>VEH MODELS (SEE PAGE 1)</u>	<u>TRANS. (M5, A4 ETC.)</u>	<u>EQUIV. TEST WEIGHT</u>	<u>IGNITION (ECM/PCM) PART NO.</u>	<u>EGR SYSTEM PART NO.</u>	<u>CATALYTIC CONVERTER PART NO.</u>
32	1JF37 2JB37 1JF67 1JF69 2JB69 2JD37 2JB67	A4/WPR	3125  3250  3375	16231403/BSSW	17096100, 17096306	25160527
33	1JF67 2JB67		3250 3375	16207973/BLUU		

<u>CARLINE NAME</u>
CHEVROLET CAVALIER
PONTIAC SUNFIRE

<u>CARLINE CODE</u>
12060
33060

ISSUED: ML-TP095

REVISED:

17-TGM2.4VJG2EK-3