

State of California
AIR RESOURCES BOARD

EXECUTIVE ORDER A-6-712
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:

Fuel Type: Gasoline

Engine Family: TGM3.8V8GFFK Displacement: 3.8 Liters (231 Cubic Inches)

Exhaust Emission Control Systems and Special Features:

Exhaust Gas Recirculation
Three Way Catalytic Converter
Heated Oxygen Sensors (Two)
Sequential Multiport Fuel Injection
Supercharger

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

The certification exhaust emission standards (in-use compliance standards in parentheses) for this engine family in grams per mile are:

<u>Miles</u>	<u>Non-Methane Hydrocarbons</u>	<u>Carbon Monoxide</u>	<u>Nitrogen Oxides</u>	<u>Carbon Monoxide (20°F)</u>
50,000	0.25 (0.32)	3.4 (5.2)	0.4 (0.4)	10.0 (10.0)
100,000	0.31 (n/a)	4.2 (n/a)	0.6 (n/a)	n/a

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

<u>Miles</u>	<u>Non-Methane Hydrocarbons</u>	<u>Carbon Monoxide</u>	<u>Nitrogen Oxides</u>	<u>Carbon Monoxide (20°F)</u>
50,000	0.15	1.9	0.1	6.0
100,000	0.15	2.3	0.2	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 non-methane organic gas (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, based on a separate compliance plan submitted by the vehicle manufacturer, the listed vehicle models are permitted alternative in-use compliance 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 the submitted alternative in-use compliance plan satisfies the requirement that a maximum of 20 percent of the manufacturer's projected sales of 1996 model-year California-certified passenger cars and light-duty trucks will be subject to alternative in-use compliance as stipulated in the above-referenced 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.).

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 13th day of July, 1995.



R. B. Summerfield
Assistant Division Chief
Mobile Source Division

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 - Commerical Chassis |

1996 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: TGM3.8V8GFFK EVAP. FAMILY: TGM1070AYMAA
 ALL ENGINE CODES IN ENGINE FAMILY: CA___ 49S___ 50SX AB965___
 EXH STD: CA Tier-1X TLEV___ LEV___ ULEV___ ZEV___ ; U.S. EPA Tier-1 X
 EVAP STD: 50KX USEFUL LIFE WITH R/L___ ; IN-USE EXH STD: FULL___ ALTERNATIVE X
 VEH CLASS(ES): PCX LDT1___ LDT2___ MDV1___ MDV2___ MDV3___ MDV4___ MDV5___
 SINGLE CERT STD FOR MULTI-CLASS ENGINE FAMILY: NA
 FUEL TYPE(S): DEDICATEDX GASOLINEX ; EMISS TEST FUEL(S): INDO___ PHASE 2 X
 SERVICE ACCUM: STD AMAX MFR ADP___ ; NMOG TEST PROC: NA EQUIV___
 R/L TEST PROC: NA PT SOURCE___ ; HYBRID TYPE: NA APU CYCLE: NA
 ENGINE CONFIGURATION: I4___ V6X V8___ DISPLACEMENT: 3.8 LITERS/ 231 CU. IN.
 VALVES/CYLINDER: 2 X 4___ RATED HP: 240 @ 5200 RPM
 ENGINE LOCATION: FRONT X DRIVE: FWD X RWD___ 4WD-FT___ 4WD-PT___
 EXHAUST EMISSION CONTROL SYSTEM: EGR-TWC-HO2S(2)-SFI, SC
 RLHP/DPA VALUES: SECTION 08.13.02.00

ENG CODE 'LOC)	VEH MODELS (SEE PAGE 1)	TRANS. (M5,A4 ETC.)	EQUIV. TEST WEIGHT	PCM PART NO./CALIB	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
1.1M	3HY69 4CU69	A4/1	3875 4000	16209020/16226534	17095163, 17096199	25164363
1A.1N				16209020/16231494		
1B.1P				16209020/16232124		
2	2HX69 2HZ69		3875 4000	16209020/16228174 *1 16209020/16228164 *2		25162359, 25164363
2A				16209020/16230464 *1 16209020/16232194 *2		
2B				16209020/16232194 *1 16209020/16232154 *2		

*1 PCM has two shifting patterns (normal and performance) with 126 mph restriction.
 *2 PCM has two shifting patterns (normal and performance) with 108 mph restriction.

CARLINE NAME
 PONTIAC BONNEVILLE
 OLDSMOBILE EIGHTY EIGHT
 BUICK PARK AVENUE

CARLINE CODE
 33045
 29025
 08040

ISSUED: ML-TP088

REVISED: ML-TR023, ML-TR039, ML-TP134

1996 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: TGM3.8V8GFFK EVAP. FAMILY: TGM107DAYMAA

<u>ENG CODE (LOC)</u>	<u>VEH MODELS (SEE PAGE 1)</u>	<u>TRANS. (M5,A4 ETC.)</u>	<u>EQUIV. TEST WEIGHT</u>	<u>PCM PART NO./CALIB</u>	<u>EGR SYSTEM PART NO.</u>	<u>CATALYTIC CONVERTER PART NO.</u>
1C.1R	3HY69 4CU69	A4/1	3875 4000	16209020/16234684	17095163. 17096199	25164363
1D.1S				16209020/16233414		
1E.1T				16209020/16238544		
2C	2HX69		2875	16209020/16233484 *1 16209020/16233444 *2		
2D				16209020/16238614 *1 16209020/16238574 *2		

*1 PCM has two shifting patterns (normal and performance) with 126 mph restriction.
 *2 PCM has two shifting patterns (normal and performance) with 108 mph restriction.

<u>CARLINE NAME</u>	<u>CARLINE CODE</u>
PONTIAC BONNEVILLE	33045
OLDSMOBILE EIGHTY EIGHT	29025
BUICK PARK AVENUE	08040

ISSUED: ML-TR042

REVISED: ML-TR046, ML-TP134, ML-TR097

17-TGM3.8V8GFFK-2.1

1996 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: TGM3.8V8GFFK EVAP. FAMILY: TGM1070AYPAA
 ALL ENGINE CODES IN ENGINE FAMILY: CA___ 49S___ 50S___ AB965___
 EXH STD: CA Tier-1 X TLEV___ LEV___ ULEV___ ZEV___ ; U.S. EPA Tier-1 X
 EVAP STD: 50K X USEFUL LIFE WITH R/L___ ; IN-USE EXH STD: FULL___ ALTERNATIVE X
 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 X MFR ADP___ ; NMOG TEST PROC: NA EQUIV___
 R/L TEST PROC: NA PT SOURCE___ ; HYBRID TYPE: NA APU CYCLE: NA
 ENGINE CONFIGURATION: I4___ V6 X V8___ DISPLACEMENT: 3.8 LITERS/ 231 CU. IN.
 VALVES/CYLINDER: 2 X 4___ RATED HP: 240 @ 5200 RPM
 ENGINE LOCATION: FRONT X DRIVE: FWD X RWD___ 4WD-FT___ 4WD-PT___
 EXHAUST EMISSION CONTROL SYSTEM: EGR-TWC-HO2S(2)-SFI
 RLHP/DPA VALUES: SECTION 08.13.02.00

ENG CODE (OC)	VEH MODELS (SEE PAGE 1)	TRANS. (M5, A4 ETC.)	EQUIV. TEST WEIGHT	PCM PART NO./CALIB	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
3	4GD07	A4/1	4000	16209020/16226524	17095163. 17096199	25164363
3A				16209020/16230444		
3B				16209020/16232134		
3C				16209020/16234674		
3D				16209020/16233424		
3E				16209020/16238554		

CARLINE NAME
BUICK RIVIERA

CARLINE CODE
08045

ISSUED: ML-TP088

REVISED: ML-TR023, ML-TR039, ML-TR042, ML-TR046, ML-TP134, ML-TR097

17-TGM3.8V8GFFK-3