

State of California
AIR RESOURCES BOARD

EXECUTIVE ORDER A-6-759
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 1997 model-year General Motors Corporation exhaust emission control systems are certified as described below for light-duty trucks:

Fuel Type: Gasoline

Engine Family: VGM4.31PG1EK Displacement: 4.3 Liters (262 Cubic Inches)

Exhaust Emission Control Systems and Special Features:

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

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

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

Loaded Vehicle		Non-Methane	Carbon	Nitrogen	Carbon
<u>Weight(lbs.)</u>	<u>Miles</u>	<u>Hydrocarbons</u>	<u>Monoxide</u>	<u>Oxides</u>	<u>Monoxide (20°F)</u>
0-3750	50,000	0.25	3.4	0.4	10.0
	100,000	0.31	4.2	0.6	n/a

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

Loaded Vehicle		Non-Methane	Carbon	Nitrogen	Carbon
<u>Weight(lbs.)</u>	<u>Miles</u>	<u>Hydrocarbons</u>	<u>Monoxide</u>	<u>Oxides</u>	<u>Monoxide (20°F)</u>
0-3750	50,000	0.15	2.3	0.2	3.9
	100,000	0.16	2.4	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 the vehicle manufacturer is certifying the listed vehicle models to the running loss and useful life standards applicable to 1995 and subsequent 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 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.

GENERAL MOTORS CORPORATION

EXECUTIVE ORDER A-6-759
(Page 3 of 3)

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

Executed at El Monte, California this 20th day of May 1996.



R. B. Summerfield
Assistant Division Chief
Mobile Source Division

LIGHT DUTY TRUCK MODEL NUMBER DEFINITION
(Includes California Medium Duty Trucks)

E.O. #A-6-759

Example, Pattern A: CC10703+E62

Example, Pattern B: 1UM05

Digit 1 = Marketing Division

Pattern A

C = Chevrolet
T = GMC
H = Oldsmobile
G = Isuzu

Pattern B

1 = Chevrolet
2 = Pontiac
3 = Oldsmobile

Note: Digit 1 is only used for Pattern A models on engine family pages or California Supplemental Data Sheets when necessary to discriminate by division model.

Digit 2 = Chassis Type (all)

U = Conventional 4x2 Front Wheel Drive
C, S, M = Conventional 4x2 Rear Wheel Drive
G = Forward Control 4x2 Rear Wheel Drive
K, T, L = Conventional 4x4 Four Wheel Drive, All Wheel Drive

Digit 3 = Series/GVWR

Pattern A

1 = 11,15,1500/3500-7300
2 = 21,25,2500/6400-8600
3 = 31,35,3500/7100-14500

Pattern B

Letter code designates trim level rather than series/GVWR.

Digits 4 & 5

Pattern A = Dimensional Grouping

05 = Utility: Tahoe (2Dr), Yukon (2Dr), Blazer, Jimmy, Bravada
06 = S/T Short Box
07 = C/K Short Box, Tahoe (4Dr), Yukon (4Dr)
08 = S/T Long Box & Cab-Chassis
09 = C/K Long Box, Suburban
10 = M/L Long Body
14 = G Short Wheelbase
17 = G Long Wheelbase

Pattern B = Body Style

06 = Passenger (Venture, Trans Sport, Silhouette)
16 = Passenger (Venture, Trans Sport, Silhouette) Dual Sliding Doors

Digits 6 & 7 = Body/Cab Codes (Pattern A Only)

03 = Conventional Cab, Cab-Chassis
05 = Cargo Van
06 = Passenger Van, 4 Door Special Purpose Vehicle
16 = 2 Door Special Purpose Vehicle
43 = Crew Cab
53 = Extended Cab

Pickup Body Codes (Optional, Used with Pattern A Only)

+E62 = Stepside, Fenderside
+E63 = Fleetside, Wideside

ISSUED: ML-VP083

REVISED:

17-VGM4.31PG1EK-1
(1997)

1997 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: VGM4.31PG1EK EVAP FAMILY: VGM1095AYMEA
 ALL ENGINE CODES IN ENGINE FAMILY: CA (X) 49S () 50S () AB965 ()
 EXH STD: CA TIER-1 (X) TLEV () LEV () ULEV () ZEV (); U.S. EPA TIER-1 ()
 EVAP STD: 50K () USEFUL LIFE WITH R/L (X); IN-USE EXH STD: FULL (X) ALTERNATIVE ()
 VEH CLASS(ES): PC () LDT1 (X) LDT2 () MDV1 () MDV2 () MDV3 () MDV4 () MDV5 ()
 SINGLE CERT STANDARD FOR MULTI-CLASS ENGINE FAMILY: NA
 FUEL TYPE(S): DEDICATED () GASOLINE (X); EMISSION TEST FUEL(S): INDOLINE () PHASE 2 (X)
 SERVICE ACCUMULATION: STD AMA () MFR ADP (X); NMOG TEST PROCEDURE: NA (X) EQUIV ()
 R/L TEST PROCEDURE: NA () PT SOURCE (X); HYBRID TYPE: NA APU CYCLE: NA
 ENGINE CONFIGURATION: I4 () V6 (X) V8 () DISPLACEMENT: 4.3 LITERS / 262 CU. IN.
 VALVES / CYLINDER: 2 (X) 4 () RATED HP: 170 @ 4400 RPM
 ENGINE LOCATION: FRONT (X) DRIVE: FWD () RWD (X) 4WD-FT () 4WD-PT ()
 EXHAUST EMISSION CONTROL SYSTEM: LEGR, TWC, 2HO2S-HO2S(2), SFI
 RLHP / DPA VALUES: SECTION 08.13.02.00

ENG CODE (LOC)	VEH MODELS (SEE PAGE 1)	TRANS (M5,A4,ETC.)	EQUIV. TEST WEIGHT	IGNITION (PCM/CALIB PART NO.)	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
(C) 1	S10603+E63	A4	3625	16213175-PCM	17096188,	25152875
	S10803+E63		3750	16204025-OPER	17096309	
	S10653+E63		3875	16204272-ENG		
	S10603+E62		3625	16204108,		
	S10653+E62		3875	16204109-TRANS		
2	S10603+E63		3625			
	S10803+E63		3750			
	S10653+E63		3875			
	S10603+E62		3625			
	S10653+E62		3875			

CARLINE NAME	CARLINE CODE
CHEVROLET S10 PICKUP 2WD	55082
GMC SONOMA PICKUP 2WD	80072

ISSUED: ML-VP083

REVISED: ML-VR044, ML-VR050

17-VGM4.31PG1EK-2
(1997)

1997 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

FR: GENERAL MOTORS CORP.

ENGINE FAMILY: VGM4.31PG1EK

EVAP FAMILY: VGM1095AYMEA

ENG CODE (LOC)	VEH MODELS (SEE PAGE 1)	TRANS (M5,A4,ETC.)	EQUIV. TEST WEIGHT	IGNITION (PCM/CALIB PART NO.)	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
(C)						
1A,2A	S10603+E63	A4	3625	16213175-PCM	17096188,	25152875
	S10803+E63		3750	16243345PC-OPER	17096309	
	S10653+E63		3875	16243401-ENG		
	S10603+E62		3625	16243544,		
	S10653+E62		3875	16243545-TRANS		
1B,2B				16243345PF-OPER		
				16243478-ENG		
1C,2C	S10603+E63		3625	16243512-ENG		
	S10803+E63		3750			
	S10653+E63		3875			
	S10603+E62		3625			
	S10653+E62		3875			
	JS10603+E63		3625			
	JS10653+E63		3875			
2D				16256455PG-OPER		
				16256245-ENG		

<u>CARLINE NAME</u>	<u>CARLINE CODE</u>
CHEVROLET S10 PICKUP 2WD	55082
GMC SONOMA PICKUP 2WD	80072
ISUZU HOMBRE PICKUP 2WD	84020

ISSUED: ML-VR017

REVISED: ML-VR044, ML-VR050, ML-VR065, ML-VR069, ML-VR103

17-VGM4.31PG1EK-2.1
(1997)

1997 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: VGM4.31PG1EK EVAP FAMILY: VGM1095AYMEA

ENG CODE (LOC)	VEH MODELS (SEE PAGE 1)	TRANS (M5,A4,ETC.)	EQUIV. TEST WEIGHT	IGNITION (PCM/CALIB PART NO.)	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
(C)						
3	S10603+E63	M5	3625	16213175-PCM	17096188,	25152875
	S10803+E63		3750	16204025-OPER	17096309	
	S10653+E63		3875	16204274-ENG		
	S10603+E62		3625	16204115-TRANS		
	S10653+E62		3875			
3A				16213175-PCM		
				16243345PC-OPER		
				16243403-ENG		
				16243566-TRANS		
3B				16243345PF-OPER		
				16243480-ENG		
3C	S10603+E63		3625	16243514-ENG		
	S10803+E63		3750			
	S10653+E63		3875			
	S10603+E62		3625			
	S10653+E62		3875			
	JS10603+E63		3625			
	JS10653+E63		3875			
3D				16256455PG-OPER		
				16256247-ENG		

<u>CARLINE NAME</u>	<u>CARLINE CODE</u>
CHEVROLET S10 PICKUP 2WD	55082
GMC SONOMA PICKUP 2WD	80072
ISUZU HOMBRE PICKUP 2WD	84020

ISSUED: ML-VP083

REVISED: ML-VR017, ML-VR044, ML-VR050, ML-VR065, ML-VR069, ML-VR103

17-VGM4.31PG1EK-3
(1997)

1997 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: VGM4.31PG1EK EVAP FAMILY: VGM1095AYMEA

ENG CODE (LOC) (C)	VEH MODELS (SEE PAGE 1)	TRANS (M5,A4,ETC.)	EQUIV. TEST WEIGHT	IGNITION (PCM/CALIB PART NO.)	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
4	S10603+E63		3625	16213175-PCM	17096188,	25152875
	S10803+E63		3750	16204025-OPER	17096309	
	S10653+E63		3875	16204274-ENG		
	S10603+E62		3625	16204115-TRANS		
	S10653+E62		3875			
4A				16213175-PCM		
				16243345PC-OPER		
				16243403-ENG		
				16243566-TRANS		
4B				16243345PF-OPER		
				16243480-ENG		
4C	S10603+E63		3625	16243514-ENG		
	S10803+E63		3750			
	S10653+E63		3875			
	S10603+E62		3625			
	S10653+E62		3875			
	JS10603+E63		3625			
	JS10653+E63		3875			
4D				16256455PG-OPER		
				16256247-ENG		

<u>CARLINE NAME</u>	<u>CARLINE CODE</u>
CHEVROLET S10 PICKUP 2WD	55082
GMC SONOMA PICKUP 2WD	80072
ISUZU HOMBRE PICKUP 2WD	84020

ISSUED: ML-VR069

REVISED: ML-VR103

17-VGM4.31PG1EK-3.1
(1997)

1997 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

MFR: GENERAL MOTORS CORP. ENGINE FAMILY: VGM4.31PG1EK EVAP FAMILY: VGM1095AYMEA
 ALL ENGINE CODES IN ENGINE FAMILY: CA (X) 49S () 50S () AB965 ()
 EXH STD: CA TIER-1 (X) TLEV () LEV () ULEV () ZEV (); U.S. EPA TIER-1 ()
 EVAP STD: 50K () USEFUL LIFE WITH R/L (X); IN-USE EXH STD: FULL (X) ALTERNATIVE ()
 VEH CLASS(ES): PC () LDT1 (X) LDT2 () MDV1 () MDV2 () MDV3 () MDV4 () MDV5 ()
 SINGLE CERT STANDARD FOR MULTI-CLASS ENGINE FAMILY: NA
 FUEL TYPE(S): DEDICATED () GASOLINE (X); EMISSION TEST FUEL(S): INDOLINE () PHASE 2 (X)
 SERVICE ACCUMULATION: STD AMA () MFR ADP (X); NMOG TEST PROCEDURE: NA (X) EQUIV ()
 R/L TEST PROCEDURE: NA () PT SOURCE (X); HYBRID TYPE: NA APU CYCLE: NA
 ENGINE CONFIGURATION: I4 () V6 (X) V8 () DISPLACEMENT: 4.3 LITERS / 262 CU. IN.
 VALVES / CYLINDER: 2 (X) 4 () RATED HP: 180 @ 4400 RPM
 ENGINE LOCATION: FRONT (X) DRIVE: FWD () RWD (X) 4WD-FT () 4WD-PT ()
 EXHAUST EMISSION CONTROL SYSTEM: LEGR, TWC, 2HO2S-HO2S(2), SFI
 RLHP / DPA VALUES: SECTION 08.13.02.00

ENG CODE 'LOC)	VEH MODELS (SEE PAGE 1)	TRANS (M5,A4,ETC.)	EQUIV. TEST WEIGHT	IGNITION (PCM/CALIB PART NO.)	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
(C) 5	S10603+E63	A4	3625	16213175-PCM	17096188,	25152875
	S10803+E63		3750	16204025-OPER	17096309	
	S10653+E63		3875	16232508-ENG		
	S10603+E62		3625	16204111,		
	S10653+E62		3875	16204112-TRANS		
6	S10603+E63		3750			
	S10803+E63					
	S10653+E63		3875			
	S10603+E62					
	CS10653+E62		3750			
	TS10603+E62		3625			

CARLINE NAME	CARLINE CODE
CHEVROLET S10 PICKUP 2WD	55082
GMC SONOMA PICKUP 2WD	80072

ISSUED: ML-VP083

REVISED: ML-VR044, ML-VR050

17-VGM4.31PG1EK-4
(1997)

1997 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

FR: GENERAL MOTORS CORP.

ENGINE FAMILY: VGM4.31PG1EK

EVAP FAMILY: VGM1095AYMEA

ENG CODE (LOC)	VEH MODELS (SEE PAGE 1)	TRANS (M5,A4,ETC.)	EQUIV. TEST WEIGHT	IGNITION (PCM/CALIB PART NO.)	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
(C) 5A	S10603+E63 S10803+E63 S10653+E63 S10603+E62 S10653+E62	A4	3625 3750 3875 3625 3875	16213175-PCM 16243345PC-OPER 16243398-ENG 16243547, 16243548-TRANS	17096188, 17096309	25152875
6A	S10603+E63 S10803+E63 S10653+E63 S10603+E62 CS10653+E62 TS10603+E62		3750 3875 3750 3625			
5B,6B				16243345PF-OPER 16243472-ENG		
5C,6C				16243506-ENG		
5D,6D				16256455PG-OPER 16256236-ENG		

<u>CARLINE NAME</u>	<u>CARLINE CODE</u>
CHEVROLET S10 PICKUP 2WD	55082
GMC SONOMA PICKUP 2WD	80072

ISSUED: ML-VR017

REVISED: ML-VR044, ML-VR050, ML-VR065, ML-VR103

17-VGM4.31PG1EK-4.1
(1997)

1997 AIR RESOURCES BOARD SUPPLEMENTAL DATA SHEET

FR: GENERAL MOTORS CORP.

ENGINE FAMILY: VGM4.31PG1EK

EVAP FAMILY: VGM1095AYMEA

ENG CODE (LOC)	VEH MODELS (SEE PAGE 1)	TRANS (M5,A4,ETC.)	EQUIV. TEST WEIGHT	IGNITION (PCM/CALIB PART NO.)	EGR SYSTEM PART NO.	CATALYTIC CONVERTER PART NO.
(C)						
7	S10603+E63	M5	3625	16213175-PCM	17096188,	25152875
	S10803+E63		3750	16204025-OPER	17096309	
	S10653+E63		3875	16204260-ENG		
	S10603+E62		3625	16204115-TRANS		
	S10653+E62		3875			

7A				16213175-PCM		
				16243345PC-OPER		
				16243399-ENG		
				16243566-TRANS		

7B				16243345PF-OPER		
				16243474-ENG		

7C				16243508-ENG		
----	--	--	--	--------------	--	--

7D				16256455PG-OPER		
				16256239-ENG		

8	S10603+E63		3625	16213175-PCM		
	S10803+E63		3750	16204025-OPER		
	CS10653+E63		3875	16204260-ENG		
	TS10653+E63		3750	16204115-TRANS		
	S10603+E62		3625			
	S10653+E62		3875			

8A				16213175-PCM		
				16243345PC-OPER		
				16243399-ENG		
				16243566-TRANS		

8B				16243345PF-OPER		
				16243474-ENG		

8C				16243508-ENG		
----	--	--	--	--------------	--	--

8D				16256455PG-OPER		
				16256239-ENG		

CARLINE NAME
 CHEVROLET S10 PICKUP 2WD
 GMC SONOMA PICKUP 2WD

CARLINE CODE
 55082
 80072

ISSUED: ML-VP083

REVISED: ML-VR017, ML-VR044, ML-VR050, ML-VR065, ML-VR103

17-VGM4.31PG1EK-5
(1997)