

Executive Order: A-010-2154

New Passenger Cars, Light-Duty Trucks and
Medium-Duty Vehicles
Page 1 of 4

Pursuant to the authority vested in California Air Resources Board by Health and Safety Code (HSC), Division 26, Part 5, Chapter 2; and pursuant to the authority vested in the undersigned by HSC Sections 39515 and 39516 and Executive Order G-14-012;

IT IS ORDERED AND RESOLVED: That the following exhaust and evaporative emission control systems produced by the manufacturer are certified as described below. Production vehicles shall be in all material respects the same as those for which certification is granted.

	TEST GROUP INFORMATION												
MOD	=1 T		Τ_				1	MIN HOIT		$\overline{}$			
YEA	ı T	EST GROUP		VEHIC	LE CLASS(E	S)		FUEL CATEGORY			FUEL TYPE		
201	9 KI	MXV02.5VEU			PC		DEDICATED SINGLE FUEL VEHICLE				GASOLINE		
USEFUL LIFE (miles) VEHICLE EMISSIO						ION (	CATE	GORY	INTERIM / IN	ITE	RMEDIATE IN-USE STD		
EXI	H/ORVR	EVAP			FTP		SF	TP	FTP		SFTP		
1	50000	150000		LEV3	ULEV70	LEV	3 C	OMPOSITE	NMOG+NOX A	4D	PM PM		
SPECIAL FEATURES & EXHAUST EMISSION CONTROL SYSTEMS						L		OBD S	TATUS		ENGINE DISPLACEMENT (L)		
1		TWC(2), HO25,	SF	I, WR-HO	2S, EGR			FULL	ALL MODELS	71			
*	*						F	PARTIAL	*		2.5		
*	* *						PAF	ARTIAL WITH * FINES					
		EV	APO	RATIVE &	REFUELING	(EVA	P/OR	VR) FAMIL	INFORMATIO	N			
EVA	AP / ORV	R FAMILY	EVA	PORATIVI	E STD CATE	GORY	RY EVAP EMISSION STD VEHICLE CLASS				SPECIAL FEATURES		
	KFMXR0	130NDE	L	EV 3 OPT:	ION2 WITH 1	FEL	L PC				HCT		
				1	EMISSION C	REDIT	INF	ORMATION					
t .	REDIT FO	X FLEET AVE. OR EXTENDED RRANTY			REDIT FOR NO ZERO-EVAP	ON-P	N-PZEV NMOG CREDIT FOR DO		REDIT FOR DO	R	OPTIONAL EXH. STD FOR WORK TRUCKS		
		N			N				N		И		
				NMOG	AND FLEET	AVE	RAGI	E INFORMA	TION				
NMOG RAF	CH4 RAF	FTP NMOG/NMHC RATIO		HO/NMHC	NMOG+NO PC+LDT ((		V) LDT	NMOG+NOX FLEET ST LDT (3751 LVW-8500 GVWR) + MDPV (g/mi)		NMOG+NOX FLEET STD MDV (10,001-14,000 GVWR) (g/mi)			
*	*	1.10		*	0	. 072			0.083		*		

See the Attachment for Vehicle Models, Evaporative Family, Engine Displacement, Emission Control Systems, Phase-In Standards, OBD Compliance, Emission Standards and Certification Levels, and Abbreviations. (As applicable, heavy-duty vehicles (HDV) over 14,000 pounds in GVWR listed in this Executive Order are certified to the requirements in 13 CCR Section 1961.2 applicable to MDV pursuant to 13 CCR Section 1956.8(c)(3) or 13 CCR Section 1956.8(h)(5), as applicable.)



Executive Order: A-010-2154

New Passenger Cars, Light-Duty Trucks and

Medium-Duty Vehicles

Page 2 of 4

### BE IT FURTHER RESOLVED:

The exhaust and evaporative emission standards and the certification emission levels for the listed vehicles are as listed on the Attachment. Compliance with the 50° Fahrenheit testing requirement may have been met based on the manufacturer's submitted compliance plan in lieu of testing. Any debit in the manufacturer's fleet average compliance requirement for NMOG+NOx or Vehicle Equivalent Credit (13 CCR Sections 1961.2(b)(1), 1961.2(b)(3), or 1961.2(c)(3), and the incorporated test procedures, as applicable), or Greenhouse Gas Emissions (13 CCR Section 1961.3, or 17 CCR Section 95663, and the incorporated test procedures, as applicable), for PC, LDT, MDPV or MDV shall be equalized as required.

#### BE IT FURTHER RESOLVED:

For the listed vehicle models, the manufacturer has attested to compliance with Title 13, California Code of Regulations, (13 CCR) Sections 1965 [emission control labels], 1968.2 [on-board diagnostic, full or partial compliance], 2035 et seq. [emission control warranty], 2235 [fuel tank fill pipes and openings] (gasoline and alcohol fueled vehicles only), and "High-Altitude Requirements" and "Inspection and Maintenance Emission Standards" (California 2015 and Subsequent Model Criteria Pollutant Exhaust Emission Standards and Test Procedures and 2017 and Subsequent Model Greenhouse Gas Exhaust Emission Standards and Test Procedures for PC, LDT and MDV).

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

The Bureau of Automotive Repair will be notified by copy of this Executive Order.

Executed at El Monte, California on this 3/ day of July 2018.

Annette Hebert, Chief

Emissions Compliance, Automotive Regulations and Science Division



Executive Order: A-010-2154

New Passenger Cars, Light-Duty Trucks and

Medium-Duty Vehicles
Page 3 of 4

## **ATTACHMENT**

<b>EXHAUST AND</b>	EVAPORATIVE EMISSION STANDARDS AND CERTIFICATION LEVELS	3

EXHAUST EMISSION STANDARDS AND CERTIFICATION LEV	VELS	(FTP	. HWFET	50°F.	20°F)
--	------	------	---------	-------	-------

CH4: methane; NMOG: non-CH4 organic gas; HC: hydrocarbon; NMHC: non-CH4 HC; CO: carbon monoxide; NOx: oxides of nitrogen; HCHO: formaldehyde; PM: particulate matter; RAF: reactivity adjustment factor; 2DHS/3DHS [g HC/test]: 2/3 days diurnal+hot-soak; RL [g HC/mi]: running loss; ORVR [g HC/gallon dispensed]: on-board refueling vapor recovery; g: gram; mg: milligram; mi: mile; K: 1000 miles; F: degrees Fahrenheit; FTP: federal test procedure; SFTP: supplemental FTP

## **FUEL TYPE**

	1										
		NMOG+NOx (g/mi)		CO (g/mi)		NOx (g/mi)		HCHO (mg/mi)		PM (g/mi)	
		CERT	STD	CERT	STD	CERT	STD	CERT	STD	CERT	STD
FTP@50K	*	*	*	*	*	*	*	*	*	*	*
FTP@UL	TIER 3 E10 REGULAR GASOLINE (9 RVP @ LOW ALT.)	0.0423	0.070	1.04	1.7	*	*	*	4	*	0.003
50°F @4K	GASOLINE- LEV3 E10	0.071	0.140	0.67	1.7	*	*	0.60	16		

		NMOG+N	Ox (g/mi)	CO (g/mi)		
	FUEL TYPE	CERT *	STD	CERT	STD	
HWFET @ 50K	*		*			
HWFET @ UL	TIER 3 E10 REGULAR GASOLINE (9 RVP @ LOW ALT.)	0.0369	0.070			
20°F @ 50K	COLD CO E10 REGULAR GASOLINE (TIER 3)			1.45	10.0	

### SFTP EXHAUST EMISSION STANDARDS AND CERTIFICATION LEVELS

				US06		SC03	3	COMPOSITE		
	FUEL TYPE		NMOG+NOx (g/mi)	CO (g/mi)	PM (mg/m <del>i</del> )	NMOG+NOx (g/mi)	CO (g/mi)	NMOG+NOx (g/mi)	CO (g/mi)	PM (mg/mi)
@ 4K		CERT	*	*		*	*			
		STD	*	*		*	*			
		CERT	*	*	*	*	*	0.047	1.07	*
@ UL	TIER 3 E10 REGULAR GASOLINE (9 RVP @ LOW ALT.)	STD	*	*	6	*	*	0.090	4.2	*
		BIN		3				0.070		

## WHOLE VEHICLE EVAPORATIVE EMISSION STANDARDS AND CERTIFICATION LEVELS

EVAPORATIVE FAMILY			WHOLE						
	FUEL TYPE	3DH	S (g/test)	@ UL	2D	HS (g/test) (	RL (g/mi) @ UL		
		CERT	STD	FEL	CERT	STD	FEL	CERT	STD
KFMXR0130NDE	GASOLINE- TIER3 E10	0.212	0.300	0.300	*	0.300	0.300	0.00	0.05



Executive Order: A-010-2154

New Passenger Cars, Light-Duty Trucks and

Medium-Duty Vehicles

Page 4 of 4

ORVR / FUEL ONLY / CANISTER BLEED EVAPORATIVE EMISSION STANDARDS AND CERTIFICATION LEVELS												
						FUEL C	NLY EVAI	& CANIS	TER BLEE	D		
EVAPORATIVE FAMILY	ORVR (g/gallon) @ UL			FUEL TYPE		3DHS RIG TEST (g/test) @ UL		2DHS RIG TEST (g/test) @ UL		BLEED CANISTER TEST (g/test) @ 4K		
	FUEL TYPE	CERT	STD			CERT	STD	CERT	STD	CERT	STD	
KFMXR0130NDE	GASOLINE- TIER3 E10	1 0 01	0.20	GASOLINE- TIER3 E10		*	*	*	*	0.007	0.020	
	EFFECTIVE LEAK DIAMETER STANDARD AND CERTIFICATION LEVEL (INCHES)											
EVAPORATIVE FAMILY LEAK FAMIL			_Y	Y CERT				STD				
KFMXR0130NDE KFMXR0130NDE-				-001 * .					0.02			

\*: not applicable; #: pounds; UL: useful life; PC: passenger car; LDT: light-duty truck; LDT1: LDT<6000#GVWR,0-3750#LVW; LDT2: LDT<6000#GVWR,3751-5750#LVW; LDT3: LDT 6001-8500#GVWR,3751-5750#ALVW; LDT4: LDT 6001-8500#GVWR,5751-8500#ALVW; MDV: medium-duty vehicle; MDV4: MDV 8501-10000#GVWR; MDV5: MDV 10001-14000#GVWR; MDPV: mediumduty passenger vehicle; HDV: heavy-duty vehicle; ECS: emission control system; CERT: certification; STD: standard; FEL: family emission limit; GWWR: gross vehicle weight rating; LWW: loaded vehicle weight; ALVW: adjusted LWW; LEV: low emission vehicle; ULEV: ultra LEV; SULEV: super ULEV; ZEV: zero-emission vehicle; TZEV: transitional ZEV; TWC/OC: 3-way/oxidizing catalyst; ADSTWC: adsorbing TWC; HAC: HC adsorbing catalyst; WU: warm-up catalyst; NAC: NOx adsorption catalyst; SCR-U or SCRC/SCR-N or SCRC-NH3: selective catalytic reduction-urea/ammonia; NH3OC: ammonia oxidation catalyst; CTOX/PTOX: continuous/periodic trap oxidizer; DPF: diesel particulate filter (active); GPF: PM filter for spark-ignited engine; HO2S/O2S: heated/oxygen sensor; WR-HO2S or AFS: wide range/linear/heated air-fuel ratio sensor; NOXS: NOx sensor; PMS: PM sensor; RDQS: reductant quality sensor; NH3S: ammonia sensor; EGR: exhaust gas recirculation; EGRC: EGR cooler; AIR/AIRE: secondary air injection (belt driven)/(electric driven); PAIR: pulsed AIR; SFI/MFI: sequential/multiport fuel injection; DFI/IFI: direct/indirect fuel injection; TC/SC: turbo/super charger; CAC: charge air cooler; FFH: fuel fired heater; F/P/\$: full/partial/partial with fines on-board diagnostic; DOR: direct ozone reducing; HCT: hydrocarbon trap; BCAN: bleed carbon canister; prefix 2: parallel; (2) suffix: series; CNG/LNG: compressed/liquefied natural gas; LPG: liquefied petroleum gas; E85: "85%" ethanol ("15%"gasoline) fuel; E10: "10%" ethanol ("90%"gasoline) fuel; A: automatic (with lockup); M: manual transmission; SA: semi-automatic transmission; CV: continuously variable transmission; SCV: selectable continuously variable transmission; AM: automated manual transmission; AMS: automated manual-selectable transmission; OT: other transmission; AER: all-electric range; EAER: equivalent AER; PHEV: plug-in hybrid electric vehicle

2	2019 MODEL YEAR: VEHICLE MODELS INFORMATION												
MAKE	MODEL	VEH CLASS	ENGINE (L)	TRANS TYPE	EVAPORATIVE FAMILY	EXH ECS	OBD						
FORD	FUSION FWD	PC	2.5	A6	KFMXR0130NDE	1	F						