#### State of California AIR RESOURCES BOARD

# EXECUTIVE ORDER A-10-565 Relating to Certification of New Motor Vehicles

#### FORD MOTOR COMPANY

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 Orders G-45-3 and G-45-4;

IT IS ORDERED AND RESOLVED: That Ford Motor Company 1994 model-year exhaust emission control systems are certified as described below for light-duty trucks:

Fuel Type: Gasoline

Engine Family: RFM4.018G1EA <u>Displacement</u>: 4.0 Liters (244 Cubic Inches)

Exhaust Emission Control Systems & Special Features:

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

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 <u>Weight(lbs.)</u>			Carbon <u>Monoxide</u>	Nitrogen <u>Oxides</u>
0-3750	50,000	0.25	3.4	0.4
	100,000	0.31	4.2	n/a

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

Loaded Vehicle Weight(lbs.)	Miles	Non-Methane <u>Hydrocarbons</u>	Carbon <u>Monoxide</u>	Nitrogen <u>Oxides</u>
0-3750	50,000	0.19	1.9	0.2
	100,000	0.21	2.3	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 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 on January 14, 1993, the Air Resources Board approved the repeal of the currently-effective requirement that each manufacturer certify a minimum of 80 percent of its projected sales of 1994 model-year California-certified passenger cars and light-duty trucks to the phase-in standards for non-methane hydrocarbons (NMHC), or the more stringent standards in section 1960.1(g)(2) of Title 13, California Code of Regulations. If the repeal of such requirement does not become effective by December 31, 1993, the manufacturer shall submit a plan for compliance with the requirement; passenger cars and light-duty trucks not meeting such phase-in or more stringent standards shall be certified only to the extent allowed under the requirement.

BE IT FURTHER RESOLVED: That the listed vehicle models also comply with "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 2290).

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 for 1988 and Subsequent Model-Year Passenger Cars, Light-duty Trucks, and Medium-Duty Vehicles with Three-Way Catalyst Systems and Feedback Control" (Title 13, California Code of Regulations, Section 1968) for the aforementioned model year.

BE IT FURTHER RESOLVED: That the listed vehicle models have been exempted from compliance with the "Malfunction and Diagnostic System Requirements-1994 and Subsequent Model-Year Passenger Cars, Light-duty Trucks, and Medium-Duty Vehicles and Engines" pursuant to Title 13, California Code of Regulations, Section 1968.1(m)(2.0) 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 13

day of July, 1993.

R. B. Summerfield
Assistant Division Chief
Mobile Source Division

Manufacturer: FORD MOTOR COMPANY

Eng. Family: RFM4.018G1EA

Pass Car: \_\_ (PC) Light-Duty Truck: T1 (T1/T2)

Med-Duty Vehicle: \_\_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front X Mid. Rear\_\_\_

Drive: FWD \_\_ RWD X 4WD-FT \_\_ 4WD-PT X

Exhaust ECS & Special Features: SFI/EGR/HO2S/TWC(2)

Engine Code	Vehicle Models	Trans. Type A-Automatic M-Manual	ETW	DPA	Ignition (PCM) Part No.	EGR System Part No.	Catalyst Part No.
358S R00A/N	Ranger 4x2 RC SWB	L4	3500 3625	11.2 12.3*	F37F-MA	E6AE-BA	F37A-HD/ F47A-FA
	RC LWB		3500 3625	11.2 12.3*			

<sup>\*</sup> with air conditioning

Manufacturer: FORD MOTOR COMPANY En

Eng. Family: RFM4.018G1EA

Pass Car: \_\_ (PC) Light-Duty Truck: T1\_ (T1/T2)

Med-Duty Vehicle: \_\_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front X Mid. Rear\_\_\_

Drive: FWD \_\_ RWD X 4WD-FT \_\_ 4WD-PT X

Exhaust ECS & Special Features: SFI/EGR/HO2S/TWC(2)

Engine Code	Vehicle Models	Trans. Type A-Automatic M-Manual	ETW	DPA	Ignition (PCM) Part No.	EGR System Part No.	Catalyst Part No.
			· <u></u>				
357S R00A/N	Ranger 4x2	M5			F37F-KA	E6AE-BA	F37A-HD/
·	RC SWB		3500	11.2			F47A-FA
			3500	12.3*			
	RC LWB		3500	11.2	•		
			3625	12.3*			
	SC SWB		3750	11.2			
	Ranger 4x4						
	RC SWB		3750	12.4			

<sup>\*</sup> with air conditioning

Manufacturer: FORD MOTOR COMPANY

Eng. Family: RFM4.018G1EA

Pass Car: \_\_ (PC) Light-Duty Truck: T1 (T1/T2) Med-Duty Vehicle: \_\_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front X Mid. Rear

Drive: FWD RWD X 4WD-FT 4WD-PT X

Exhaust ECS & Special Features: \_\_\_SFI/EGR/HO2S/TWC(2)

Engine Code	Vehicle Models	Trans. Type A-Automatic M-Manual		DPA •	Ignition (PCM) Part No.	EGR System Part No.	Catalyst Part No.
458S R10A/N	Ranger 4x2 RC SWB	L4	3500 3500	11.2 12.3*	F47F-CKA	E6AE-BA	F37A-HD/ F47A-FA
	RC LWB		3500 3500	11.2 12.3*			

<sup>\*</sup> with air conditioning

Manufacturer: FORD MOTOR COMPANY

Eng. Family: RFM4.018G1EA

Pass Car: \_\_ (PC) Light-Duty Truck: T1 (T1/T2) Med-Duty Vehicle: \_\_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front X Mid. Rear\_\_\_

Drive: FWD \_\_ RWD X 4WD-FT \_\_ 4WD-PT X

Exhaust ECS & Special Features: SFI/EGR/HO2S/TWC(2)

Engine Code	Vehicle Models	Trans. Type A-Automatic M-Manual	ETW	DPA ,	Ignition (PCM) Part No.	EGR System Part No.	Catalyst Part No.
457S R10A/N	Ranger 4x2	M5		*-	F47F-CHA	E6AE-BA	F37A-HD/
•	RC SWB		3375	11.2	1411-0116	EUAL-DA	F47A-FA
			3500	12.3*			141010
	RC LWB		3500	11.2			•
			3500	12.3*			
	SC SWB		3750	11.2			
	Ranger 4x4						
	RC SWB		3750	12.4			

<sup>\*</sup> with air conditioning

Manufacturer: FORD MOTOR COMPANY

Eng. Family: RFM4.018G1EA

Pass Car: (PC) Light-Duty Truck: T1 (T1/T2)

Med-Duty Vehicle: \_\_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front X Mid. Rear

Drive: FWD \_\_ RWD X 4WD-FT \_\_ 4WD-PT X

SFI/EGR/HÖZS/TWC (2) Exhaust ECS & Special Features: (Use abbreviations per SAE J1930, May 91)

Engine Code Vehicle	Vehicle Models	Trans. Type 6 A-Automatic		DPA	Ignition (PCM)	EGR System	Catalyst
		M-Manual			Part No.	Part No.	Part No.
358S R00A/N	Ranger 4x2	L4			F37F-MA	E6AE-BA/	F37A-HD/
	RC SWB		3500	11.2		F37E-AA#	F47A-FA
			3625	12.3*			CHAIA
	RC LWB		3500	11.2			
			3625	12.3*			

Last Character in Engine Code:

> N = no A/CA = A/C

Vehicle Codes:

1st character: R = regular S = super

C = club

2nd character:

K = cab V = van

W = wagon

3rd character:

S = short L = long

\* with air conditioning

ENGINE FAMILY: RFM4.018G1EA

ISSUED: 6-28-93 REVISED: 2-25-94# 20.09.17.02 - 1

Manufacturer: FORD MOTOR COMPANY

Eng. Family: RFM4.018G1EA

Pass Car: \_\_ (PC) Light-Duty Truck: T1 (T1/T2) Med-Duty Vehicle: \_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front X Mid. Rear\_

Drive: FWD  $\underline{\phantom{A}}$  RWD  $\underline{\phantom{A}}$  4WD-FT  $\underline{\phantom{A}}$  4WD-PT  $\underline{\phantom{A}}$ 

Exhaust ECS & Special Features: SFI/EGR/HÖZS/TWC (2) (Use abbreviations per SAE J1930, May 91)

Engine Code	Vehicle Models	Trans. Type ETW A-Automatic	DPA	Ignition (PCM)	EGR System	Catalyst	
		M-Manual			Part No.	Part No.	Part No.
357S R00A/N	Ranger 4x2	M5			F37F-KA	E6AE-BA/	F37A-HD/
	RC SWB		3500	11.2		F37E-AA#	F47A-FA
			3500	12.3*			
	RC LWB		3500	11.2			
			3625	12.3*			
	SC SWB		3750	11.2			
	Ranger 4x4 RC SWB		3750	12.4			

Last Character in Engine Code:

N = noA/C A = A/C

Vehicle Codes:

1st character: R = regular S = super

C = club

2nd character: K = cab V = van

W = wagon

3rd character: S = short L = long

\* with air conditioning

ENGINE FAMILY: RFM4.018G1EA

ISSUED: 6-28-93 REVISED: 2-25-94# 20.09.17.02 - 2

Manufacturer: FORD MOTOR COMPANY

Eng. Family: RFM4.018G1EA

Pass Car: \_\_ (PC) Light-Duty Truck: T1 (T1/T2) Med-Duty Vehicle: \_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front X Mid, Rear

Drive: FWD \_\_ RWD X 4WD-FT \_\_ 4WD-PT X

SFI/EGR/HÖ2S/TWC (3) Exhaust ECS & Special Features: \_\_\_ (Use abbreviations per SAE J1930, May 91)

Engine Code	Vehicle Models	Trans. Type ETW DPA A-Automatic	DPA	Ignition (PCM)	EGR System	Catalyst	
		M-Manual		<u> </u>	Part No.	Part No.	Part No.
458S R10A/N	Ranger 4x2	L4			F47F-CKA	E6AE-BA/	F37A-HD/
	RC SWB		3500	11.2		F37E-AA#	F47A-FA
			3500	12.3*			
	RC LWB		3500	11.2			
			3500	12.3*			

Last Character in Engine Code:

N = no A/C A = A/C

Vehicle Codes:

1st character:

R = regular S = super

C = club

2nd character:

K = cabV = van

W = wagon

3rd character:

S = short L = long

ENGINE FAMILY: RFM4.018G1EA

ISSUED: 9-2-93 REVISED: 2-25-94#

\* with air conditioning

Manufacturer: FORD MOTOR COMPANY

Eng. Family: RFM4.018G1EA

Pass Car: \_\_ (PC) Light-Duty Truck: T1 (T1/T2) Med-Duty Vehicle: \_\_ (M1/M2/M3/M4/M5)

Standards Type: T-1 (Tier 0/1,AB965,TLEV,LEV,ULEV) Vehicle Type: \_\_\_(FFV,HEV (type A/B/C)

Fuel Type: Gasoline

Evaporative Family: RFM1045AYP0A

Engine Config: V-6

Liter (CID): 4.0L (244)

Engine: Front\_X Mid.\_\_\_ Rear\_\_\_

Drive: FWD  $\underline{\hspace{0.1cm}}$  RWD  $\underline{\hspace{0.1cm}}$  4WD-FT  $\underline{\hspace{0.1cm}}$  4WD-PT  $\underline{\hspace{0.1cm}}$  X

SFI/EGR/HO2S/TWC(2) Exhaust ECS & Special Features: \_\_\_

(Use abbreviations per SAE J1930, May 91)

Engine Code	Vehicle Models	Trans. Type A-Automatic M-Manual		DPA	Ignition (PCM) Part No.	EGR System Part No.	Catalyst Part No.
457S R10A/N	Ranger 4x2	M5			F47F-CHA	E6AE-BA/	F37A-HD/
RC SWB	HC SWB		3500∌ 3500	11.2 12.3*		F37E-AA\$	F47A-FA
	RC LWB		3500 3500	11.2 12.3*			
	SC SWB		3750	11.2	·		
	Ranger 4x4 RC SWB		3750	12.4			Last Characte in Engine Coo

Vehicle Codes: 1st character: R = regular S = super c = club 2nd character: K = CabV = VanW = wagon

3rd character: S = short L = long

\* with air conditioning # R/C 4.0-123