

Pursuant to the authority vested in the California Air Resources Board by 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-19-095;

IT IS ORDERED AND RESOLVED: The engines and emission control systems produced by the manufacturer as described below are certified for use in on-road motor vehicles with a manufacturer's Gross Vehicle Weight Rating (GVWR) over 14,000 pounds. Production engines shall be in all material respects the same as those for which certification is granted.

| Model Year | Engine Family | Combustion Cycle | Fuel Operation | Fuel Type(s) | Intended Vehicle Service Class | Intended GHG Vehicle Type |
|---------------|---------------|---------------------|----------------|-------------------------|-----------------------------------|---------------------------|
| 2024 | RRIIE07.3BL3 | Otto | Dedicated | Liquefied Petroleum Gas | Heavy Heavy-Duty | Vocational |

| Emission Control Systems | | | | | | |
|---|------|--|--|--|--|--|
| [1]: Three-Way Catalyst (TWC), Heated Oxygen Sensor (HO2S), Sequential Fuel Injection (SFI), (2) Wide Range Heated Oxygen Sensor ((2)WR-HO2S) | None | | | | | |

The certified engine models are attached.

The listed engine models comply with the following: 1) emission standard limits (STD) as demonstrated on the Federal Test Procedure (FTP) cycle and 2) Conformity Factors (CF) as demonstrated using the Moving Average Window (MAW), as applicable, for exhaust criteria pollutants non-methane hydrocarbons (NMHC), nitrogen oxides (NOx), Formaldehyde (HCHO), carbon monoxide (CO), and particulate matter (PM), and for exhaust greenhouse gas (GHG) pollutants carbon dioxide (CO2), methane (CH4), and nitrous oxide (N2O), as set forth in 13 CCR 1956.8 and the applicable California test procedures for heavy-duty Otto cycle engines, 2) family emission limits (FEL) and family certification levels (FCL) declared by the manufacturer as allowed by the applicable California test procedures, stated in units of gram per brake horsepower-hour (g/bhp-hr), except as noted, or designated as not applicable (*).

| | | | Criteria | | | | | GHG | | |
|-----------------------------|--------|------|----------|------|-------|------|-----|------|------|--|
| Applicable Standard | | | NOx | CO | PM | нсно | CO2 | CH4 | N2O | |
| Heavy-Duty Otto | STD | 0.14 | 0.020 | 14.4 | 0.005 | 0.01 | 627 | 0.10 | 0.10 | |
| Optional Low NOx | FEL | * | * | * | * | * | 646 | * | * | |
| Heavy Heavy-Duty Vocational | MAW CF | 2.0 | 2.0 | 2.0 | 2.0 | * | * | * | * | |

BE IT FURTHER RESOLVED: Any declared FEL or FCL is the emission limit to which all engines must comply in lieu of the standard limit for certification purposes, subject to the restrictions of averaging, banking, or trading (ABT) programs allowed by the applicable California test procedures.

BE IT FURTHER RESOLVED: For the listed engine models the manufacturer has submitted materials to demonstrate certification compliance with 13 CCR 1965 (emission control labels), 13 CCR 1971.1 (on-board diagnostic, full or partial compliance), and 13 CCR 2035 et seq. (emission control warranty).

BE IT FURTHER RESOLVED: That the listed engine family is certified to the Optional Low NOx Emission Standards as specified in 13 CCR 1956.8(c)(1)(D) and section 10.B.3.2 of the applicable California test procedures.

BE IT FURTHER RESOLVED: The listed engine models are certified in accordance with 13 CCR Section 1971.1(k) (deficiency and fines provisions for certification of heavy-duty on-board diagnostic (HD OBD) systems with identified deficiencies) and Health and Safety Code Section 43154.

Kim Yacorbian for

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

Executed on this 21*S*[†] day of November 2023.

Robin U. Lang, Chief

Emissions Certification and Compliance Division

ATTACHMENT: ENGINE MODELS

Family: RRIIE07.3BL3 EO Number: A-344-0173 Date Applicable: 04/05/2024

| | | | | | Peak Power | | | Peak Torque | | | | | |
|-------------|-----------|------|--------|--------------|------------|-------|------------|-------------|-------|------------|---------|------------|-----------------|
| Model | Code | Trim | Config | Displacement | Power | Speed | Fueling | Torque | Speed | Fueling | ECS Num | GHG | Notes |
| - | - | - | - | L | hp | rpm | mm3/stroke | lb-ft | rpm | mm3/stroke | - | - | - |
| Commercial | RRF41FSR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| E-Series | RRE41FDR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| E-Series | RRE41FSR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| E-Series | RRE41FVR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| Medium Duty | RRFC1FDR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| Medium Duty | RRFC1FSR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| Medium Duty | RRFC1FVR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| Motor Home | RRF51FDR5 | N/A | V8 | 7.3 | 335 | 3750 | 89.8 | 468 | 3750 | 91.5 | 1 | Vocational | N/A |
| Commercial | RRF410SR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |
| E-Series | RRE410DR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |
| E-Series | RRE410SR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |
| E-Series | RRE410VR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |
| Medium Duty | RRFC10DR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |
| Medium Duty | RRFC10SR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |
| Medium Duty | RRFC10VR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |
| Motor Home | RRF510DR5 | N/A | V8 | 7.3 | 334 | 3750 | 90.2 | 468 | 3750 | 90.8 | 1 | Vocational | New Model Added |