Cummins Inc.

EXECUTIVE ORDER U-R-002-0228 New Off-Road

New Off-Road Compression-Ignition Engines

Pursuant to the authority vested in the Air Resources Board by Sections 43013, 43018, 43101, 43102, 43104 and 43105 of the Health and Safety Code; and

Pursuant to the authority vested in the undersigned by Sections 39515 and 39516 of the Health and Safety Code and Executive Order G-02-003;

IT IS ORDERED AND RESOLVED: That the following compression-ignition engine and emission control system produced by the manufacturer are certified as described below for use in off-road equipment. Production engines shall be in all material respects the same as those for which certification is granted.

| MODEL YEAR | ENGINE FAMILY | DISPLACEMENT (liters) | FUEL TYPE | USEFUL LIFE (hours) | | | | | | |
|---------------|----------------------------|-----------------------|--|------------------------|--|--|--|--|--|--|
| 2004 | 4CEXL2.28A41 | 2.286 | Diesel | 8000 | | | | | | |
| SPECIAL | FEATURES & EMISSION | CONTROL SYSTEMS | TYPICAL EQUIPMENT APPLICATION | | | | | | | |
| ln | direct Diesel Injection, T | urbocharger | Crane, Loader, Tractor, Dozer, Pump, Compressor and Othe Industrial Equipment | | | | | | | |

The engine models and codes are attached.

The following are the exhaust certification standards (STD) and certification levels (CERT) for hydrocarbon (HC), oxides of nitrogen (NOx), or non-methane hydrocarbon plus oxides of nitrogen (NMHC+NOx), carbon monoxide (CO), and particulate matter (PM) in grams per kilowatt-hour (g/kw-hr), and the opacity-of-smoke certification standards and certification levels in percent (%) during acceleration (Accel), lugging (Lug), and the peak value from either mode (Peak) for this engine family (Title 13, California Code of Regulations, (13 CCR) Section 2423):

| RATED POWER CLASS | EMISSION STANDARD | | | | EXHAUST (g/kw-l | OPACITY (%) | | | | |
|-------------------------|----------------------|------|-----|-----|-----------------|-------------|------|-------|-----|------|
| | CATEGORY | | HC | NOx | NMHC+NOx | co | PM | ACCEL | LUG | PEAK |
| 37 <u><</u> kW < 75 | Tier 2 | STD | N/A | N/A | 7.5 | 5.0 | 0.40 | 20 | 15 | 50 |
| | | CERT | | | 5.9 | 1.5 | 0.17 | 8 | 6 | 15 |

BE IT FURTHER RESOLVED: That for the listed engine models, the manufacturer has submitted the information and materials to demonstrate certification compliance with 13 CCR Section 2424 (emission control labels), and 13 CCR Sections 2425 and 2426 (emission control system warranty).

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

This Executive Order is only granted to the engine family and model-year listed above. Engines in this family that are produced for any other model-year are not covered by this Executive Order.

Executed at El Monte, California on this

174

day of February 2004

Allen Lyons, Chief

Mobile Source Operations Division

Engine Model Summary Form איזאכאאנדטד ראל (האל)

CUMMINS Inc. Manufacturer:

Nonroad CI Engine category:

4CEXL2.28A41 EPA Engine Family.

Mfr Family Name: A2300

New Submission Process Code:

11-12-002-0228

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|--|-------------|--|--|--|--|---|--|---|--|--|----------------------------|--|---|--|--|--|--|--|--|--|----|--|
| 9.Emission Control B Device Per SAE J1930 | IDI, EM, TC | | The day of the part was all the second as the second to th | terromentation control control control applications of the collection of the collect | | | the property of the first of the first property of the contraction of the first of | 14 5.1 ft. odd saddalla myn menne menne menne menne de mennempenen en menne | The state of the s | Community views more than 11 admin bedien considerations on more m | VI TTT III MARANAMATA III. | COMMUNICATION AND A COMMUNICATION OF COM | | The state of the s | Configuration communications (page 1941) for the configuration of the first of the configuration of the configurat | And the property of the proper | to be some a first while the second s | Charles of the control of the contro | | Triple I I remaining the statement of th | | Company to the second s |
| 8.Fuel Rate: (lbs/hr)@peak torque | 16.1 | electronista en processo (Petrolista en la colonista de la comoción de la colonista en la colo | more conditions and the second | . Her to be commended to the control of the control | | | mental and a first separate processor processor and a first separate processor and a first se | a desirable delle | | | | | | | | | | | | | | editional Chiefs conferential and concerns the Mark commenters and |
| 7.Fuel Rate: mm/stroke@peak torque | 44.7 | | | m on MATA and the state of the second for the following of the state of the second sec | | • | | | | | | to a series of the control of the co | | | | | | The second secon | | | | condition and other constraints of the contraction |
| 6.Torque @ RPM (SEA Gross) | 134.2@1600 | | THE REPORT OF THE PERSON OF TH | | THE THE PERSON NAMED IN COLUMN TO SERVICE AND ADDRESS OF THE PERSON NAMED IN COLUMN T | | | | | | | | | | | | | The state of the s | | | | the control of the formation of the control of the first transfer of the formation |
| 5.Fuel Rate: (lbs/hr) @ peak HP (for diesels only) | 24.8 | | | | A to the second an experience of the second and the | | | | | | | | | | | | | A L CO COMPANY OF THE PROPERTY | | | | the second control of |
| 4.Fuel Rate: mm/stroke @ peak HP (for diesel only) | 39.4 | | Constitution of the second | | 4 | | | Transformation of the state of | | | | T | | | | | | | | | | |
| 3.BHP@RPM (SAE Gross) | 60@2800 | | | | | | | | | | | | | | | | | | | | | |
| 2.Engine Model | A2300 | | | | | | AND THE RESIDENCE OF THE PARTY | | | | | | | | | | and the same of th | | | | | Commission of the second section of the second section of the second section of |
| 1.Engine Code | FR35001 | | | | : | | | | | | | | | | | | | | | | | |