California Environmental Protection Agency AIR RESOURCES BOARD	CUMMINS INC.	EXECUTIVE ORDER U-R-002-0119 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-45-9;

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)
2002	2CEXL0661AAA	10.8	Diesel	8000

SPECIAL FEATURES & EMISSION CONTROL SYSTEMS	TYPICAL EQUIPMENT APPLICATION
Direct Diesel Injection, Turbocharger, Charge Air Cooler	Crane, Loader, Tractor, Dozer, Pump, Compressor, Generator

The engine models and codes are attached.

The following are the exhaust certification standards (STD), or family emission limit(s) (FEL) as applicable, 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 CATEGORY		EXHAUST (g/kw-hr)					OPACITY (%)		
			HC	NOx	NMHC+NOx	CO	PM	ACCEL	LUG	PEAK
130 ≤ KW < 225	Tier 1	STD	1.3	9.2	N/A	11.4	0.54	20	15	50
		FEL	--	8.8	--	--	--	--	--	--
		CERT	0.3	8.8	--	1.6	0.16	18	2	41

BE IT FURTHER RESOLVED: That the family emission limit(s) (FEL) is an emission level declared by the manufacturer for use in any averaging, banking and trading program and in lieu of an emission standard for certification. It serves as the applicable emission standard for determining compliance of any engine within this engine family under 13 CCR Sections 2423 and 2427.

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 6th day of December 2001.

R. B. Summerfield, Chief
Mobile Source Operations Division

Engine Model Summary Form

ATTACHMENT

U-R-002-0119

Manufacturer: Cummins Inc.

Engine category: Nonroad CI

EPA Engine Family: 2CEXL0661AAA

Mfr Family Name: A353

Process Code: New Submission

1.Engine Code	2.Engine Model	3.BHP@RPM (SAE Gross)	4.Fuel Rate: mm/stroke @ peak HP (for diesel only)	5.Fuel Rate: (lbs/hr) @ peak HP (for diesels only)	6.Torque @ RPM (SEA Gross)	7.Fuel Rate: mm/stroke@peak torque	8.Fuel Rate: (lbs/hr)@peak torque	9.Emission Control Device Per SAE J1930
2363:FR 2520*	M11-C	350@2100	162	114.9	1150@1300	214	93.9	DOC, EM,TC, CAC
2916:FR2928	M11-C	300@1850	162	101.2	1075@1300	204	89.5	EM,TC
2917:FR2881	M11-C	290@2100	141	99.5	980@1300	185	81.3	EM,TC
2917:FR2882	M11-C	245@2100	121	85.6	750@1300	144	63.2	EM,TC
2917:FR2883	M11-C	300@2100	144	102.1	1015@1300	192	84.0	EM,TC
2917:FR2884	M11-C	270@2100	132	93.5	950@1300	180	78.9	EM,TC
2917:FR2885	M11-C	245@2100	121	85.6	750@1300	144	63.2	EM,TC
2917:FR2886	M11-C	245@2000	126	85.3	780@1300	150	65.6	EM,TC
2917:FR2887	M11-C	225@2100	113	80.0	760@1300	146	64.0	EM,TC
2917:FR2888	M11-C	280@2100	137	96.8	950@1300	180	78.9	EM,TC
2917:FR2889	M11-C	275@1800	150	91.3	950@1300	180	78.9	EM,TC
2917:FR2890	M11-C	270@2000	137	92.6	920@1300	175	76.7	EM,TC
2917:FR2891	M11-C	265@1700	152	87.2	900@1300	171	75.1	EM,TC
2917:FR2892	M11-C	250@2100	123	87.2	845@1300	161	70.5	EM,TC
2917:FR2893	M11-C	245@1800	136	82.8	860@1300	165	71.7	EM,TC
2917:FR2894	M11-C	260@2100	128	90.4	845@1300	161	70.5	EM,TC
2917:FR2895	M11-C	270@2100	132	93.5	885@1300	169	73.9	EM,TC
2917:FR2896	M11-C	290@2100	141	99.5	885@1300	169	73.9	EM,TC
2917:FR2897	M11-C	225@1800	127	76.9	790@1300	152	66.4	EM,TC
2917:FR2898	M11-C	275@1800	150	90.8	975@1300	185	81.0	EM,TC
2917:FR2899	M11-C	250@2100	123	87.2	845@1300	161	70.5	EM,TC
2917:FR2900	M11-C	290@2100	141	99.5	980@1300	185	81.3	EM,TC
2917:FR2901	M11-C	295@2100	146	98.5	875@1400	161	76.0	EM,TC
2917:FR2902	M11-C	290@2100	141	99.5	1015@1300	192	84.0	EM,TC
2917:FR2904	M11-C	290@2100	141	99.5	980@1300	185	81.3	EM,TC
2918:FR2869	M11-C	290@2100	169	102.6	975@1300	182	79.7	EM,TC
8074:FR2934	M11-C	300@2100	144	102.1	1015@1300	192	84.0	EM,TC
2503:FR2862	M11-C	270@2100	132	93.5	950 @ 1300	180	78.9	EC, TC