Sisu Diesel Inc.

EXECUTIVE ORDER U-R-050-0002 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)		
2005	5SIDL07.4G4A	7.4	Diesel	8000		
SPECIAL	FEATURES & EMISSION	CONTROL SYSTEMS	TYPICAL EQUIPMENT APPLICATION			
Direct Dies Engine	el Injection, Turbocharg e Control Module and Sr	er, Charge Air Cooler, noke Puff Limiter	Tractor			

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	EMISSION			1	EXHAUST (g/kw-l	1 r)		OF	PACITY (%	6)
CLASS	STANDARD CATEGORY		HC	NOx	NMHC+NOx	CO	PM	ACCEL	LUG	PEAK
130 ≤ KW < 225	Tier 2	\$TD	N/A	N/A	6.6	3.5	0.20	20	15	50
		CERT			5.3	0.7	0.15	12	4	39

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

22 ND

day of March 2005.

Allen Lyons, Chief

Mobile Source Operations Division

Return to Template	plate	Engi	Engine Model So	ummary Template	<u>olate</u>	4-R-050-0002	-0002	
Engine Family	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: 9. (lbs/hr)@peak torque Dev
5SIDL07.4G4A	74.308	74.236 ETA	248@2200	128	93.9	846@1500	155	77.5 DARCHIGE
3SIDL07.4G4A	74.400	74.234 ETA	181@2200	89	65.3	546@1500	98	49.0
5SIDL07.4G4A	74.300	74.235 ETA	206@2100		7.77	638@1500	118	59.0
5SIDL07.4G4A	66.309	66.263 ETA	168@2200	83	6.09	500@1500	68	44.5
;SIDL07.4G4A	66.305	66.253 ETA	192@2200	95	69.7	600@1500	107	53.5
;SIDL07.4G4A	66.306	66.254 ETA	177@2200	87	63.8	554@1500	66	49.5
;SIDL07.4G4A	66.307	66.255 ETA	161@2200	79	57.9	500@1500	68	44.5
3SIDL07.4G4A	66.308	66.262 ETA	188@2200	96	70.4	569@1500	106	53.0
3SIDL07.4G4A	74.304	74.274 ETA	186@2100	97	67.9	573@1500	105	52.5
;SIDL07.4G4A	74.404	74.273 ETA	235@2200	118	86.5	654@1500	134	0.79
;SIDL.07.4G4A	66.312	620.99	189@2100	26	67.9	608@1500	110	55.0
3SIDL07.4G4A	74.302	74.244 ETA	217@2000	117	78.0	654@1500	123	61.5
3SIDL07.4G4A	74.401	74.245 ETA	248@2000	132	88.0	754@1500	140	0.07
;SIDL07.4G4A	74.405	74.281 ETA	212@2200	105	77.0	707@1500	128	64.0
;SIDL07.4G4A	74.406	74.282 ETA	197@2200	66	72.6	631@1500	115	57.5
SIDL07.4G4A	74.407	74.286 ETA	222@2200	112	82.1	664@1500	123	61.5
SIDL07.4G4A	74.408	74.287 ETA	228@2200	114	83.6	711@1500	131	65.5
;SIDL07.4G4A	74.409	74.288 ETA	240@2200	120	88.0	761@1500	141	70.5
SIDL07.4G4A	66.300	66.238 ETA	197@2000	105	70.0	577@1500	117	58.5
SIDL07.4G4A	74.410	74.318 EWA	201@2200	101	74.1	769@1500	140	70.0
SIDL07.4G4A	74.309	74.292 ETA	168@2100	68	62.3	504@1500	92	46.0
SIDL07.4G4A	66.332	66.351 ETA	177@2200	87	63.8	554@1500	66	49.5
SIDL07.4G4A	74.419	74.362 ETA	228@2200	114	83.6	711@1500	131	65.5
SIDL07.4G4A	66.335	66.364 ETA	192@2200	76	71.1	600@1500	109	54.5
SIDL07.4G4A	66.333	66.365 ETA	208@2200	105	77.0	615@1500	113	56.5