

KOMATSU LIMITED

EXECUTIVE ORDER U-R-005-0306 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)		
2008	8KLXL0275AAG	4.5	Diesel	8000		
	FEATURES & EMISSION		TYPICAL EQUIPMENT APPLICATION			
Direct Dies	sel Injection, Turbocharg Engine Control Mo	er, Charge Air Cooler, odule	Loader, Tractor, Dozer, Pump and Compressor			

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 CATEGORY		EXHAUST (g/kw-hr)				OPACITY (%)			
			HC	NOx	NMHC+NOx	co	PM	ACCEL	LUG	PEAK
75 ≤ KW < 130	Tier 3	STD	N/A	N/A	4.0	5.0	0.30	20	15	50
			N/A	N/A	3.8	0.9	0.13	1	1	3

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.

Annette Hebert, Chief

Mobile Source Operations Division

ATTACHMENT TE (of) Engine Model Summary Form

U-12-005-0306

Komatsu Ltd. Manufacturer:

Engine category: Nonroad CI
EPA Engine Family: 8KLXL0275AAG

Mfr Family Name: A323

New Submission Process Code:

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9.Emission Control Device Per SAE J193	DDITC CAC FC-	DDI TC CAC	DDITCCAC	DDI TC CAC	DDI TC CAC	DDI TC CAC	DDI TO CAC
8.Fuel Rate: 9.Emission Control (ibs/hr)@peak torque Device Per SAE J1930	48.9	35.4	37.4	38.4	45.2	42.9	42.7
7.Fuel Rate: mm/stroke@peak torque	145	121	T T	114	134	127	136
6.Torque @ RPM (SEA Gross)	475 @ 1500	351 @ 1300	347@1500	346 @ 1500	441 @ 1500	377 @ 1500	433 @ 1400
5.Fuel Rate: (lbs/hr) @ peak HP (for diesels only)	65.8	43.5	49.0	47.0	58,5	53,7	48.2
4.Fuel Rate: mmstroke @ peak HP (for diesel only)	133	88	66	95	C	104	107
3.BHP@RPM (SAE Gross)	170 @ 2200	107 @ 2200	130@2200	121 @ 2200	148 @ 2300	130 @ 2300	128 @ 2000
2.Engine Model	SAA4D107E-1	SAA4D107E-1	SAA4D107E-1	SAA4D107E-1	SAA4D107E-1	SAA4D107E-1	SAA4D107E-1
1.Engine Code	8725;FR91995	1700;FR91667	1700;FH92076	1700;FR91610 SAA4D107E-1	1701;FR91606	1701;FR91607	1703;FR91617