

DEERE & COMPANY

EXECUTIVE ORDER U-R-004-0647New Off-Road
Compression-Ignition Engines

Pursuant to the authority vested in California 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-19-095;

IT IS ORDERED AND RESOLVED: That the following compression-ignition engines and emission control systems 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)					
2023	PJDXL09.0313	9.0	Diesel	8000					
SPECIAL	FEATURES & EMISSION O	CONTROL SYSTEMS	TYPICAL EQUIPMENT APPLICATION						
Direct Inje Gas Reci	Air Cooler, Oxidation C ection, Electronic Contr rculation, Turbocharger tion-Urea, Ammonia Ox	ol Module, Exhaust , Selective Catalyst	Pump, Compressor, Generator Set, Other Steady State Industrial Equipment						

The engine models and codes are attached.

The following are the exhaust certification standards (STD) and certification levels (CERT) for non-methane hydrocarbon (NMHC), 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	EMISSION			ı	EXHAUST (g/kw-ł		OPACITY (%)			
POWER CLASS	STANDARD CATEGORY		NMHC	NOx	NMHC+NOx	CO	PM	ACCEL	LUG	PEAK
130 ≤ kW ≤ 560	Tier 4 Final	STD	0.19	0.40	N/A	3.5	0.02	N/A	N/A	N/A
		CERT	0.004	0.10		0.01	0.02			

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 on this <u>/8th</u> day of October 2022.

Robin U. Lang, Chief

Emissions Certification and Compliance Division

Attachment: Engine Models

EO #: U-R-004-0647

Family: PJDXL09.0313

Attachment Last Revised: 10/5/2022

					Displacement -		Peak Power -	Peak Power -	Peak Power -	Peak Power - Fue	ı	Peak Torque -	Peak Torque -		Peak Torque - Fue	al .			
Model	Code	Trim	Config	Displacement	Units	Peak Power	Units	Speed (rpm)	Fueling	Units	Peak Torque	Units	Speed (rpm)	Peak Torque - Fuel Units		OBD	GHG	Special	Notes
6090	6090HFG06A		1-6	9	Liters	345	kilowatt	1800	263.2	mm3/stroke	1830	N-m	1800	263.2	mm3/stroke	N/A	N/A		
6090	6090HFG06B		1-6	9	Liters	300	kilowatt	1500	269.8	mm3/stroke	1910	N-m	1500	269.8	mm3/stroke	N/A	N/A		
6090	6090HFG06C		1-6	9	Liters	326	kilowatt	1800	247.5	mm3/stroke	1731	N-m	1800	247.5	mm3/stroke	N/A	N/A		
6090	6090HFG06D		1-6	9	Liters	300	kilowatt	1500	269.5	mm3/stroke	1910	N-m	1500	269.5	mm3/stroke	N/A	N/A		
6090	6090HFG06E		1-6	9	Liters	273	kilowatt	1800	201.3	mm3/stroke	1448	N-m	1800	201.3	mm3/stroke	N/A	N/A		
6090	6090HFG06F		1-6	9	Liters	273	kilowatt	1500	243	mm3/stroke	1737	N-m	1500	243	mm3/stroke	N/A	N/A		
6090	6090HPRNT7		1-6	9	Liters	364	kilowatt	1800	277.6	mm3/stroke	1934	N-m	1800	277.6	mm3/stroke	N/A	N/A		