

NISSAN MOTOR CO., LTD.

EXECUTIVE ORDER U-L-001-0032 New Off-Road Large Spark-Ignition Engines At & Above 25 Horsepower

Pursuant to the authority vested in the Air Resources Board by the Health and Safety Code, Division 26, Part 5, Chapters 1 and 2; and

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

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

MODEL YEAR	ENGINE FAMILY NAME	ENGINE DISPLACEMENT (liters)	FUEL TYPE		
2006	6NSXB02.147C	2.1	Dual Fuel, Gasoline or LPG		
DURABIL HOUR	S EMISSION	CIAL FEATURES & N CONTROL SYSTEMS	TYPICAL EQUIPMENT USAGE		
3500	Throttle Body Catalytic Conve	njection (Gas and Dual Fuel), Injection (LPG), Three-Way erter, Heated Oxygen Sensor	Forklift		
ENGIN MODEL (rated po in horsepot hp)	E .S wer	See Attached M	odel Pages		

The following are the hydrocarbon plus oxides of nitrogen (HC+NOx) and carbon monoxide (CO) exhaust certification emission standards (Title 13, California Code of Regulations, (13 CCR) Section 2433(b)(1)) and certification emission levels for this engine family in grams per brake horsepower-hour (g/bhp-hr). Engines within this engine family shall have closed crankcases in conformance with 13 CCR Section 2433(b)(2).

(g/bhp-hr)	HC+NOx	СО
Standards	3.0	37.0
Certification Levels	0.9	13.5

BE IT FURTHER RESOLVED: That for the listed engines for the aforementioned model-year, the manufacturer has submitted, and the Executive Officer hereby approves, the information and materials to demonstrate certification compliance with 13 CCR Section 2433(c) (certification and test procedures), 13 CCR Section 2434 (emission control labels), and 13 CCR Sections 2435 and 2436 (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 30th day of August 2005.

Allen Lyons, Chief

Mobile Source Operations Division

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Model Year: <u>2006</u>
Manufacturer Name: <u>NISSAN MOTOR CO., LTD</u>

Engine Family: 6NSXB02.147C

OFF-ROAD LSI ENGINE SUPPLEMENTAL INFORMATION

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S12. MODEL SUMMARY (Use an asterisk (*) to identify worst-case engine model used for certification testing.)

S13. Engine Model	S14. Engine	S15. Sales Codes (Check ALL appropriate)		S16. Eng.	S17.	S18. Rated	S19. Peak	S20. Peak	
Engine Model	Code			e)	Displ. (Liters)	Power (HP)	Speed (RPM)	Torque (FT-LB)	Torque Speed
		Calif. Only	49- State	50- State					(RPM)
K21 N-1				V	2.065	54.9	2700	108.5	2000
K21 N-2				٧	2.065	52.7	2700	111.4	1620
K21 N-3	(Gasoline)			V	2.065	54.9	2700	108.5	2000
10211110	(LPG)			v	2.065	52.6	2700	109.9	1620
K21 M-1				V	2.065	54.9	2700	108.5	2000
K21 M-2				٧	2.065	52.7	2700	111.4	1620
K21 M-3	(Gasoline)			V	2.065	54.9	2700	108.5	2000
TOUT IN-O	(LPG)			V	2.065	52.6	2700	109.9	1620
* K21 K-1				٧	2.065	57.8	2950	108.1	2000
K21 K-2				٧	2.065	55.7	2950	107.0	1770
K21 K-3	(Gasoline)			V	2.065	57.8	2950	108.1	2000
KZ1 K-S	(LPG)			V	2.065	55.2	2950	107.8	1770
K21 T-1				V	2.065	52.0	2700	104.9	2000
K21 T-2				V	2.065	48.9	2700	110.7	1620
K21 T-3	(Gasoline)			V	2.065	52.0	2700	104.9	2000
1471-5	(LPG)			V	2.065	49.7	2700	110.7	1620
K21 N-4				V	2.065	54.9	2700	108.5	2000
K21 N-5				V	2.065	52.7	2700	111.4	1620
K21 N-6	(Gasoline)			V	2.065	54.9	2700	108.5	2000
	(LPG)			V	2.065	52.6	2700	109.9	1620
K21 M-4				V	2.065	54.9	2700	108.5	2000
K21 M-5				V	2.065	52.7	2700	111.4	1620
K21 M-6	(Gasoline)			V	2.065	54.9	2700	108.5	2000
	(LPG)			V	2.065	52.6	2700	109.9	1620

ATTACHHEUT BY LOT Z

Model Year: __2006 __ Manufacturer Name: __NISSAN MOTOR CO., LTD ___ Engine Family: __6NSXB02.147C __ OFF-ROAD LSI ENGINE SUPPLEMENTAL INFORMATION

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07/14/2005

Revised: _

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S13.	S14.	S15. Sales Codes			S16.	S17.	S18.	S19.	S20.
Engine Model	Engine		Check Al		Eng.	Rated	Rated	Peak	Peak
	Code	appropriate)			Displ.	Power	Speed	Torque	Torque
		0-17	40		(Liters)	(HP)	(RPM)	(FT-LB)	Speed (RPM)
	ļ	Calif.	49- State	50- State					(ISEM)
		Only	State	State					
* K21 K-4				V	2.065	57.8	2950	108.1	2000
K21 K-5				v	2.065	55.7	2950	107.0	1770
K21 K-6	(Gasoline)			V	2.065	57.8	2950	108.1	2000
NZT K-0	(LPG)			V	2.065	55.2	2950	107.8	1770
K21 T-4				V	2.065	52.0	2700	104.9	2000
K21 T-5				V	2.065	48.9	2700	110.7	1620
K21 T-6	(Gasoline)			V	2.065	52.0	2700	104.9	2000
102710	(LPG)			V	2.065	49.7	2700	110.7	1620
K21 K-7				V	2.065	55.9	2700	108.5	2000
K21 K-8			<u> </u>	V	2.065	53.2	2700	107.0	1620
K21 K-9	(Gasoline)		ļ	V	2.065	55.9	2700	108.5	2000
	(LPG)			V	2.065	53.7	2700	107.8	1620
K21 T-7				V	2.065	52.9	2700	107.0	2000
K21 T-8				V	2.065	49.8	2700	112.1	1620
K21 T-9	(Gasoline)			V	2.065	52.9	2700	107.0	2000
	(LPG)	ļ		V	2.065	50.6	2700	112.1	1620
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