California Environmental Protection Agency AIR RESOURCES BOARD	MOTORENFABRIK HATZ GMBH & CO. KG	EXECUTIVE ORDER U-R-034-0096 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 engines 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)
2006	6HZXL3.43V42	2.574, 3.432	Diesel	8000

SPECIAL FEATURES & EMISSION CONTROL SYSTEMS	TYPICAL EQUIPMENT APPLICATION
Direct Diesel Injection	Pump, Generator Set, Other Industrial Equipment

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
37 ≤ kW < 75	Tier 2	STD	N/A	N/A	7.5	5.0	0.40	20	15	50
		CERT	--	--	6.3	2.6	0.26	14	13	16

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 21ST day of November 2005.

Allen Lyons, Chief
Mobile Source Operations Division

LARGE ENGINE MODEL SUMMARY

6/9/05 U-R-034-0096

Manufacturer: **Motorenfabrik Hatz**

Process Code: **New Submission**

EPA Engine Family: **6HZXL3.43V42**

Manufacturer Family Name: **L/M41**

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
N/A	3M41	59,5@3000	48,0	8,0	119@1800	48,5	4,9	DDI
N/A	3M41	59,1@2950	48,0	7,9	119@1800	48,5	4,9	
N/A	3M41	58,7@2900	48,0	7,8	119@1800	48,5	4,9	
N/A	3M41	58,2@2850	48,0	7,6	119@1800	48,5	4,9	
N/A	3M41	57,8@2800	48,0	7,5	119@1800	48,5	4,9	
N/A	3M41	57,4@2750	48,5	7,4	119@1800	48,0	4,8	
N/A	3M41	56,8@2700	48,5	7,3	119@1800	48,0	4,8	
N/A	3M41	56,3@2650	48,5	7,2	119@1800	48,0	4,8	
N/A	3M41	55,7@2600	48,5	7,0	119@1800	48,5	4,9	
N/A	3M41	55,1@2550	48,5	6,9	119@1800	48,5	4,9	
N/A	3M41	54,5@2500	49,5	6,9	118@1500	48,5	4,1	
N/A	3M41	54,0@2450	49,5	6,8	118@1500	48,5	4,1	
N/A	3M41	53,3@2400	49,5	6,6	118@1500	48,5	4,1	
N/A	3M41	52,4@2350	49,5	6,5	119@1800	48,5	4,9	
N/A	3M41	56,3@3000	46,5	7,8	115@1800	46,5	4,7	
N/A	3M41	55,9@2950	46,5	7,6	115@1800	46,5	4,7	
N/A	3M41	55,6@2900	46,5	7,5	115@1800	46,5	4,7	
N/A	3M41	55,2@2850	46,5	7,4	115@1800	46,5	4,7	
N/A	3M41	54,9@2800	46,5	7,3	115@1800	46,5	4,7	
N/A	3M41	54,5@2750	47,0	7,2	114@1800	46,0	4,6	
N/A	3M41	54,1@2700	47,0	7,1	114@1800	46,0	4,6	
N/A	3M41	53,9@2650	47,0	6,9	114@1800	46,0	4,6	
N/A	3M41	53,5@2600	47,5	6,9	115@1800	46,5	4,7	
N/A	3M41	52,8@2550	47,5	6,8	115@1800	46,5	4,7	
N/A	3M41	52,1@2500	48,0	6,7	115@1800	46,5	4,7	
N/A	3M41	51,5@2450	48,0	6,6	115@1800	46,5	4,7	
N/A	3M41	50,9@2400	48,0	6,4	117@1800	47,5	4,8	
N/A	3M41	49,8@2350	48,0	6,3	117@1800	47,5	4,8	
N/A	3M41	53,3@3000	44,0	7,4	100@1800	42,0	4,2	
N/A	3M41	53,1@2950	44,0	7,2	100@1800	42,0	4,2	
N/A	3M41	52,7@2900	44,0	7,1	103@1800	43,0	4,3	
N/A	3M41	52,4@2850	44,0	7,0	103@1800	43,0	4,3	
N/A	3M41	52,0@2800	44,0	6,9	105@1800	44,0	4,4	

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N/A	3M41	51,7@2750	44,5	6,8	105@1800	44,0	4,4	DDI
N/A	3M41	51,3@2700	44,5	6,7	102@1800	42,5	4,3	
N/A	3M41	51,1@2650	44,5	6,6	102@1800	42,5	4,3	
N/A	3M41	50,7@2600	45,0	6,5	106@1500	43,5	3,6	
N/A	3M41	50,1@2550	45,0	6,4	106@1500	43,5	3,6	
N/A	3M41	52,1@2300	51,0	6,5	119@2300	51,0	6,5	
N/A	3M41	51,2@2250	51,0	6,4	119@2250	51,0	6,4	
N/A	3M41	50,1@2200	51,0	6,3	119@2200	51,0	6,3	

LARGE ENGINE MODEL SUMMARY

6/9/05 U-R-034-0096

Manufacturer: Motorenfabrik Hatz

Process Code: New Submission

EPA Engine Family: 6HZXL3.43V42

Manufacturer Family Name: L/M41

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
N/A	3M41Z	58,4@3000	48,0	8,0	118@1800	48,5	4,9	DDI
N/A	3M41Z	58,0@2950	48,0	7,9	118@1800	48,5	4,9	
N/A	3M41Z	57,6@2900	48,0	7,8	118@1800	48,5	4,9	
N/A	3M41Z	57,1@2850	48,0	7,6	118@1800	48,5	4,9	
N/A	3M41Z	56,7@2800	48,0	7,5	118@1800	48,5	4,9	
N/A	3M41Z	56,3@2750	48,5	7,4	117@1800	48,0	4,8	
N/A	3M41Z	55,7@2700	48,5	7,3	117@1800	48,0	4,8	
N/A	3M41Z	55,2@2650	48,5	7,2	117@1800	48,0	4,8	
N/A	3M41Z	54,7@2600	48,5	7,0	118@1800	48,5	4,9	
N/A	3M41Z	54,0@2550	48,5	6,9	118@1800	48,5	4,9	
N/A	3M41Z	53,6@2500	49,5	6,9	117@1500	48,5	4,1	
N/A	3M41Z	53,1@2450	49,5	6,8	117@1500	48,5	4,1	
N/A	3M41Z	52,4@2400	49,5	6,6	117@1500	48,5	4,1	
N/A	3M41Z	51,5@2350	49,5	6,5	118@1800	48,5	4,9	
N/A	3M41Z	55,2@3000	46,5	7,8	114@1800	46,5	4,7	
N/A	3M41Z	54,8@2950	46,5	7,6	114@1800	46,5	4,7	
N/A	3M41Z	54,5@2900	46,5	7,5	114@1800	46,5	4,7	
N/A	3M41Z	54,4@2850	46,5	7,4	114@1800	46,5	4,7	
N/A	3M41Z	53,9@2800	46,5	7,3	114@1800	46,5	4,7	
N/A	3M41Z	53,5@2750	47,0	7,2	112@1800	46,0	4,6	
N/A	3M41Z	53,1@2700	47,0	7,1	112@1800	46,0	4,6	
N/A	3M41Z	52,8@2650	47,0	6,9	112@1800	46,0	4,6	
N/A	3M41Z	52,4@2600	47,5	6,9	114@1800	46,5	4,7	
N/A	3M41Z	51,7@2550	47,5	6,8	114@1800	46,5	4,7	
N/A	3M41Z	51,2@2500	48,0	6,7	114@1800	46,5	4,7	
N/A	3M41Z	50,5@2450	48,0	6,6	114@1800	46,5	4,7	
N/A	3M41Z	50,0@2400	48,0	6,4	116@1800	47,5	4,8	
N/A	3M41Z	52,4@3000	44,0	7,4	99@1800	42,0	4,2	
N/A	3M41Z	52,0@2950	44,0	7,2	99@1800	42,0	4,2	
N/A	3M41Z	51,6@2900	44,0	7,1	101@1800	43,0	4,3	
N/A	3M41Z	51,3@2850	44,0	7,0	101@1800	43,0	4,3	
N/A	3M41Z	50,9@2800	44,0	6,9	103@1800	44,0	4,4	
N/A	3M41Z	50,7@2750	44,5	6,8	103@1800	44,0	4,4	

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N/A	3M41Z	50,3@2700	44,5	6,7	100@1800	42,5	4,3	DDI
N/A	3M41Z	50,0@2650	44,5	6,6	100@1800	42,5	4,3	
N/A	3M41Z	49,6@2600	45,0	6,5	105@1500	43,5	3,6	
N/A	3M41Z	51,2@2300	51,0	6,5	117@2300	51,0	6,5	
N/A	3M41Z	50,0@2250	51,0	6,4	117@2250	51,0	6,4	

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LARGE ENGINE MODEL SUMMARY

Manufacturer: Motorenfabrik Hatz

Process Code: New Submission

EPA Engine Family: 6HZXL3.43V42

Manufacturer Family Name: L/M41

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
N/A	3L41C	56,1@3000	47,0	7,9	108@1800	47,5	4,8	DDI
N/A	3L41C	55,7@2950	47,0	7,7	108@1800	47,5	4,8	
N/A	3L41C	55,3@2900	47,0	7,6	108@1800	47,5	4,8	
N/A	3L41C	54,9@2850	47,0	7,5	106@1800	47,0	4,7	
N/A	3L41C	54,5@2800	47,0	7,3	105@1800	46,5	4,7	
N/A	3L41C	54,1@2750	47,5	7,3	106@1800	47,0	4,7	
N/A	3L41C	53,6@2700	47,5	7,1	106@1800	47,0	4,7	
N/A	3L41C	53,1@2650	47,5	7,0	106@1800	47,0	4,7	
N/A	3L41C	52,5@2600	47,5	6,9	105@1800	46,5	4,7	
N/A	3L41C	52,0@2550	47,5	6,8	106@1800	47,0	4,7	
N/A	3L41C	51,5@2500	48,0	6,7	108@1500	47,0	3,9	
N/A	3L41C	50,7@2450	48,0	6,6	108@1500	47,0	3,9	
N/A	3L41C	49,8@2400	48,0	6,4	109@2400	48,0	6,4	
N/A	3L41C	52,0@3000	45,0	7,5	103@1800	45,5	4,6	
N/A	3L41C	51,7@2950	45,0	7,4	103@1800	45,5	4,6	
N/A	3L41C	51,5@2900	45,0	7,3	103@1800	45,5	4,6	
N/A	3L41C	51,1@2850	45,0	7,1	102@1800	45,0	4,5	
N/A	3L41C	50,8@2800	45,0	7,0	102@1800	45,0	4,5	
N/A	3L41C	50,5@2750	45,5	7,0	102@1800	45,0	4,5	
N/A	3L41C	50,3@2700	45,5	6,8	102@1800	45,0	4,5	
N/A	3L41C	50,0@2650	45,5	6,7	102@1800	45,0	4,5	
N/A	3L41C	49,7@2600	46,0	6,7	102@1800	45,0	4,5	
N/A	4M41	79,1@3000	48,0	8,0	159@1800	48,5	4,9	
N/A	4M41	78,5@2950	48,0	7,9	159@1800	48,5	4,9	
N/A	4M41	78,0@2900	48,0	7,8	159@1800	48,5	4,9	
N/A	4M41	77,5@2850	48,0	7,6	159@1800	48,5	4,9	
N/A	4M41	76,8@2800	48,0	7,5	159@1800	48,5	4,9	
N/A	4M41	76,2@2750	48,5	7,4	159@1800	48,5	4,9	
N/A	4M41	75,6@2700	48,5	7,3	159@1800	48,5	4,9	
N/A	4M41	74,8@2650	48,5	7,2	159@1800	48,5	4,9	
N/A	4M41	74,0@2600	48,5	7,0	159@1800	48,5	4,9	
N/A	4M41	73,3@2550	48,5	6,9	160@1800	49,0	4,9	
N/A	4M41	72,5@2500	49,5	6,9	162@1500	48,5	4,1	

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N/A	4M41	71,8@2450	49,5	6,8	162@1500	48,5	4,1	DDI
N/A	4M41	71,2@2400	49,5	6,6	162@1500	48,5	4,1	
N/A	4M41	70,1@2350	49,5	6,5	159@1800	48,5	4,9	
N/A	4M41	75,2@3000	46,5	7,8	153@1800	46,5	4,7	
N/A	4M41	74,6@2950	46,5	7,6	153@1800	46,5	4,7	
N/A	4M41	74,2@2900	46,5	7,5	153@1800	46,5	4,7	
N/A	4M41	73,8@2850	46,5	7,4	153@1800	46,5	4,7	
N/A	4M41	73,3@2800	46,5	7,3	153@1800	46,5	4,7	
N/A	4M41	72,9@2750	47,0	7,2	152@1800	46,0	4,6	
N/A	4M41	72,5@2700	47,0	7,1	152@1800	46,0	4,6	
N/A	4M41	72,0@2650	47,0	6,9	152@1800	46,0	4,6	
N/A	4M41	71,6@2600	47,5	6,9	153@1800	46,5	4,7	
N/A	4M41	70,8@2550	47,5	6,8	153@1800	46,5	4,7	
N/A	4M41	69,8@2500	48,0	6,7	153@1800	46,5	4,7	

LARGE ENGINE MODEL SUMMARY

6/9/05 4-R-034-0096

Manufacturer: **Motorenfabrik Hatz**

Process Code: **New Submission**

EPA Engine Family: **6HZXL3.43V42**

Manufacturer Family Name: **L/M41**

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
N/A	4M41	68,9@2450	48,0	6,6	153@1800	46,5	4,7	DDI
N/A	4M41	68,1@2400	48,0	6,4	156@1800	47,5	4,8	
N/A	4M41	66,6@2350	48,0	6,3	153@1800	47,5	4,8	
N/A	4M41	71,2@3000	44,0	7,4	139@1800	42,0	4,2	
N/A	4M41	70,8@2950	44,0	7,2	139@1800	42,0	4,2	
N/A	4M41	70,4@2900	44,0	7,1	142@1800	43,0	4,3	
N/A	4M41	69,8@2850	44,0	7,0	142@1800	43,0	4,3	
N/A	4M41	69,4@2800	44,0	6,9	145@1800	44,0	4,4	
N/A	4M41	69,0@2750	44,5	6,8	145@1800	44,0	4,4	
N/A	4M41	68,6@2700	44,5	6,7	141@1800	42,5	4,3	
N/A	4M41	68,2@2650	44,5	6,6	141@1800	42,5	4,3	
N/A	4M41	67,8@2600	45,0	6,5	143@1800	43,5	3,6	
N/A	4M41	67,0@2550	45,0	6,4	143@1500	43,5	3,6	
N/A	4M41	66,1@2500	46,0	6,4	146@1500	44,5	3,7	
N/A	4M41	65,3@2450	46,0	6,3	146@1500	44,5	3,7	
N/A	4M41	64,5@2400	46,0	6,2	145@1500	44,0	3,7	
N/A	4M41	63,1@2350	46,0	6,0	145@1500	44,0	3,7	
N/A	4M41	69,7@2300	51,0	6,5	159@2300	51,0	6,5	
N/A	4M41	68,3@2250	51,0	6,4	159@2250	51,0	6,4	
N/A	4M41	67,0@2200	51,0	6,3	160@2200	51,0	6,3	
N/A	4M41	65,7@2150	51,0	6,1	161@2150	51,0	6,1	
N/A	4M41	64,3@2100	51,0	6,0	161@2100	51,0	6,0	
N/A	4M41	63,0@2050	51,0	5,8	162@2050	51,0	5,8	
N/A	4M41	61,6@2000	51,0	5,7	162@2000	51,0	5,7	
N/A	4M41	60,0@1950	49,0	5,3	162@1950	49,0	5,3	
N/A	4M41	58,6@1900	49,0	5,2	162@1900	49,0	5,2	
N/A	4M41	57,0@1850	49,0	5,1	162@1850	49,0	5,1	
N/A	4M41	55,3@1800	49,0	4,9	162@1800	49,0	4,9	
N/A	4M41	64,1@3000	40,0	6,7	133@1500	40,5	3,4	
N/A	4M41	63,7@2950	40,0	6,6	133@1500	40,5	3,4	
N/A	4M41	63,2@2900	40,0	6,5	132@1500	40,0	3,3	
N/A	4M41	62,8@2850	40,0	6,4	132@1500	40,0	3,3	
N/A	4M41	62,4@2800	40,0	6,2	132@1500	40,0	3,3	

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N/A	4M41	62,2@2750	40,5	6,2	132@1500	40,0	3,3	DDI
N/A	4M41	61,8@2700	40,5	6,1	132@1500	40,0	3,3	
N/A	4M41	61,4@2650	40,5	6,0	132@1500	40,0	3,3	
N/A	4M41	61,0@2600	40,5	5,9	132@1500	40,0	3,3	
N/A	4M41	60,3@2550	40,5	5,8	132@1500	40,0	3,3	
N/A	4M41	59,5@2500	41,0	5,7	132@1500	40,0	3,3	
N/A	4M41	58,7@2450	41,0	5,6	132@1500	40,0	3,3	
N/A	4M41	57,9@2400	41,0	5,5	132@1500	40,0	3,3	
N/A	4M41	56,8@2350	41,0	5,4	140@1500	42,5	3,6	
N/A	4M41	62,7@2300	47,0	6,0	151@1500	46,0	3,8	

6/9/05 U-R-034-0096

LARGE ENGINE MODEL SUMMARY

Manufacturer: Motorenfabrik Hatz

Process Code: New Submission

EPA Engine Family: 6HZXL3.43V42

Manufacturer Family Name: L/M41

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
N/A	4M41Z	77,1@3000	48,0	8,0	156@1800	48,5	4,9	DDI
N/A	4M41Z	76,5@2950	48,0	7,9	156@1800	48,5	4,9	
N/A	4M41Z	76,0@2900	48,0	7,8	156@1800	48,5	4,9	
N/A	4M41Z	75,4@2850	48,0	7,6	156@1800	48,5	4,9	
N/A	4M41Z	74,8@2800	48,0	7,5	156@1800	48,5	4,9	
N/A	4M41Z	74,2@2750	48,5	7,4	156@1800	48,5	4,9	
N/A	4M41Z	73,6@2700	48,5	7,3	156@1800	48,5	4,9	
N/A	4M41Z	72,8@2650	48,5	7,2	156@1800	48,5	4,9	
N/A	4M41Z	72,0@2600	48,5	7,0	156@1800	48,5	4,9	
N/A	4M41Z	71,3@2550	48,5	6,9	157@1800	49,0	4,9	
N/A	4M41Z	71,2@2500	49,5	6,9	157@1500	48,5	4,1	
N/A	4M41Z	70,5@2450	49,5	6,8	157@1500	48,5	4,1	
N/A	4M41Z	69,8@2400	49,5	6,6	157@1500	48,5	4,1	
N/A	4M41Z	68,7@2350	49,5	6,5	156@1800	48,5	4,9	
N/A	4M41Z	73,2@3000	46,5	7,8	150@1800	46,5	4,7	
N/A	4M41Z	72,6@2950	46,5	7,6	150@1800	46,5	4,7	
N/A	4M41Z	72,2@2900	46,5	7,5	150@1800	46,5	4,7	
N/A	4M41Z	71,8@2850	46,5	7,4	150@1800	46,5	4,7	
N/A	4M41Z	71,3@2800	46,5	7,3	150@1800	46,5	4,7	
N/A	4M41Z	70,9@2750	47,0	7,2	148@1800	46,0	4,6	
N/A	4M41Z	70,5@2700	47,0	7,1	148@1800	46,0	4,6	
N/A	4M41Z	69,9@2650	47,0	6,9	148@1800	46,0	4,6	
N/A	4M41Z	69,5@2600	47,5	6,9	150@1800	46,5	4,7	
N/A	4M41Z	68,7@2550	47,5	6,8	150@1800	46,5	4,7	
N/A	4M41Z	68,5@2500	48,0	6,7	150@1800	46,5	4,7	
N/A	4M41Z	67,5@2450	48,0	6,6	150@1800	46,5	4,7	
N/A	4M41Z	66,7@2400	48,0	6,4	153@1800	47,5	4,8	
N/A	4M41Z	65,3@2350	48,0	6,3	153@1800	47,5	4,8	

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LARGE ENGINE MODEL SUMMARY

Manufacturer: **Motorenfabrik Hatz**

Process Code: **New Submission**

EPA Engine Family: **6HZXL3.43V42**

Manufacturer Family Name: **L/M41**

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
N/A	4M41Z	69,1@3000	44,0	7,4	136@1800	42,0	4,2	DOI
N/A	4M41Z	68,7@2950	44,0	7,2	136@1800	42,0	4,2	
N/A	4M41Z	68,3@2900	44,0	7,1	139@1800	43,0	4,3	
N/A	4M41Z	67,8@2850	44,0	7,0	139@1800	43,0	4,3	
N/A	4M41Z	67,4@2800	44,0	6,9	142@1800	44,0	4,4	
N/A	4M41Z	67,0@2750	44,5	6,8	142@1800	44,0	4,4	
N/A	4M41Z	66,6@2700	44,5	6,7	138@1800	42,5	4,3	
N/A	4M41Z	66,2@2650	44,5	6,6	138@1800	42,5	4,3	
N/A	4M41Z	65,8@2600	45,0	6,5	140@1500	43,5	3,6	
N/A	4M41Z	65,0@2550	45,0	6,4	140@1500	43,5	3,6	
N/A	4M41Z	64,7@2500	46,0	6,4	143@1500	44,5	3,7	
N/A	4M41Z	63,9@2450	46,0	6,3	143@1500	44,5	3,7	
N/A	4M41Z	63,1@2400	46,0	6,2	142@1500	44,0	3,7	
N/A	4M41Z	61,8@2350	46,0	6,0	142@1500	44,0	3,7	
N/A	4M41Z	68,3@2300	47,0	6,0	156@2300	51,0	6,5	
N/A	4M41Z	67,0@2250	51,0	6,4	156@2250	51,0	6,4	
N/A	4M41Z	65,7@2200	51,0	6,3	157@2200	51,0	6,3	
N/A	4M41Z	64,3@2150	51,0	6,1	157@2150	51,0	6,1	
N/A	4M41Z	63,0@2100	51,0	6,0	158@2100	51,0	6,0	
N/A	4M41Z	61,6@2050	51,0	5,8	158@2050	51,0	5,8	
N/A	4M41Z	60,3@2000	51,0	5,7	159@2000	51,0	5,7	
N/A	4M41Z	58,7@1950	49,0	5,3	159@1950	49,0	5,3	
N/A	4M41Z	57,2@1900	49,0	5,2	159@1900	49,0	5,2	
N/A	4M41Z	55,6@1850	49,0	5,1	158@1850	49,0	5,1	
N/A	4M41Z	54,0@1800	49,0	4,9	158@1800	49,0	4,9	
N/A	4M41Z	62,0@3000	40,0	6,7	131@1500	40,5	3,4	
N/A	4M41Z	61,6@2950	40,0	6,6	131@1500	40,5	3,4	
N/A	4M41Z	61,2@2900	40,0	6,5	129@1500	40,0	3,3	
N/A	4M41Z	60,8@2850	40,0	6,4	129@1500	40,0	3,3	
N/A	4M41Z	60,4@2800	40,0	6,2	129@1500	40,0	3,3	
N/A	4M41Z	60,2@2750	40,5	6,2	129@1500	40,0	3,3	
N/A	4M41Z	59,8@2700	40,5	6,1	129@1500	40,0	3,3	
N/A	4M41Z	59,4@2650	40,5	6,0	129@1500	40,0	3,3	

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N/A	4M41Z	59,0@2600	40,5	5,9	129@1500	40,0	3,3	DDI
N/A	4M41Z	58,3@2550	40,5	5,8	129@1500	40,0	3,3	
N/A	4M41Z	58,2@2500	41,0	5,7	129@1500	40,0	3,3	
N/A	4M41Z	57,4@2450	41,0	5,6	129@1500	40,0	3,3	
N/A	4M41Z	56,5@2400	41,0	5,5	129@1500	40,0	3,3	
N/A	4M41Z	55,5@2350	41,0	5,4	136@1500	42,5	3,6	
N/A	4M41Z	61,4@2300	47,0	6,0	148@1500	46,0	3,8	

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LARGE ENGINE MODEL SUMMARY

Manufacturer: **Motorenfabrik Hatz**

Process Code: **New Submission**

EPA Engine Family: **6HZXL3.43V42**

Manufacturer Family Name: **L/M41**

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
N/A	4L41C	74,5@3000	47,0	7,9	142@1800	47,5	4,8	DDI
N/A	4L41C	74,0@2950	47,0	7,7	142@1800	47,5	4,8	
N/A	4L41C	73,4@2900	47,0	7,6	142@1800	47,5	4,8	
N/A	4L41C	72,9@2850	47,0	7,5	141@1800	47,0	4,7	
N/A	4L41C	72,4@2800	47,0	7,3	139@1800	46,5	4,7	
N/A	4L41C	72,0@2750	47,5	7,3	141@1800	47,0	4,7	
N/A	4L41C	71,2@2700	47,5	7,1	141@1800	47,0	4,7	
N/A	4L41C	70,5@2650	47,5	7,0	141@1800	47,0	4,7	
N/A	4L41C	69,8@2600	47,5	6,9	139@1800	46,5	4,7	
N/A	4L41C	69,0@2550	47,5	6,8	139@1800	46,5	4,7	
N/A	4L41C	68,3@2500	48,0	6,7	142@1500	47,0	3,9	
N/A	4L41C	67,0@2450	48,0	6,6	142@1500	47,0	3,9	
N/A	4L41C	65,7@2400	48,0	6,4	144@2400	48,0	6,4	
N/A	4L41C	63,7@2350	48,0	6,3	142@2350	48,0	6,3	
N/A	4L41C	69,0@3150	45,0	7,9	136@1800	45,5	4,6	
N/A	4L41C	69,0@3000	45,0	7,5	136@1800	45,5	4,6	
N/A	4L41C	68,5@2950	45,0	7,4	136@1800	45,5	4,6	
N/A	4L41C	67,9@2900	45,0	7,3	136@1800	45,5	4,6	
N/A	4L41C	67,5@2850	45,0	7,1	134@1800	45,0	4,5	
N/A	4L41C	67,0@2800	45,0	7,0	134@1800	45,0	4,5	
N/A	4L41C	66,5@2750	45,5	7,0	134@1800	45,0	4,5	
N/A	4L41C	65,9@2700	45,5	6,8	134@1800	45,0	4,5	
N/A	4L41C	65,5@2650	45,5	6,7	134@1800	45,0	4,5	
N/A	4L41C	65,0@2600	46,0	6,7	134@1800	45,0	4,5	
N/A	4L41C	64,2@2550	46,0	6,5	136@1800	45,5	4,6	
N/A	4L41C	63,2@2500	46,5	6,5	142@1500	47,0	3,9	
N/A	4L41C	62,4@2450	46,5	6,4	138@1500	46,0	3,8	
N/A	4L41C	61,6@2400	46,5	6,2	138@1500	46,0	3,8	
N/A	4L41C	60,3@2350	46,5	6,1	138@1500	46,0	3,8	

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LARGE ENGINE MODEL SUMMARY

Manufacturer: **Motorenfabrik Hatz**

Process Code: **New Submission**

EPA Engine Family: **6HZXL3.43V42**

Manufacturer Family Name: **L/M41**

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
N/A	4L41C	65,4@3000	42,5	7,1	129@1800	43,0	4,3	DDI
N/A	4L41C	64,9@2950	42,5	7,0	129@1800	43,0	4,3	
N/A	4L41C	64,5@2900	42,5	6,9	129@1800	43,0	4,3	
N/A	4L41C	63,9@2850	42,5	6,8	126@1800	42,0	4,2	
N/A	4L41C	63,5@2800	42,5	6,6	126@1800	42,0	4,2	
N/A	4L41C	63,0@2750	43,0	6,6	129@1800	43,0	3,6	
N/A	4L41C	62,4@2700	43,0	6,5	129@1800	43,0	4,3	
N/A	4L41C	62,0@2650	43,0	6,4	129@1800	43,0	4,3	
N/A	4L41C	61,5@2600	43,5	6,3	129@1800	43,0	4,3	
N/A	4L41C	60,7@2550	43,5	6,2	128@1500	43,0	3,6	
N/A	4L41C	59,9@2500	43,5	6,1	128@1500	43,0	3,6	
N/A	4L41C	59,1@2450	43,5	5,9	128@1500	43,0	3,6	
N/A	4L41C	58,3@2400	43,5	5,8	128@1500	43,0	3,6	
N/A	4L41C	57,1@2350	43,5	5,7	131@1500	44,0	3,7	
N/A	4L41C	63,0@2300	49,0	6,3	144@2300	49,0	6,3	
N/A	4L41C	61,6@2250	49,0	6,1	144@2250	49,0	6,1	
N/A	4L41C	60,3@2200	49,0	6,0	144@2200	49,0	6,0	
N/A	4L41C	59,0@2150	49,0	5,9	145@2150	49,0	5,9	
N/A	4L41C	57,6@2100	49,0	5,7	144@2100	49,0	5,7	
N/A	4L41C	56,3@2050	49,0	5,6	145@2050	49,0	5,6	
N/A	4L41C	54,9@2000	49,0	5,5	145@2000	49,0	5,5	
N/A	4L41C	53,6@1950	48,0	5,2	145@1950	48,0	5,2	
N/A	4L41C	52,3@1900	48,0	5,1	145@1900	48,0	5,1	
N/A	4L41C	50,9@1850	48,0	5,0	145@1850	48,0	5,0	
N/A	4L41C	49,6@1800	48,0	4,8	145@1800	48,0	4,8	
N/A	4L41C	58,8@3000	38,5	6,4	124@1800	41,0	4,1	
N/A	4L41C	58,4@2950	38,5	6,3	124@1800	41,0	4,1	
N/A	4L41C	58,0@2900	38,5	6,2	124@1800	41,0	4,1	
N/A	4L41C	57,5@2850	38,5	6,1	116@1800	38,0	3,8	
N/A	4L41C	57,1@2800	38,5	6,0	116@1800	38,0	3,8	
N/A	4L41C	56,7@2750	38,5	5,9	119@1800	39,0	3,9	
N/A	4L41C	56,3@2700	38,5	5,8	119@1800	39,0	3,9	
N/A	4L41C	55,7@2650	38,5	5,7	119@1800	39,0	3,9	

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N/A	4L41C	55,3@2600	39,0	5,7	121@1800	40,0	4,0	DDI
N/A	4L41C	54,7@2550	39,0	5,5	120@1500	40,0	3,3	
N/A	4L41C	53,9@2500	39,0	5,4	120@1500	40,0	3,3	
N/A	4L41C	53,2@2450	39,0	5,3	120@1500	40,0	3,3	
N/A	4L41C	52,5@2400	39,0	5,2	120@1500	40,0	3,3	
N/A	4L41C	51,3@2350	39,0	5,1	120@1500	40,0	3,3	
N/A	4L41C	56,7@2300	44,0	5,6	130@2300	44,0	5,6	