State of California
AIR RESOURCES BOARD

EXECUTIVE ORDER M-2-356
Relating to Certification of New Motorcycles

HONDA MOTOR CO., LTD.

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

Pursuant to the authority vested in the undersigned by Health and Safety Code Sections 39515 and 39516 and Executive Order G-45-9;

IT IS ORDERED AND RESOLVED: That 2000 model-year Honda Motor Co., Ltd. exhaust emission control systems are certified as described below for four-stroke gasoline-powered motorcycles:

Engine Family	Displacement Cubic Centimeters	Class	Exhaust Emission Control Systems & Special Features
YHNXC01.5ABA	1520	III	Pulsed Secondary Air Injection

Vehicle models and transmissions are listed on the attachment. Production motorcycles shall be in all material respects the same as those for which certification is granted.

The following are the exhaust emission standards and exhaust emission certification values for this engine family. The designated hydrocarbons standard shall be listed on the permanent tune-up label:

Hydrocarbon Standards (Corporate Average) Grams per Kilometer	Hydrocarbon Standards (Designated) Grams per Kilometer	Hydrocarbons (Certification) Grams per Kilometer	Carbon Monoxide (Standard) Grams per Kilometer	Carbon Monoxide (Certification) Grams per Kilometer
1.4	1.3	1.0	12	8

BE IT FURTHER RESOLVED: That the above-described certification is subject to the following terms, limitations and conditions:

The above designated hydrocarbons standard shall be the exhaust limit for this engine family during the model year and therefore cannot be redesignated by the manufacturer. It represents the hydrocarbons exhaust emission standard applicable to this engine family that shall be applied when determining compliance of any motorcycle within this engine family pursuant to Section 2101 of Title 13, California Code of Regulations. It will also be used to determine compliance with the above corporate average hydrocarbons standard as required per Section 1958(b), Title 13 of the California Code of Regulations.

BE IT FURTHER RESOLVED: That the Executive Officer has been provided all material required to demonstrate certification compliance with the Board's emission control system warranty regulations (Title 13, California Code of Regulations, Section 2035 et seq.).

BE IT FURTHER RESOLVED: That the listed vehicle models also comply with "California Evaporative Emission Standards and Test Procedures for 1978 and Subsequent Model Motor Vehicles."

BE IT FURTHER RESOLVED: That these motorcycles are found exempt from compliance with the Air Resources Board's "Specifications for Fill Pipes and Openings of Motor Vehicle Fuel Tanks" pursuant to Executive Order G-70-16-E.

Vehicles certified under this Executive Order must conform to all applicable California emission regulations.

Executed at El Monte, California this 16th day of June 1999.

R. B. Summerfield, Chief
Mobile Source Operations Division

Engine Family: YHNXC01.5ABA

Motorcycle Model Summary Form

65. Model Designation	66. Worst Case	67. Disp. (cc)	68. Bore / Stroke (mm)	69. Basic Ignition Timing (degrees)	70. Power (kW)	71. Rated Speed (RPM)	72. Rated Torque (Nm)	73. Rated Speed (RPM)
GL1500A	X	1520	71.0 / 64.0	0(BTDC)	71.6	5000	145.1	4000
GL1500SE		1520	71.0 / 64.0	0(BTDC)	71.6	5000	145.1	4000

65. Model Designation	74. EIM (kg)	75. Loaded Vehicle Weight Range (kg)	76. Road Load (nt)	77. Total Vehicle Mass (kg)	78. Full Weight with All Factory Options (kg)	79. Trans. Type	80. N/V
GL1500A	500	496 - 505	170.5	505	505	M5	28.2
GL1500SE	500	496 - 505	170.5	505	505	M5	28.2

Motorcycle Engine Family Information Form

0.35

1. Manufacturer: Honda Motor Co., Ltd.

2. Certification contact Person, address, phone, and fax:

Julie Barkow, Certification Assistant, Certification Department
American Honda Motor Co., Inc. Mail Stop 500-2C-8A
1919 Torrance Blvd., Torrance CA 90501-2746
Telephone: (310)783-3417 Fax: (310)783-3510 E-Mail: Julie_Barkow@ahm.honda.com

3. Model Year: 2000

4. Process Code: New
(new, correction, revised, r/c, f/f, etc.)

5. Engine Family: YHNXC01.5ABA
   50s Eng. Code: N/A
   49s Eng. Code: YDA1
   Calif. Eng. Code: YDA2

6. Emission Control System: PAIR

7. Calif. Designated Standard(g/km): 1.3

8. Project Annual Sales: CONFIDENTIAL

9. New Technology: ☐ Yes ☒ No
If yes, cite the correspondence or reference the submittal document: N/A

10. Displacement(cc): 1520

11. Number of Cylinder: 6

12. Cylinder Arrangement: Flat-6/Opposed

13. Cylinder Head Configuration: OHV/OHC

14. Type of Cooling: Liquid Cooled

15. Combustion Cycle: Otto

16. Method of Aspiration: Natural

17. Fuel System: Carburetors

18. Number of Catalytic Converters: N/A

19. Adjustable Parameters:

Parameters(s)	Adjustable Range (or N/A)	Tamper Resistance Method (or N/A)	Method Approved
Carburetor Pilot Screw	Not Limited	Recess "D" shaped head that requires a special tool	Approved by EPA on 11/22/88

20. AECDs in the Emission Control System:

Exhaust System	Evaporative System
AECDs In System:	AECDs In System:
PAIR Check Valve	Evap CAV Control Valve
PAIR Control Valve	
IAT Check Valve	
IAT Valve	
IAT Thermal Vacuum Valve	
IASA Valve	
Carburetor Coolant Thermal Valve	
Gear Position Switch	
ECM	
ECT Sensor	
IAT Sensor	
PAIR Solenoid Valve	
CAJ Solenoid Valve	

Application Processed by: Joseph Jegede Date: 6/10/99 Reviewed by: L. Hadz Date: 6/10/99

Engine Family: YHNXC01.5ABA

Motorcycle Test Information Form

27. Are you carrying over test results from a previously certified family? ☒ Yes ☐ No
    a) If yes, indicate family name: MHN152042A7
    b) Is the family being certified identical to the family from which the data is being carried over? Yes

28. Model Designation of Test Vehicle: GL1500A

29. Test Information Number: M03

30. Vehicle ID: 91DA-01

31. Service Accumulation Duration(km): 15015

32. Maximum Rated Power(kW @ RPM): 71.6 @ 5000

33. Displacement(cc): 1520

34. Certification Fuel: Indolene

35. Test Data Set: 1

36. Road Load(nt): 170.5

37. Inertia Mass(kg): 500

38. N/V: 28.2

39. Evap Bench Test Method Approval:
    Data: March 9, 1983
    Reference: 17.01.01-1(ARB) & 17.01.02-2(ARB) thru 17.01.02-12(ARB) in 1999 Model Year Application

40. Unscheduled Maintenance: ☐ Yes ☒ No

41. If yes Vehicle Log Provided: N/A

42. Exhaust Emission Deterioration Factor

		Emission Values	
Test Number	System Kilometers	HC	CO
1	3593	0.91	9.2
2	6514	1.21	7.5
3	6544	0.92	7.4
4	9693	0.88	8.4
5	12688	0.93	9.2
6	12719	0.94	8.8
7	15015	1.02	7.7
Interpolated Values at 15,000 km:		HC = 0.9633	CO = 8.3627
Extrapolated Values at 30,000 km:		HC = 0.9371	CO = 8.4958

Check One:	
Regular DF	X
Modified DF	
If Different Vehicle Specify Vehicle ID	

43. Emission Test Results:

Official Test Results		Test 1	Test 2	Test 3	Test 4		Deterioration Factors
g/km	CO	7.7				(X)	1.016
g/km	CO_2	127.6					———
g/km	HC	1.02				(X)	1.000 (0.973)
g/km	Evap.	0.80				(+)	0.0

():Calculated Value

44. Certification Levels:

g/km	CO	8			
g/km	HC	1.0			
g/test	Evap.	0.8			

Engine Family: YHNXC01.5ABA

Evaporative Emission Information

45. Evaporative Family: YHNXE0025EZA

46. Number of Evap. Canisters: 1

47. Design Working Capacity(g): 25.0
2.0(ACL Element)

48. Configuration: Open Bottom
Refer to Section 17.02.02-2(ACL Element)*

49. Number of storage Areas: 2
(Evap. canister & ACL Element)

50. Fuel Reservoir Volume(cc): 154

51. Vent System Configuration: Internal

52. Nominal Tank Capacity(liter): 24.0
* : In our 1999 application certification

53. Engine Displacement Class: III

54. Storage Medium Composition: Charcoal
Cellulose Charcoal (ACL Element)

55. Evap. Canister Medium Volume(cc): 680 +/- 12.7
Evap. Storage Element(g)** 2.0 +/- 0.5

56. Evap. Family Sales: CONFIDENTIAL

57. Engine Code: YDA2

58. Evap. Emission Family Code: 00ZA

59. Evap. Emission Family Group: E

60. **Overall Evap D.F.**= 0.0
** : Design Working Capacity

Bench DF

61. Test Vehicle ID: 88DA-01

62. Test Results:

Test Number	System Kilometers	Evap. Emission Values (g/test)
1	3500	0.67
2	3500	0.79
3	3500	0.86
4	15000	0.68
5	15000	0.64
6	15000	0.64
7		
Interpolated Values at 15,000 **km: =** 0.653		
Extrapolated Values at 30,000 **km: =** 0.497		
Bench Test D.F. = 0.00 (calculated value = -0.16)		

Check One:	
Regular DF	X
Modified DF	
If Different Vehicle Specify Vehicle ID	

Vehicle DF

63. Test Vehicle ID: 88DA-01

64. Test Results:

Test Number	System Kilometers	Evap. Emission Values (g/test)
1	3627	0.70
2	6494	0.70
3	6524	0.71
4	9665	0.69
5	12903	0.76
6	12933	0.66
7	15012	0.80
Interpolated Values at 15,000 **km: =** 0.746		
Extrapolated Values at 30,000 **km: =** 0.828		
Vehicle Test D.F. = 0.08		