

File

State of California
AIR RESOURCES BOARD

EXECUTIVE ORDER M-2-360
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:

<u>Engine Family</u>	<u>Displacement Cubic Centimeters</u>	<u>Class</u>	<u>Exhaust Emission Control Systems & Special Features</u>
YHNXC01.0ABA	996	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:

<u>Hydrocarbon Standards (Corporate Average) Grams per Kilometer</u>	<u>Hydrocarbons (Designated) Grams per Kilometer</u>	<u>Hydrocarbons (Certification) Grams per Kilometer</u>	<u>Carbon Monoxide (Standard) Grams per Kilometer</u>	<u>Carbon Monoxide (Certification) Grams per Kilometer</u>
1.4	1.4	0.5	12	9

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.

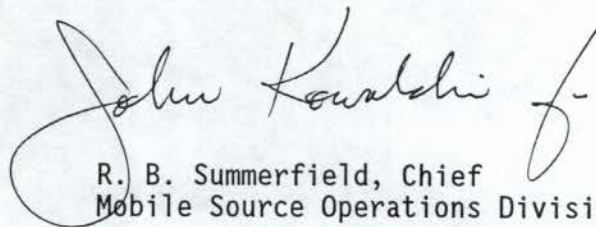
BE IT FURTHER RESOLVED: That the Executive Officer has been provided all material required to demonstrate certification compliance with the Board's emission control system warranty regulations (Title 13, California Code of Regulations, Section 2035 et seq.).

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 20th day of July 1999.

A handwritten signature in cursive script, appearing to read "John Kowalski". The signature is written in dark ink and is positioned above the typed name and title.

R. B. Summerfield, Chief
Mobile Source Operations Division

Motorcycle Engine Family Information Form

0.12

- 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: YHXC01.QABA
 50s Eng. Code: N/A
 49s Eng. Code: YDG1
 Calif. Eng. Code: YDG2
- 6. Emission Control System: PAIR
- 7. Calif. Designated Standard(g/km): 1.4
- 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): 996
- 11. Number of Cylinder: 2
- 12. Cylinder Arrangement: 90 Degrees V-2
- 13. Cylinder Head Configuration: OHV/DOHC
- 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 09/03/91

20. AECDS in the Emission Control System:

Exhaust System	Evaporative System
AECDS In System: <u>PAIR Control Valve</u> <u>Throttle Position Sensor</u> <u>ECT Sensor</u>	AECDS In System: <u>Evap CAV Control Valve</u> _____ _____

Application Processed by: Joseph Jegede Date: 7/20/99
 Reviewed by: Steve Hada Date: 7/20/99

Engine Family: YHNXC01.0ABA

Motorcycle Test Information Form

27. Are you carrying over test results from a previously certified family? Yes No
 a) If yes, indicate family name: WHNXC01.0ABA
 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: VIR1000F
 29. Test Information Number: W02
 30. Vehicle ID: 98DG-01
 31. Service Accumulation Duration(km): 15012
 32. Maximum Rated Power(kW @ RPM): 79.8 @ 8500
 33. Displacement(cc): 996
 34. Certification Fuel: Indolene
 35. Test Data Set: 1
 42. Exhaust Emission Deterioration Factor

36. Road Load(nt): 135.4
 37. Inertia Mass(kg): 300
 38. N/V: 37.0
 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

Test Number	System Kilometers	Emission Values	
		HC	CO
1	3595	0.39	8.5
2	6503	0.39	8.3
3	6534	0.38	8.5
4	9698	0.42	8.7
5	12916	0.41	8.7
6	12947	0.37	8.8
7	15012	0.44	8.5
Interpolated Values at <u>15,000 km</u> :		HC = <u>0.4154</u>	CO = <u>8.6883</u>
Extrapolated Values at <u>30,000 km</u> :		HC = <u>0.4581</u>	CO = <u>9.0129</u>

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
g/km	CO	8.5			
g/km	CO ₂	113.9			
g/km	HC	0.44			
g/km	Evap.	0.55			

Deterioration Factors	
(X)	1.037

(X)	1.103
(+)	0.0

44. Certification Levels:

g/km	CO	9			
g/km	HC	0.5			
g/test	Evap.	0.6			

Evaporative Emission Information

- | | |
|--|---|
| <p>45. Evaporative Family: YHNXE0028PZF</p> <p>46. Number of Evap. Canisters: 1</p> <p>47. Design Working Capacity(g): 28.0</p> <p>48. Configuration: Open Bottom</p> <p>49. Number of storage Areas: 1</p> <p>50. Fuel Reservoir Volume(cc): 268</p> <p>51. Vent System Configuration: Internal</p> <p>52. Nominal Tank Capacity(liter): 16.0</p> | <p>53. Engine Displacement Class: III</p> <p>54. Storage Medium Composition: Charcoal</p> <p>55. Evap. Canister Medium Volume(cc): 680 +/- 10</p> <p>56. Evap. Family Sales: CONFIDENTIAL</p> <p>57. Engine Code: YDG2</p> <p>58. Evap. Emission Family Code: 00ZF</p> <p>59. Evap. Emission Family Group: P</p> <p>60. Overall Evap D.F.= 0.0</p> |
|--|---|

Bench DF

61. Test Vehicle ID: 98DG-01
62. Test Results:

Test Number	System Kilometers	Evap. Emission Values (g/test)
1	3500	0.52
2	3500	0.38
3	3500	0.36
4	15000	0.44
5	15000	0.40
6	15000	0.34
7		
Interpolated Values at <u>15,000</u> km: = <u>0.393</u>		
Extrapolated Values at <u>30,000</u> km: = <u>0.359</u>		
Bench Test D.F. = <u>0.00</u> (calculated value = -0.03)		

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

Vehicle DF

63. Test Vehicle ID: 98DG-01
64. Test Results:

Test Number	System Kilometers	Evap. Emission Values (g/test)
1	3595	0.44
2	6503	0.81
3	6534	0.58
4	9698	0.81
5	12916	0.84
6	12947	0.54
7	15012	0.55
Interpolated Values at <u>15,000</u> km: = <u>0.689</u>		
Extrapolated Values at <u>30,000</u> km: = <u>0.790</u>		
Vehicle Test D.F. = <u>0.10</u>		