

6.1 Specifications

Item		Three-phase 200V class Specifications					Single-phase 200V class Specifications				
WJ200 inverters, 200V models		002L	004L	007L	015L	022L	002S	004S	007S	015S	022S
Applicable motor size Note1)	kW	0.2	0.4	0.75	1.5	2.2	0.2	0.4	0.75	1.5	2.2
	HP	1/4	1/2	1	2	3	1/4	1/2	1	2	3
Rated capacity(kVA)	200V	0.4	0.9	1.3	2.4	3.4	0.4	0.9	1.3	2.4	3.4
	240V	0.5	1.0	1.6	2.9	4.1	0.5	1.0	1.6	2.9	4.1
Rated input voltage		Three-phase: 200V-15% to 240V +10%, 50/60Hz ±5%					Single-phase: 200V-15% to 240V +10%, 50/60Hz ±5%				
Rated output voltage Note2)		3-phase: 200 to 240V (proportional to input voltage)									
Rated output current (A)		1.4	2.6	4.0	7.1	10.0	1.4	2.6	4.0	7.1	10.0
Cooling method		Self-cooling			Force ventilation		Self-cooling			Force ventilation	
Braking (capacitive feedback) Note3)		Approx.50%			Approx.20 to 40%		Approx.50%			Approx.20 to 40%	
Weight	(kg)	0.7	0.8	0.9	1.2	1.3	0.7	0.8	0.9	1.2	1.3
	(lb)	1.6	1.8	2.0	2.7	2.9	1.6	1.8	2.0	2.7	2.9

Common specification

項目	仕様	
Protective housing (JIS C 0920,IEC60529)	IP20	
Control	Control method	Sinusoidal Pulse Width Modulation (PWM) control
	Output frequency range Note4)	0.1 to 400 Hz
	Frequency accuracy Note5)	Digital command: ±0.01% of the maximum frequency Analog command: ±0.2% of the maximum frequency (25°C ± 10°C)
	Frequency setting resolution	Digital input: 0.01 Hz Analog input: Maximum output frequency/1000
	Volt./Freq. characteristic	V/f control (constant torque, variable torque)
	Overload capacity	150%/60 seconds
	Acceleration/deceleration time	0.01 to 3,600.0 seconds (in linear or curved pattern)、2nd motors setting is possible
Input signal	Freq. setting	External signal : adjustable resistor / 0 to +10 VDC /0 to 20 mA, Modbus、 Option operator、 Dedicated operator
	RUN/STOP Order	External digital input signal(3-wire input possible), Modbus Option Operator、 Dedicated Operator
	Intelligent input terminal	5terminals
	Analog input	1terminal(O/OI terminal : Voltage input10bit/0 to 10V, Current input : 10bit/0 to 20mA selected with a selection switch)
Output signal	Intelligent output terminal	5 open-collector output terminals, 1 relay (1 from c-contact) output terminal
	Pulse Output	1terminal
connection	RS-422	RJ45 Connector ,(Common with RS485 : selecting it with a selection switch)Option Operator,ProDriveNext
	RS-485	RJ45 Connector ,(Common with RS422 : selecting it with a changeover switch)Modbus-RTU
General specification	Temperature Note6)	Operating (ambient): -10 to 50°C, / Storage: -20 to 65°C
	Humidity	20 to 90% humidity (non-condensing)
	Vibration	5.9m/s ² (0.6G), 10 to 55 Hz
	Location	Altitude 1,000m or less, indoors (no corrosive gasses or dust)
	Standards Compliance	UL、 CE、 c-UL、 c-tick

Note1) The applicable motor refers to Hitachi standard 3-phase motor (4p). When using other motors, care must be taken to prevent the rated motor current (50/60Hz) from exceeding the rated output current of the inverter.

Note2) The output voltage decreases as the main supply voltage decreases (except when using the AVR function). In any case, the output voltage cannot exceed the input power supply voltage.

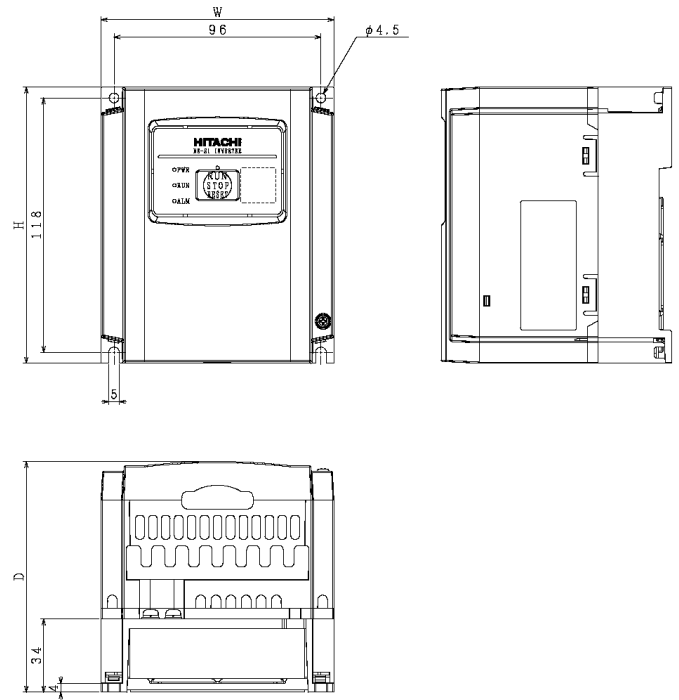
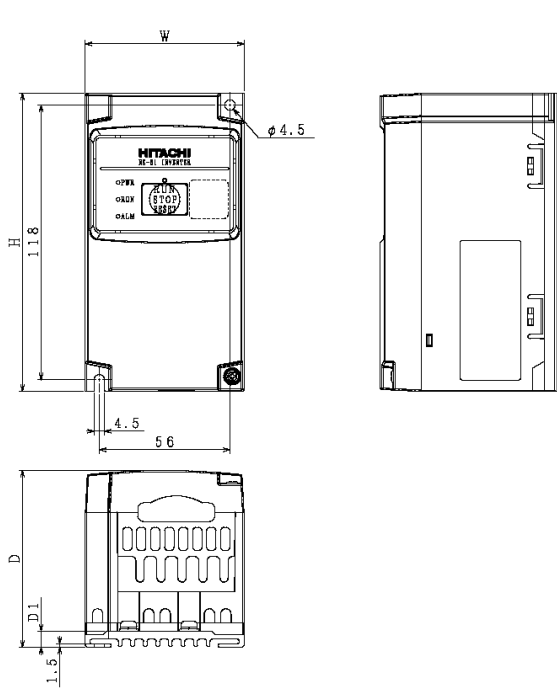
Note3) The braking torque via capacitive feedback is the average deceleration torque at the shortest deceleration (stopping from 50/60Hz as indicated). It is not continuous regenerative braking torque. The average deceleration torque varies with motor loss. This value decreases when operating beyond 50Hz.

Note4) To operate the motor beyond 50/60Hz, consult the motor manufacturer for the maximum allowable rotation speed.

Note5) To get motor stabilized operation, inverter output Frequency might exceeds preset maximum Freq.(A004/A204) by 2Hz in maximum.

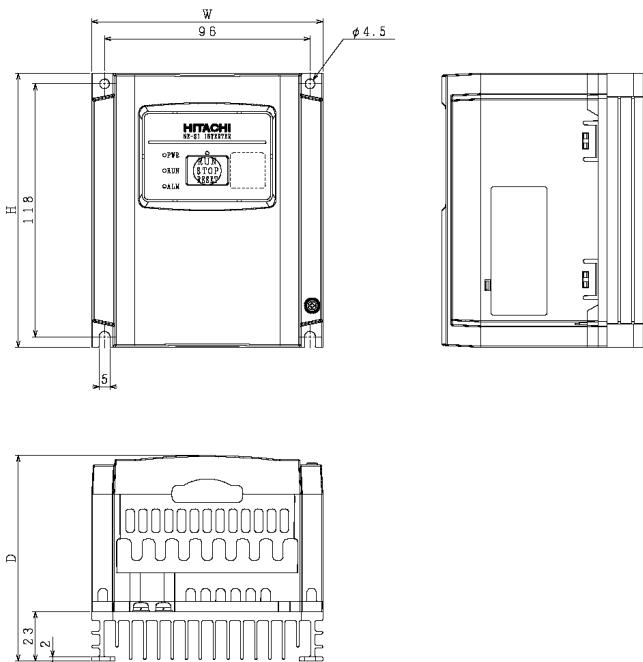
Note6) Derating curve is shown on QRG (Refer to section 12.3 of QRG).

6.2 Dimensions



Model	W (mm)	H (mm)	D (mm)	D1 (mm)
NES1-002SB	68	128	76	7
NES1-004SB			91	21.5
NES1-002LB			76	7
NES1-004LB			91	21.5
NES1-007LB			115	46

Model	W (mm)	H (mm)	D (mm)
NES1-015SB	108	128	107
NES1-022SB			125
NES1-015LB			107
NES1-022LB			125



Model	W (mm)	H (mm)	D (mm)
NES1-007SB	108	128	96

SUITABILITY FOR USE

Hitachi Industrial Equipment Systems shall not be responsible for conformity with any standard, codes, or regulations that apply to the combination of products in the customer's application or use of the products.

Take all necessary steps to determine the suitability of the product for the Systems, machines, and equipment with which it will be used. Please know and observe all prohibitions of use applicable to the products.

NEVER USE THE PRODUCTS FOR AN APPLICATION INVOLVING SERIOUS RISK TO LIFE OR PROPERTY WITHOUT ENSURING THAT THE SYSTEM AS A WHOLE HAS BEEN DESIGNED TO ADDRESS THE RISKS, AND THAT THE HITACHI INDUSTRIAL EQUIPMENT SYSTEMS PRODUCTS ARE PROPERLY RATED AND INSTALLED FOR THE INTENDED USE WITHIN THE OVERALL EQUIPMENT OR SYSTEM.

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