



EI 8001

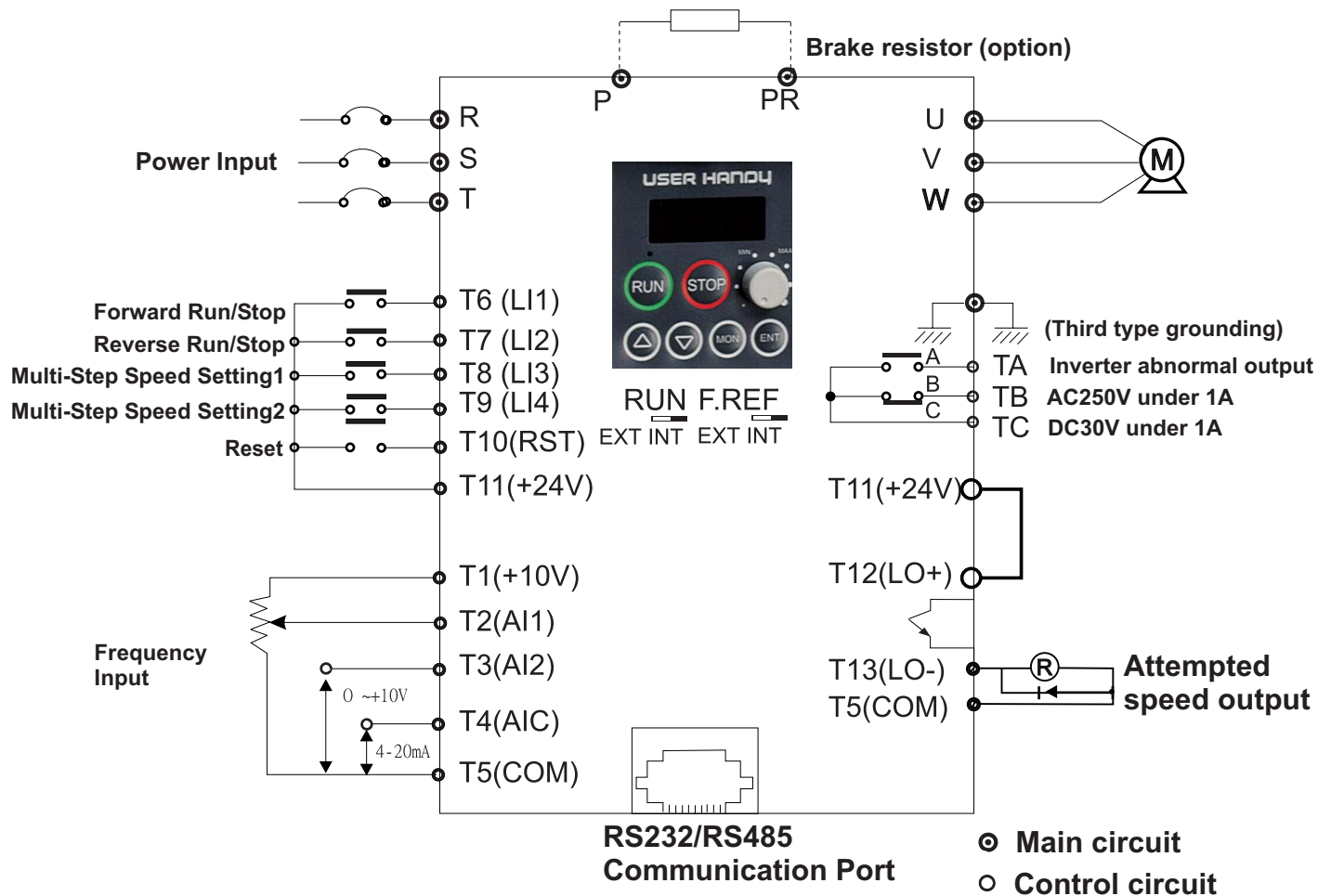
ERIC 8001 – Specifications

Item			Content						
Input voltage class			Three phase 220V Input / Three phase 440V Input / Single phase 220V Input						
Max. applicable motor output (kW)			0.75	1.5	2.2	3.7	5.5	7.5	11
Model	Type		EI-8001 series						
	3ϕ 220V Input		01L	02L	03L	05L	07L	10L	--
	3ϕ 440V Input		01H	02H	03H	05H	07H	10H	15H
	1ϕ 220V Input		S1L	S2L	S3L	--	--	--	--
Output Characteristics	Capacity (HP)		1	2	3	5	7 1/2	10	15
	Rated output current (A)	3ϕ220V Input	3.6	6.8	9.6	16.4	22	28	--
		3ϕ440V Input	2.1	3.7	5.3	9.2	11.8	16	22
		1ϕ200V Input	3.6	6.8	9.6	--	--	--	--
Power Supply	Rated input voltage and frequency		Three phase 200~230V-50/60Hz / Three phase 380~460V-50/60Hz / Single phase 200~230V-50/60Hz						
	Allowable fluctuation		Voltage ± 10% / Frequency ± 5%						
Control Characteristics	Control method		Sine Wave PWM						
	Rated output voltage		Output voltage is settable between 0% and 120% with the output voltage adjustment function. Provided the rated voltage is 100%, output over the input voltage is disabled.						
	Rated output frequency		0.5 to 320 Hz. Set to 0.5 to 60Hz by default. Maximum frequency is adjustable between 30 and 320Hz.						
	Frequency setting resolution		0.1Hz Analogue input = max 100Hz and 0.1Hz.						
	Frequency accuracy		Analogue setting ±0.5% the maximum output frequency or less (at 25 °C ±10 °C)						
	Voltage Frequency Characteristics		Factory preset at opened loop vector control suitable for most constant torque application. Adjustable for special applications.						
Major Control Function	Frequency feedback gain		Factory preset, adjustable for high resistance torque, high inertia or low cycle operation machines.						
	Slip compensation		Automatic. The function can be prohibited or adjusted for frequency compensation.						
	Maximum transient current		150% -60 sec.						
	Braking torque		30% of the nominal motor torque without brake resistor (typical value) up to 150% with brake resistor as an option.						
	Overload current rating		150%-60 sec.						
	Frequency setting signal		Built-in potentiometer on the front panel, external potentiometer on main terminal (1K to 10KΩ variable resistor connectable). 0 to 10VDC (Input impedance: V1A=30.55KΩ V1B=30KΩ), 4 to 20mA (input impedance: 400), and optional Characteristics (gain, bias) can be preset by 2-point setting.						
	PI control		Adjustable proportional gain.						

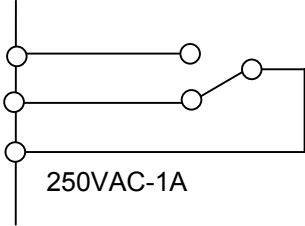
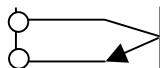
ERIC 8001 – Specifications

Operation Specification	Jog run	One step at $\pm 1\text{Hz}$.
	PWM carrier frequency	Adjustable between 2.2 and 12kHz (Default: 4kHz).
	Acceleration and deceleration time	Independent and adjustable, ramp time from 0.1 to 3600 seconds (0.1S interval) adjusting ramp time automatically when over torque. Be able to eliminate ramp time auto-adjustment during decelerating.
	Recalculation	Can be restarted after the main components checked during the protective function enable.
	Braking to stop	DC injection type: <ul style="list-style-type: none"> • Input DC current from a logic input terminal. • Input DC current automatically between 0 to 25 seconds. Or input continuously • Automatically input during the speed down to 0.5Hz.
	Input terminal function (selection)	Forward & reverse input signals, preset speed select input signal, reset input signals, etc.
	Output terminal function (selection)	Low-speed detection output signal, speed-reached output signal, etc.
	Fault signal	IC contact output (250VAC-2A, 30VDC-2A resistive load, 30VDC-1.5A inductive load).
Protective function	Inverter protection and safety	<ul style="list-style-type: none"> • Electrical isolation between power and control circuits (inputs, outputs, supplies) • Short circuit protection: <ul style="list-style-type: none"> • A. Internal supplies available. • B. Between output phases. • Thermal protection from excessive over heating and over currents. • Under and over voltage supply. • Over voltage during braking.
	Motor protection	• Protection integrated in the inverter by calculating ('I x t')
Environment	Service environment	Indoor, Altitude must less than 1000 meters. Must not be exposed to direct sunlight, corrosive or explosive gas or vapor. Vibration: 5.m/s (0.6G) or less (at 10 to 50Hz).
	Ambient temperature & relative humidity	• 10-40 °C (50 °C without upper seal) (93% no condensation).
Protective method		IP20
Cooling		Forced air-cooling.

ERIC 8001 - Connection Diagram

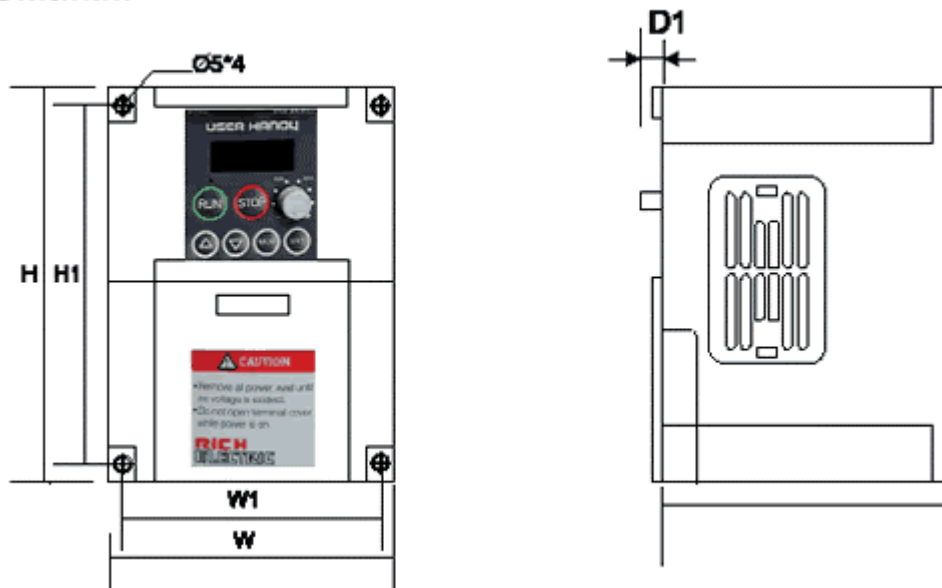


ERIC 8001 - Control terminal function list (factory presets)

Terminal Block Number	Terminal Block Name	Function	Electric rating
TA	FLA	Inverter abnormal output. Connected with FLC when abnormal.	 250VAC-1A
TB	FLB	Inverter abnormal output. Connected with FLC when normal.	
TC	FLC	Inverter abnormal output. A common point of FLA and FLB.	
T1	+10V	Internal power supply for outside Potentiometer use (1-1KΩ).	10V/10mA Maximum protected.
T2	AI1	Voltage frequency command.	Analogue input 0 -+10V, 30KΩ
T3	AI2	Voltage frequency ref	Analogue input 0 -+10V, 30KΩ Analogue input 0-20mA (factory preset) or 4-20mA (400Ω). AI2, AIC are programmable but cannot be used simultaneously.
T4	AIC	Current frequency ref	
T5	COM	Common point of digital input, Analogue input and digital output.	
T6	L11	Run forward command (un-programmable)	Digital signal input, 3.5KΩ. Input voltage+24V (30V max). When <5V, Logic "0". When >11V, Logic "1". LI2, LI3 and LI4 are programmable.
T7	L12	Run forward command (programmable)	
T8	L13	Run multi-speed command (programmable)	
T9	L14	Run multi-speed command (programmable)	
T10	RST	Error reset (un-programmable)	Digital input, 3.5KΩ. Input voltage+24V (reset).
T11	+24V	Power supply for external digital input use.	+24V/100mA max with protection.
T12	LO+	Phototransistor contact point.	 Open collector output 24V max 50mA
T13	LO-	Transistor on when operated frequency reaches the preset point.	

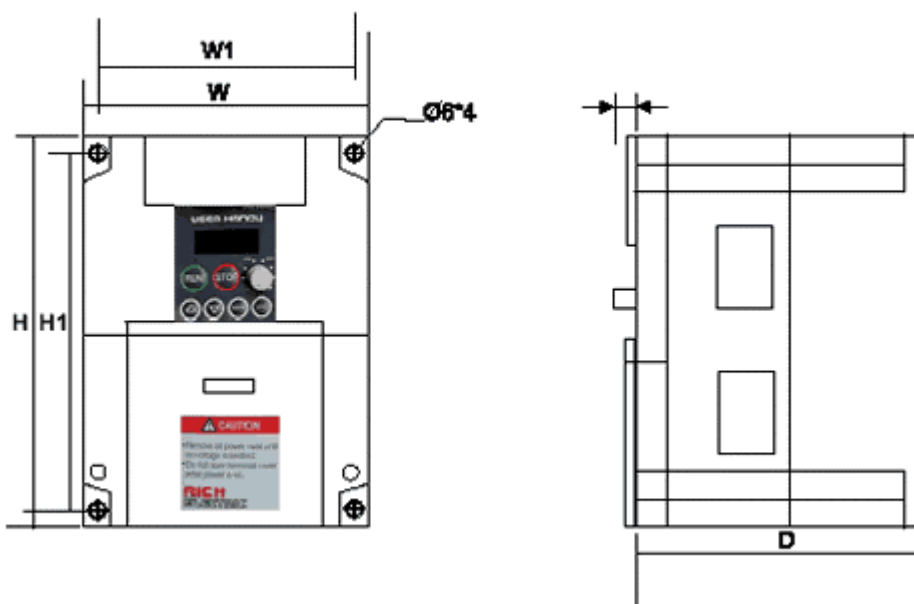
ERIC 8001 - External dimensions

Unit:mm



Specification	Voltage	Phase	HP	W	W1	H	H1	D	D1
S1L,S2L	220V	Single-phase	1HP,2HP	114	102	150	137	116	8
01H,02H	440V								
03L,07L	220V	Single-phase	3HP-7HP	191	176	200	186	178	8
03H,07H	440V	Three-phase							
S3L	440V	Single-phase							
	220V								

Unit:mm



10L	220V	Three-phase	10HP	228	204	298	286	206	8
10H-15H	440V		10HP-15HP						