

AXIAL FAN - EC Motor

LWAE3G630TS-5PKW-21-00

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Model No.:	LWAE3G630TS-5PKW-21-00
Version Number:	A0
Make :	Ye
Review :	Jiang
Approvd :	Yao
Date:	20260609

技术专用
朗伟电器

Version number	Notes Remarks	Reason content	Revised by	Date

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Nominal Data

Project1	Unit	Rating
Nominal Voltage :	[VAC]	400
Voltage Range :	[VAC]	380~480
Frequency :	[Hz]	50/60
Speed :	[rpm]	1760
Current :	[A]	3.95
Power input :	[W]	2572
Air flow (Max) :	[m3/h]	21169
	[CFM]	12453
Static pressure (Max) :	[Pa]	279
Noise level :	dB(A)	/
Max.ambient Temp :	℃	65
Min.ambient Temp :	℃	-25
Insulation Class :		Class F
Protection Type :		IP54
Work system :		S1

Technical Features

Production Reference standard	GB12350 《Safety requirements of small power motors》 JB/T10562 《 Technical specification for general purposes axial fans》 EN60335-1 《Household and similar electrical appliances-safety》 ISO5801-1997 《Industrial fans-performance testing using standardized airways》 GB/T2888 《Methods of Noise Measurement for Fans Blowers Compressors and Roots Blowers》
Certification	CE
Environmental protection	RoHS、 Reach

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Technical Features

Service environment	Operating temperature: -25~65℃; Operating humidity: 5 ~ 95 % RH Storing temperature: -35 ~ 75℃; Storing humidity: 5 ~ 95 % RH Applicable altitude range: < 1000m
Life Expectance	30,000Hours(L10), At 40℃ room, humidity 15%~65%RH.
Balancing	According to JB/T 9101-1999 requirements G6.3
Vibration of the fan	Test method accord with JB/T 8689
Installation method	Horizontal or vertical installation
Material	Plastic(Impeller)
Bearing	Maintenance-free deep groove ball bearings
Weight	/

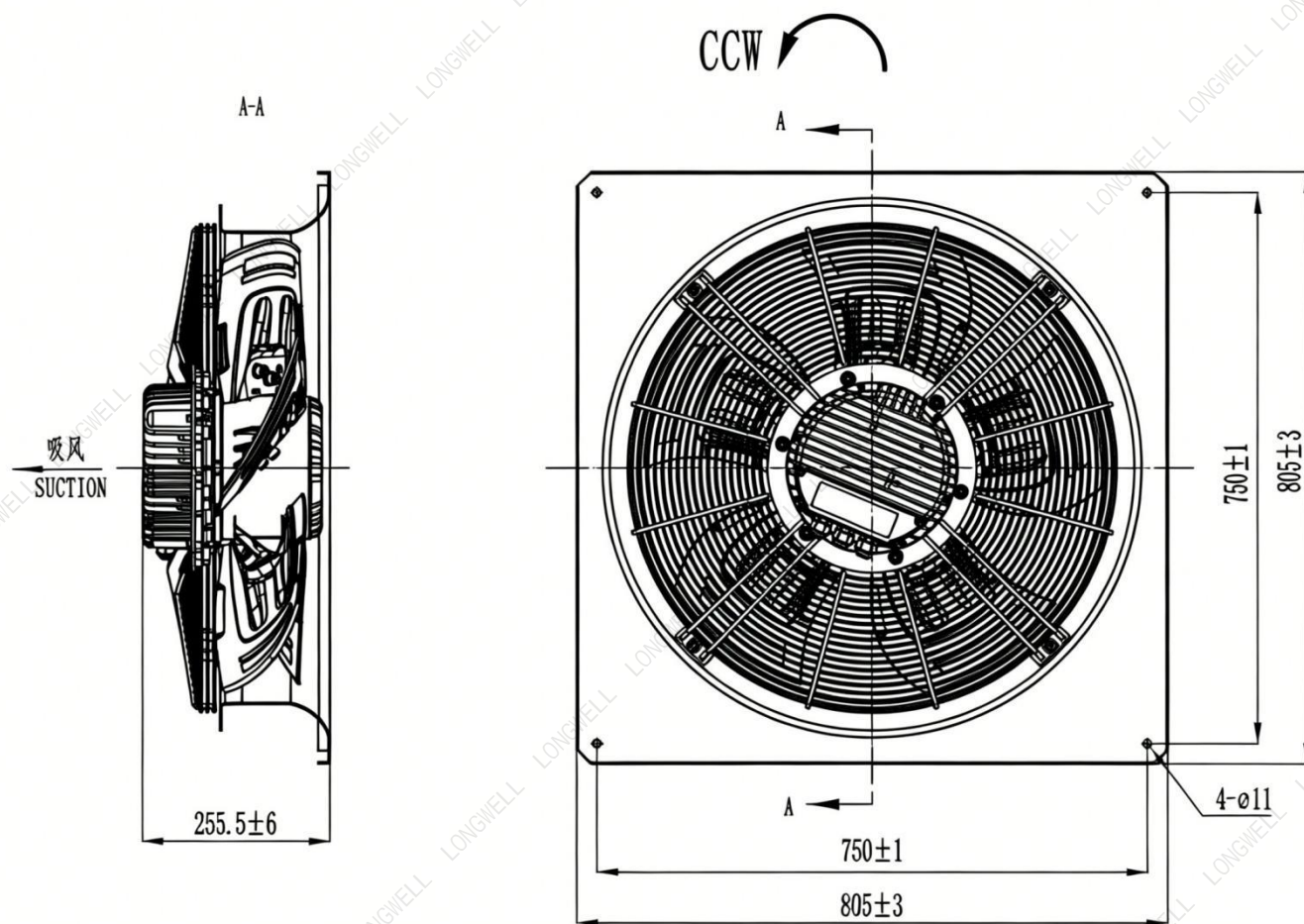
Electrical Protection

Speed Control	Control input 0~10VDC/PWM/RS485/4-20mA
VSP Control	Control signal VSP voltage range $0 \pm 0.2\text{VDC} \sim 10 \pm 0.2\text{VDC}$ (During normal operation, when the VSP voltage is below $1.0 \pm 0.1\text{VDC}$, the motor switches from operating mode to standby mode)
PWM Control	PWM signal: frequency 0.1K ~ 1KHz, amplitude 10 ~ 12V, duty cycle 0% ~ 100% .
Signal Output	Tach output: 12 Pulse/R; FG internal open circuit output, external pull-up resistor R, pull-up voltage V.
Auxiliary power output	Output 10VDC, Max Current 20 mA
Protection	Over-temperature protection、Over-current protection、Locked-rotor protection'
Soft start	Delay time <30 seconds to full speed
Serial Communication	LWRS485-05

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Product Drawing



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Wiring Diagram

P3												P2			P1			PE
RSA	RSB	RSA	RSB	GND	Ainl U	4~20mA	20V	10V	Din I	GND	FG	NC	COM	NO	L3	L2	L1	PE

NO.	Signal 信号	Assignment/Function 分配/功能	NO.	Signal 信号	Assignment/Function 分配/功能
PE	PE	Protect earthing,ground 接地线, PE 线	P3	RSA	Bus RS485; RSA;MODBUS RTURSA485 总线连接;RSA;MODBUS 通讯协议 RTU 方式
P1	L3	AC power in, voltage input 3~380-480V;50/60Hz 交流电输入, 供给电压 3~380-480V;50/60Hz		RSB	Bus RS485;RSB;MODBUS RTURSA485 总线连接;RSB;MODBUS 通讯协议 RTU 方式
	L2	AC power in,voltage input 3~380-480V;50/60Hz 交流电输入, 供给电压 3~380-480V;50/60Hz		GND	interface P3 for signal control,ground 接口 P3 控制信号地线
	L1	AC power in,voltage input 3~380-480V;50/60Hz 交流电输入, 供给电压 3~380-480V;50/60Hz		Ainl U	Controler input0~10VDC/PWM 控制输入 0~10VDC/PWM
P2	NO	State relay,alterable state contact;normally turn-on;turn-off when error 状态继电器, 浮动状态触点;常开;关闭错误		4~20mA	Analogue Control input 4~20mA/ 控制输入 4~20mA
	COM	State relay,universal connectivity;contact rating 250VAC/2A 状态继电器, 公共连接;连接等级 250VAC/2A		20V	Rated voltage output 20VDC (I10% max. 50mA)固定电压输出 20VDC(± 10% max.50mA)
	NC	State relay,normally turn-off;turn-on when error;状态继电器, 常闭;接触错误		10V	Rated voltage output 10VDC (± 10% max. 10mA)固定电压输出 10VDC(± 10% max.10mA)
				FG	Speed Signal Feedack/速度反馈信号
				Dinl	Connection of Digital input 1 enabling of electronics enabling;/数字式输入端 1 电子设备的接通; opening pin or applied voltage 5-50V DC;接通:管脚为开路或者所施加的电压为 5 到 50VDC; disabling: bridge to GND or applied voltage<1V DC 截止:接地桥接或者所施加的电压<1VDC.

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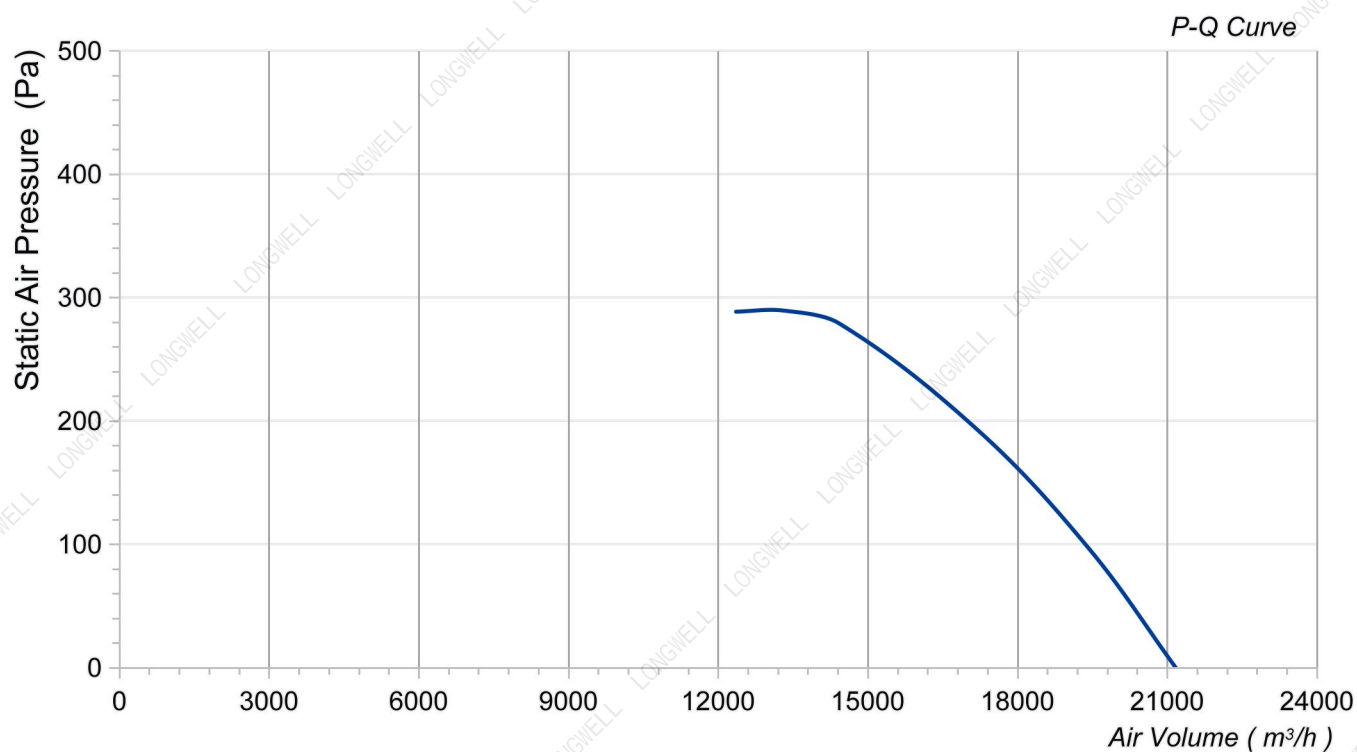
Label

Confirm by sales team when placing sample order or bulk order

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Charts :Air Flow (P-Q)



Current (A)	Speed (RPM)	Power input (W)	Airflow (m³ /h)	Static pressure (Pa)
3.95	1760	2572	21169	0
4.14	1760	2684	19445	93
4.35	1760	2803	17228	186
4.46	1760	2894	14418	271

AXIAL FAN - EC Motor**LWAE3G630TS-5PKW-21-00****Warning:**

1. The fan and motor must be used within the prescribed scope of temperature and humidity otherwise it will cause an unexpected damage.
2. Fan is not set wrong connection protection, Provide the right voltage and line sequence according to the nameplate otherwise it will damage the product.
3. Wiring depends on the wiring diagram and please connect the earth ground if required. We don't suggest to use the extension cord .Any wrong connection may cause the damage of the fan.
4. Be careful when moving the fan and do not take the blades as a handle because it will cause the distortion and chatter.
5. Connect the thermostat if required otherwise it would damage the motor because of the over temperature.
6. The length of the mounting screws shall not exceed the requirement, otherwise the fan will be damaged.
7. Do not disassemble the fan arbitrarily. It may hurt the capacity of water tightness and dynamic balance or cause other serious problems.
8. The over current protector is necessary in case the damage from the over current.
9. Install the fan as required, any other installing direction would affect the service life of the product.
10. The fan with inlet ring should be installed follow the requirements or it will affect the performance.
11. Users should use the standard cable when install the fan otherwise it will affect the water tightness.
12. The fan should keep away from the children especially the blade and electric parts .And the children are not allowed to operate the fan alone.
13. Do not connect the white signal cable directly to the red signal cable or the external DC power supply. Otherwise, the fan may be damaged.
14. Please do not perform extraction and insertion of the connector under revolution irrespective of power on and power on and power off , and the fan should not touch or move when running.
15. Do not lift the fan wire when taking the fan, and do not impact the bearing during the handling process.
16. The version change may not be notified, please ask our company for the latest version when necessary.
17. Please be informed that we are not responsible for any damage or accidents caused by violating above rules to install and operate the fan.

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Approval

CUSTOMER APPROVAL**CUSTOMER SIGNATURE:****DATE :****Product Data Confirm :****Speed Control System :**☐

PWM

☐

0-10V

Note :Please check and mark the data when you sign the specification sheet .