EVERFLOW
MOTOR YOUR LIFE

SPECIFICATION FOR APPROVAL

1. SCOPE:

THIS SPECIFICATION DEFINES THE ELECTRICAL AND MECHANICAL CHARACTERISTICS OF THE DC BRUSHLESS AXIAL FLOW AND BLOWER FAN.

2. CHARACTERS:

NO	ITEM	SPECIFICATION
2-1	Rated Voltage	12.0 VDC
2-2	Starting Voltage	N/A
2-3	Operating Voltage Range	11.4V~12.6V
2-4	Rated Current	Max.0.50A Duty cycle =100%
2-5	Rated Power	Max.6.00W Duty cycle =100%
2-6	Start Peak Current	N/A
2-7	UL Current On Label	0.50 A
2-8	Rated Speed	500±300 R.P.M Duty cycle =0% 2800±300R.P.M Duty cycle =100 % (Testing Speed After Continuous 3Minutes Operation At Ambient Temperature Of 25℃)
2-9	Air Flow (At Zero Static Pressure)	13.09 CFM (Min. 11.69 CFM) 0.37 m³/min (Min. 0.33 m³/min） (REF) Duty cycle =100%
2-10	Static Pressure (At Zero Flow)	15.76 mmH2O (Min. 12.56 mmH2O) 0.62 Inh-H2O (Min.0.49 Inh-H2O)(REF) Duty cycle =100%
2-11	Sound Level	36.5 dB(A) [Max. 39.0 dB(A)]
2-12	Product Type	■ RoHS □ HF
2-13	Life Expectancy	40,000 Hours at 25℃.
2-14	Bearing Type	□ Two Ball ■ EBR □ Ball And Sleeve
2-15	Protection	□ Impedance Protection ■Auto-Restart □Current-Limit ■Polarity Protection ■Locked Protection
2-16	Pole	■ 4 Pole □ 8 Pole □ Three Phase
2-17	Signal Output	Frequency Generator (FG)
2-18	Safety Approval	CE / TUV / UL / UKCA
2-19	IP Grade	N/A

EVERFLOW
MOTOR YOUR LIFE

SPECIFICATION FOR APPROVAL

3. MECHANICAL:

NO	ITEM	SPECIFICATION
3-1	DIMENSIONS	SEE DIMENSIONS DRAWING
3-2	COVER	SECC
3-3	IMPELLER	■ LCP (BLACK) PLASTIC (UL 94V-0) □ PC PLASTIC {UL 94V-2}
3-4	WEIGHT	61 GRAMS (REF)

4. ENVIRONMENTAL:

4-1. OPERATING TEMPERATURE ------- -10℃~70℃

4-2. STORAGE TEMPERATURE---------- -20℃~75℃

4-3. OPERATING HUMIDITY---------- 5 TO 90% RH

4-4. STORAGE HUMIDITY ---------- 5 TO 95% RH

4-5. DIRECTION OF ROTATION---------- □CLOCKWISE
■COUNTER-CLOCKWISE
(VIEWED FROM LABEL SIDE)

4-6. DIELECTRIC STRENGTH ---------- 5mA MAX. AT 500 Vac 60Hz ONE MINUTE (BETWEEN FRAME AND (+)TERMINAL)

4-7. INSULATION STRENGTH---------- MORE THAN 10 M OHM INTERNAL STATOR AND LEAD WIRE(+) MEASURED AT DC 500V

4-8. DROP TEST---------- IN MINIMUM PACKAGING CONDITION, FAN WITHSTANDS ONE DROP FROM EACH OF ITS THREE FACES AT THE HEIGHT OF 60cm ON TO A SOLEPLATE WITH A THICKNESS OF 2cm.

4-9. LIFE EXPECTANCY---------- THE "LIFE EXPECTANCY" OF EVERFLOW FANS IS DETER MINED IN EVERFLOW's RELIABILITY TEST LABORATORY BY USING TEMPERATURE CHAMBERS. THE "LIFE EXPEC TANCY" OF THIS FAN HAS NOT BEEN EVALUATED FOR USE IN COMBINATION WITH ANY END APPLICATION . THEREFORE .THE LIFE EXPECTANCY THAT RELATE TO THIS FAN ARE ONLY FOR REFERENCE.

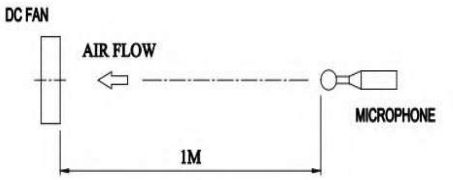
4-10. VIBRATION TEST---------- ORIENTATION: X , Y, Z .

FREQUENCY(Hz)	PSD (g2/Hz)
5	0.02
500	0.0001

TEST TIME: 2 HRS FOR EACH DIRECTION.

4-11. SHOCK TEST---------- TEMPERATURE : +25°C.
ORIENTATION : X,
POWER : NON-OPERATING.
ACCELERATION : 50g MAX.
PULSE: 11ms HALF-SINE WAVE.
NUMBER OF SHOCKS:
5 SHOCKS FOR EACH DIRECTION.

4-12. NOISE TEST ---------- MEASURED IN A SEMI-ANECHOIC CHAMBER WITH BACKGROUND NOISE LEVEL BELOW 19 dB(A). THE FAN IS RUNNING IN FREE AIR WITH THE MICROPHONE AT A DISTANCE OF ONE METER FRAM THE FAN INTAKE NOISE TESTER MODEL: CEL-63X/CASELLA.



4-13. AIR PERFORMANCE ---------- MEASURED BY A DOUBLE CHAMBER.THE VALUES ARE RECORDED WHEN THE FAN SPEED HAS STABILIZED AT RATED VOLTAGE.

5. NOTES:

5-1. EVERFLOW WILL NOT GUARANTEE THE PERFORMANCE OF THE PRODUCTS IF THE APPLICATION CONDITION FALLS OUTSIDE THE PARAMETERS SET FOR THE SPECIFICATION . A WRITTEN REQUEST SHOULD BE SUBMITTED TO EVERFLOW PRIOR TO APPEROVAL IF DEVIATON FROM THIS SPECIFICATION IS REQUIRED.

5-2.THE ABOVE STANDARD SHOULD BE THE SPECIFIED VALUE AT NORMAL TEMPERATURE (25°C) AND NORMAL HUMIDITY (60~65%) UNLESS OTHERWISE NOTED.

5-3. SPECIFICATION CHANGE:
ANY CHANGES TO THE PARAMETERS SPECIFIED IN THIS DOCUMENT WILL BE DETERMINED BY MUTUAL AGREEMENT ON BOTH PARTIES.

5-4. IT IS VERY IMPORTANT TO ESTABLISH THE CORRECT POLARITY, POSTIVE (+) AND NEGATIVE (-), BEFORE CONNNECTING THE FAN TO THE POWER SOURCE. DAMAGE MAY BE CAUSED TO THE FANS IF CONNECTION IS WITH REVERSE POLARITY. THERE IS NO FOOLPROOF METHOD TO PROTECT AGAINST SUCH ERROR SPECIFICALLY MENTIONED IN THIS SPEC.

5-5. PLEASE BE CAUTIOUS WHEN MOUNTING THE FAN. INCORRECT MOUNTING OF FANS MAY CAUSE EXCESS RESONANCE, VIBRATION, SUBSEQUENT NOISE, AND EVEN BROKEN SCREW HOLES.

5-6. PLEASE EXERCISE CAUTION WHEN HANDLING FANS. DAMAGE MAY BE CAUSED IF PRESSURE IS APPLIED TO THE INPELLER, IF THE FANS ARE HANDLED BY THE LEAD WIRES, OR IF THE FAN WAS HARD-DROPPED TO THE PRODUCTION FLOOR.

5-7. EVERFLOW FANS WITHOUT SPECIAL PROTECTION ARE NOT SUITABLE WHERE ANY CORROSIVE FLUIDS ARE INTRODUCED TO THEIR ENVIRONMENT.

5-8. PLEASE ENSURE ALL FANS ARE STORED ACCORDING TO THE SPECIFIED STORAGE TEMPERATURE LIMITS. DO NOT STORE FANS IN A HIGH HUMIDITY ENVIRONMENT. WE HIGHLY RECOMMEND CONDUCTING PERFORMANCE TESTING BEFORE SHIPPING IF THE FANS HAVE BEEN STORED OVER 6 MONTHS.

5-9. NOT ALL FANS ARE PROVIDED WITH THE LOCK ROTOR PROTECTION FEATURE. IF YOU IMPAIR THE ROTATION OF THE IMPELLER FOR THE FANS THAT DO NOT HAVE THIS FUNCTION, THE PERFORMANCE OF THOSE FANS WILL LEAD TO FAILURE.

5-10. IT IS IMPORTANT TO CONSIDER SAFETY WHEN TESTING THE FANS. A SUITABLE FAN GUARD SHOULD BE FITTED TO THE FAN TO GUARD AGAINST ANY POTENTIAL FOR PERSONAL INJURY.

5-11. ALL THE FANS SHALL MEET THE QUALITY INSPECTION UNDER SAMPLING PLAN MIL-STD-105E AS FOLLOWS WITH EXCEPTIONS PERTAINING TO CERTAIN SPECIAL DESIGNS. THERE IS NO GUARANTEE THAT THE PRODUCTS WILL BE FREE FROM SAFETY PROBLEMS OR FAILURES CAUSED BY DISRUPTION DUE TO DUST, SUBMERSION INTO WATER OR ENCROACHMENT BY INSECTS INTO THE HUB.

CRITICAL	0.25%
MAJOR	1.00%
MINOR	2.50%

5-12. CUSTOMER SHALL CONFIRM THE COMPATIBILITY AND RELIABILITY OF THE FAN IN THE ACTUAL SETUP OR UNIT APPLICATION. THIS INCLUDES CONFIRMATION ON SET OR UNIT LIFE, ELECTRICAL NOISE, MECHANICAL NOISE, VIBRATION, STATIC ELECTRICITY, ELECTRIC POWER NOISE, DRIFT, ELECTRIC RESONANCE BETWEEN MOTOR AND CONTROL CIRCUIT, MECHANICAL RESONANCE BETWEEN MOTOR AND CHASSIS, IRREGULAR MOVEMENT OF SET DUE TO MOTOR NOISE, IRREGULAR MOVEMENT OF SET IN STRONG ELECTROMAGNETIC FIELD, POTENTIAL DAMAGE CAUSED BY LIGHTNING SURGE AND EARTHING METHOD ETC.

5-13. ANY REVISIONS ON THE SPECIFICATION SHALL BE DONE BASED ON MUTUAL DISCUSSION AND AGREEMENT.

5-14. IN ORDER TO IMPROVE THE PERFORMANCE WITHIN THE SCOPE OF SPECIFICATION, PARTS OR MATERIAL CHANGES ARE SUBJECT TO PRIOR NOTICE TO CUSTOMER.

5-15. ANY ITEM THAT NEEDS TO BE ADDED INTO SPECIFICATION SHALL BE DETERMINED ON CUSTOMER'S PRIOR WRITTEN REQUEST. IF NO INFORMATION GIVEN, FAN WILL BE DELIVERED BASED ON OUR STANDARD JUDGMENT.

5-16.WHEN ANY TROUBLE OCCURS, BOTH PARTIES SHALL DISCUSS ON THIS SPECIFICATION TO SOLVE THE MATTER. IN THIS CASE, OUR GUARANTEE IS ONLY LIMITED TO FANS.

5-17. BE SURE TO CONNECT AN "4.7μF OR GREATER" CAPACITOR TO THE FAN EXTERNALLY WHEN THE APPLICATION CALLS FOR USING MULTIPLE FANS IN PARALLEL. THIS IS TO AVOID ANY UNSTABLE POWER.

5-18. PLEASE EXERCISE CAUTION WHEN HANDLING FANS.DAMAGE MAY BE CAUSED BY OUTSIDE ABNORMAL PRESSURE OR ENVIRONMENT STRESS DURING MOVING.

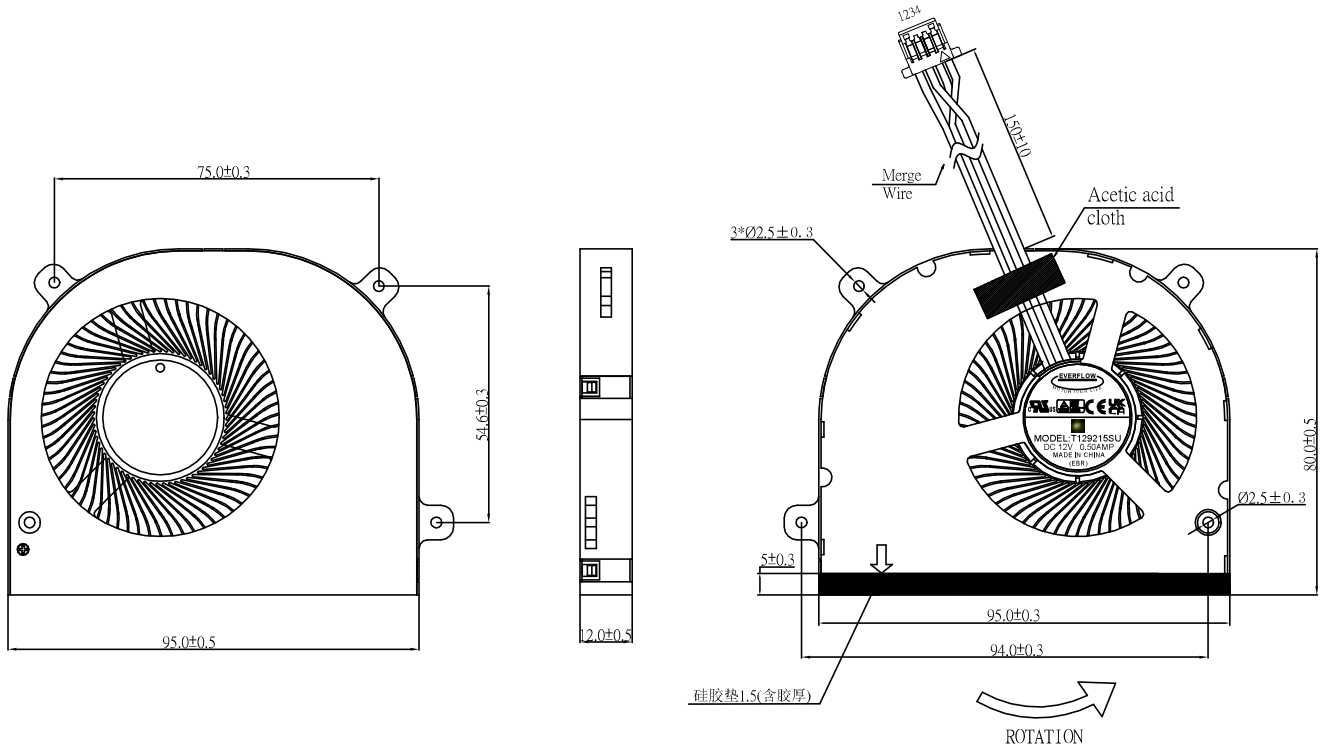
5-19. LOCKED ROTOR PROTECTION:
IMPEDANCE OF MOTOR WINDING PROTECTS MOTOR FROM DAMAGE IN 72 HOURS OF LOCKED ROTOR CONDITION AT THE RATED VOLTAGE.

5-20. POLARITY PROTECTION:
BE CAPABLE OF WITHSTANDING IF REVERSE CONNECTION FOR POSITIVE AND NEGATIVE LEADS.

5-21. HOT SWAP PROTECTION:
THIS FAN HAS HOT SWAP FUNCTION (WHEN DOING HOT-SWAP. THE FAN'S INTERNAL COMPONENTS CAN BE PROTECTED BY THE HOT-SWAP PROTECTION CIRCUIT AND WON'T BE BURNT).

6. DIMENSION DRAWING. UNIT: mm

EF Part no	T129215SUAF0F4AR

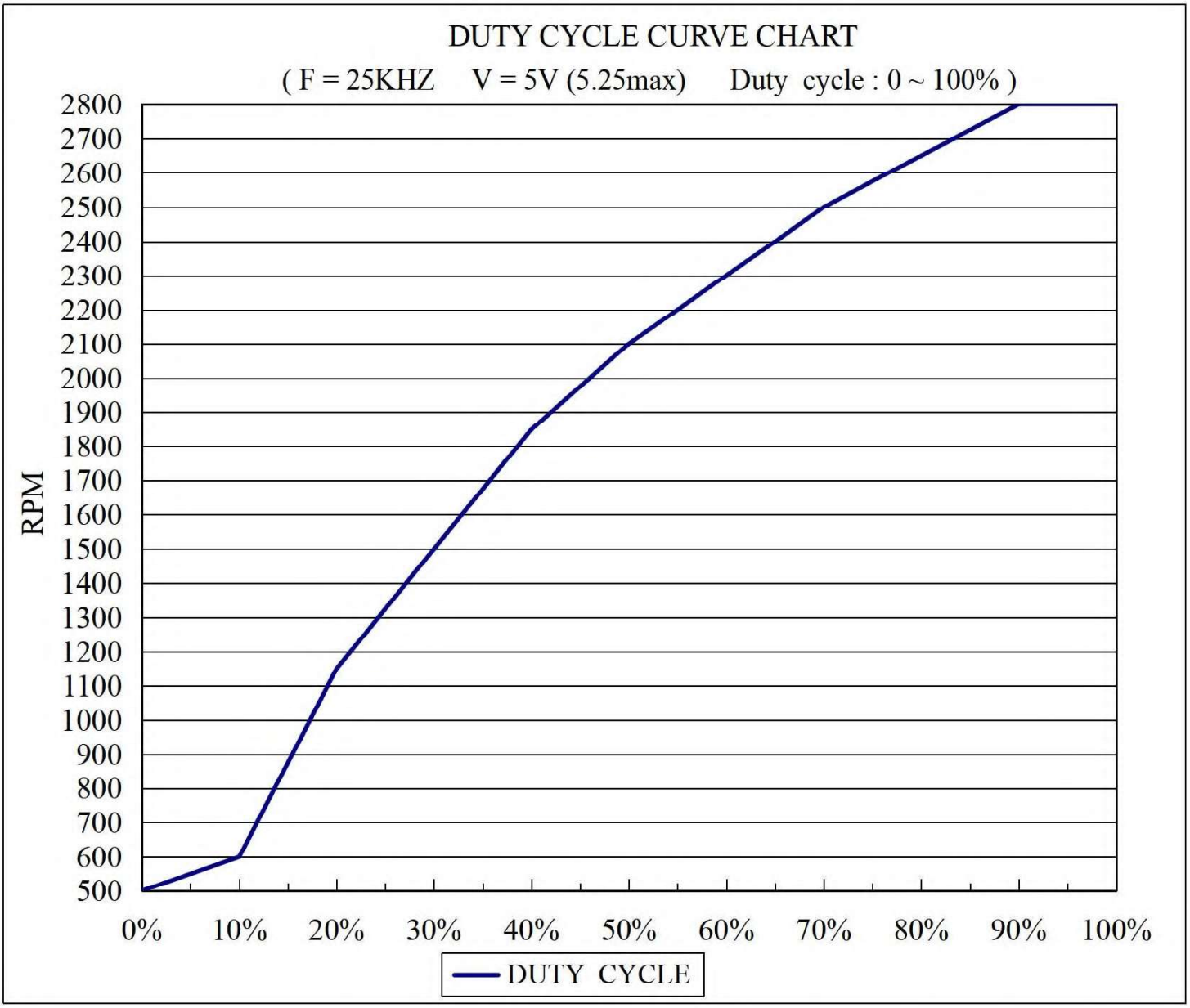


NOTES:

1. LEAD WIRE UL 1061 AWG#28
   - PIN 1: BLACK WIRE--- (-)
   - PIN 2: BLUE WIRE---(PWM INPUT)
   - PIN 3: GREEN WIRE---(SIGNAL)
   - PIN 4: YELLOW WIRE---(+)
2. HOUSING: JST-SHR-4P (WHITE) OR EQUIVAIENT

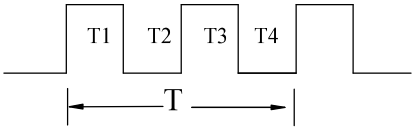
7. DUTY CYCLE CURVE CHART

DUTY CYCLE	SPEED (RPM)	RANGE	CURRENT
0%	500	±300	<0.10A
100%	2800	±300	<0.50A



8. CHARACTERISTICS & DEFINITION

- 4 Pole Motor: Fan with 4 pole motor.



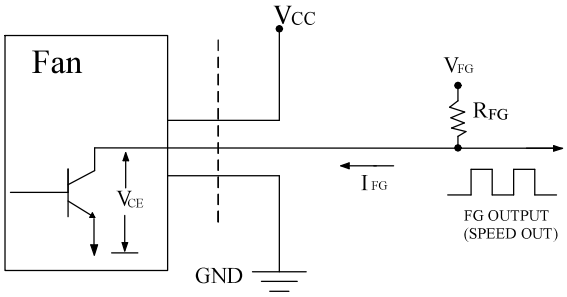
1 Rotation=T

$T=T_1+T_2+T_3+T_4=1$ Rotation

$T_1=T_2=T_3=T_4=\frac{60}{4 \times r.p.m}$ Sec

- FG(Frequency Generator)Signal External Circuit:

Open-collector output for rotation frequency detection

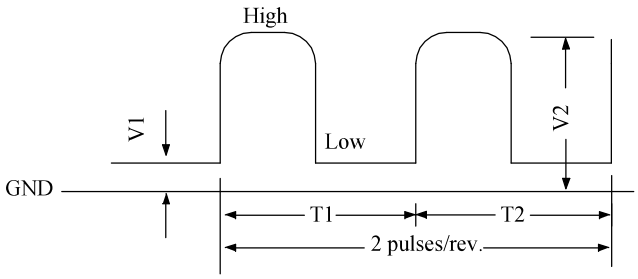


Note:Max.V_{FG}=12.6VDC,Max.I_{FG}=5mA, $\Rightarrow R_{FG} \geq V_{FG} / I_{FG}$

When V_{FG} = 3.3V We Recommend R_{FG} =10KΩ

- FG(Frequency Generator)Type Output Waveform:

1.Motor Rotating Condition(at 25℃,V =5VDC)

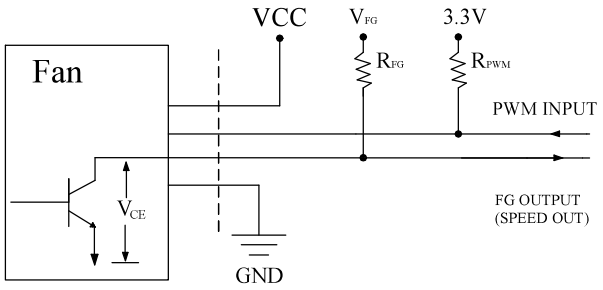


V1:within 0.5V when I_{FG} Less Than 3mA
V2:V_{FG},FG signal output voltage,maximum rating:12.6VDC
Duty=T1/(T1+T2)x100%=(50± 20)% (measured between 0.3*V2~0.7*V2)
V1_V2 rise time:less than 1.0ms
V2_V1 fall time:less than 1.0ms
Rotation Speed (RPM)=(60/2)x f_{FG}=30x f_{FG}
f_{FG}:frequency of FG output waveform(Hz)

2.Motor locked condition(at V_{CC} =12 VDC)
Output is fixed at low or high when motor is locked.

9. CHARACTERISTICS & DEFINITION

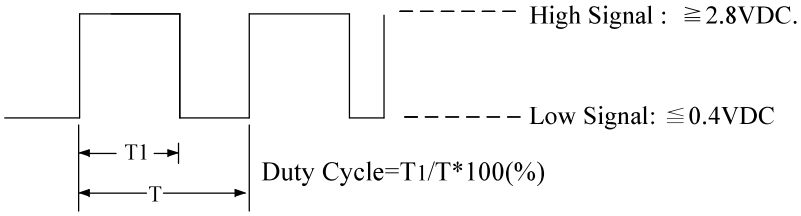
- PWM Circuit:(for reference)



When V_{RPM} = 3.3V We Recommend R_{PWM} =1-10KΩ

- PWM Control Signal Input:

Signal Voltage Range :DC 0V ~5.5V (V = 5V)



1.The 25KHz operating frequency(customer preferred)has been tested and checked.

2.At 100% duty cycle, The fan will operate at maximum speed.

3.The fan will default to operate at maximum speed
when the speed control input(PWM input)is left unconnected.

10.PQ CURVE

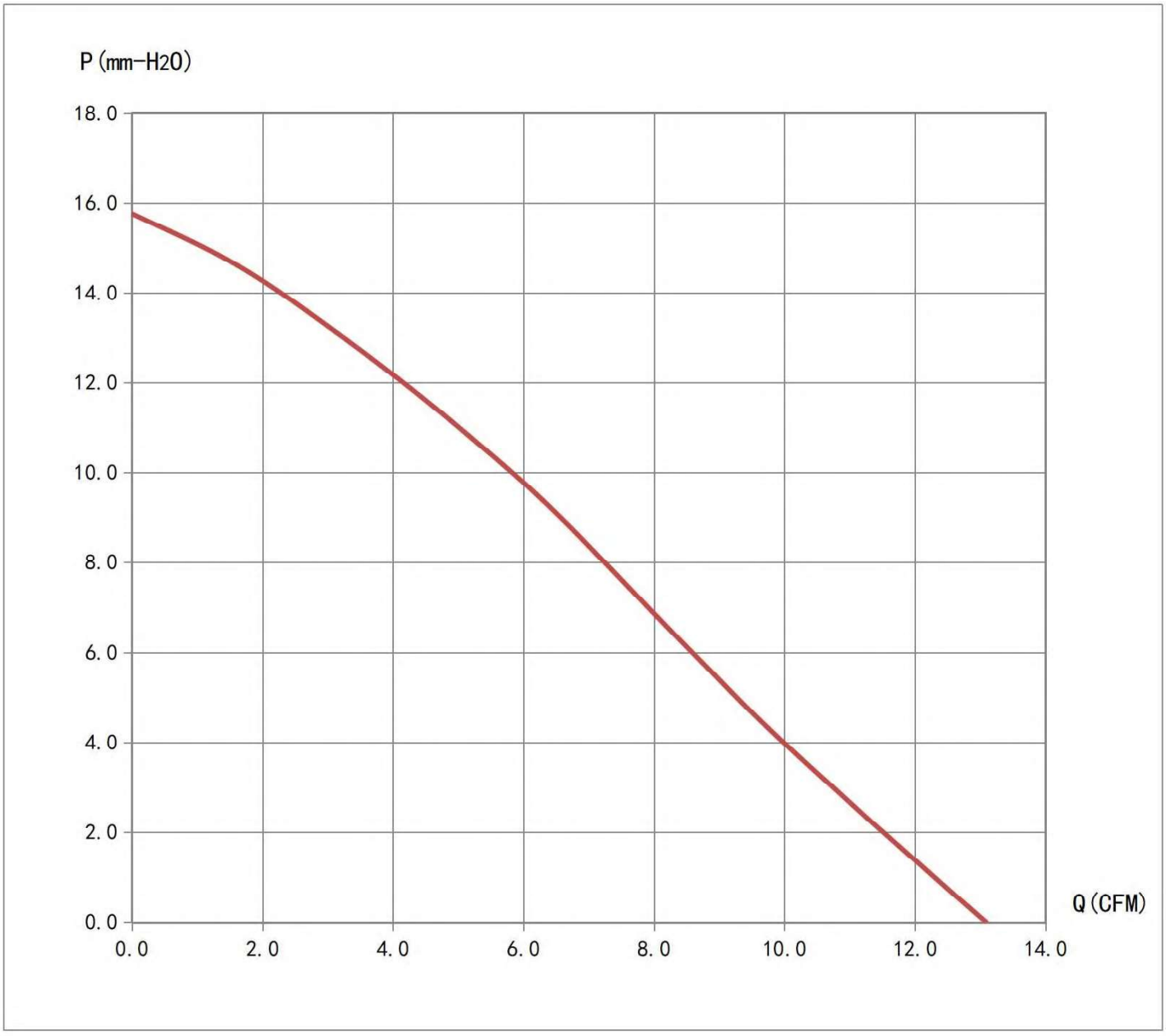
PQ Test Report

TEST CONDITION:

INPUT VOLTAGE ------- OPERATION VOLTAGE (DC 12V)

TEMPERATURE --------- ROOM TEMPERATURE

HUMIDITY ------------ 65 % RH



Zertifikat *Certificate*

Zertifikat Nr. *Certificate No.*
R 50091668

Blatt *Page*
0020

Ihr Zeichen *Client Reference*	**Unser Zeichen** *Our Reference*	**Ausstellungsdatum**	***Date of Issue*** *(day/mo/yr)*
P00989074	ZTW1-YML- 10009602 022	13.04.2023	

Genehmigungsinhaber *License Holder*
Everflow Precision Electronic
(Dong Guan) Co., Ltd.
GeKeng Industrial Zone
Heng Li Town
Dongguan City
523460 Guangdong
P.R. China

Fertigungsstätte *Manufacturing Plant*
Everflow Precision Electronic
(Dong Guan) Co., Ltd.
GeKeng Industrial Zone
Heng Li Town
Dongguan City
523460 Guangdong
P.R. China

Prüfzeichen *Test Mark*

TÜVRheinland ZERTIFIZIERT
Bauart geprüft
Sicherheit
Regelmäßige Produktions-überwachung
www.tuv.com
ID 2000000000

Geprüft nach *Tested acc. to*
EN IEC 62368-1:2020+A11

Zertifiziertes Produkt **(Geräteidentifikation)** **Lizenzentgelte - Einheit**
Certified Product ***(Product Identification)*** ***License Fee - Unit***

Ventilator (DC Fan)

wie Blatt (as page) 01, Änderung (Change)
Bezeichnung (Type Designation):
BX1X2X3X4X5Z, FX1X2X3XX54Z, KX1X2X3X4X5Z, DX1X2X3X4X5Z
XX1X2X3X4X5Z, RX1X2X3X4X5Z, SX1X2X3X4X5Z, TX1X2X3X4X5Z
(EVERFLOW)
X1 steht für (stands for): A,B,C,D,05,12,24,48,54
X2 steht für (stands for): 10,12,30,40,50,60,70,75,80,90,92,
120,140
X3 steht für (stands for): 10,15,18,20,25,28,32,38,40,56,80
X4 steht für (stands for): B, D, S
X5 steht für (stands for): L, M, H, U
Z steht für : 20 Variablen, jede Variable kann A-Z,
(stands for) 0-9, "," oder freibleibend.
(20 variables, each maybe A-Z, 0-9,
"(",")", "-" or blank)
Nennspannung (Rated Voltage): siehe Anlage (see appendix)
Nennstrom (Rated Current): siehe Anlage (see appendix)

ANLAGE (Appendix): 1-1.4

Dem Zertifikat liegt unsere Prüf- und Zertifizierungsordnung zugrunde und es bestätigt die Konformität des Produktes mit den oben genannten Standards und Prüfgrundlagen. Zusätzliche Anforderungen in Ländern, in denen das Produkt in Verkehr gebracht werden soll, müssen zusätzlich betrachtet werden. Die Herstellung des zertifizierten Produktes wird überwacht.
This certificate is based on our Testing and Certification Regulation and states the conformity of the product with the standards and testing requirements as indicated above. Any additional requirements in countries where the product is going to be marketed have to be considered additionally. The manufacturing of the certified product is subject to surveillance.

Zertifizierungsstelle

TÜV Rheinland LGA Products GmbH - Tillystraße 2 - 90431 Nürnberg
Tel.: (+49/221)8 06 - 13 71 e-mail: cert-validity@de.tuv.com
Fax: (+49/221)8 06 - 39 35 http://www.tuv.com/safety

Dipl.-Ing. (FH) A. Klinker

Everflow Precision Electronic (Dong Guan) Co., Ltd.
Frau Li Juan Chen

GeKeng Industrial Zone
Heng Li Town
Dongguan City
523460 Guangdong
P.R. China

Date : 13.04.2023
Our ref. : YML ZTW1
Your ref.: P00989074

Ref : R TÜV-Mark Approval

Type of Equipment : DC Fan
Model Designation : See Certificate
Certificate No. : R 50091668 0020
Report No. : 10009602 022

Dear Frau Li Juan Chen,

The above specified equipment has been tested and found to be in accordance with the relevant requirements.

Please find enclosed your certificate as specified above.

If cancellation of the certificate is submitted by 15 November in a given year, no fee will be charged for the following year.

The certificate is issued with the reservation that the license holder applies all information required in § 6 of the ProdSG related to name and address of the manufacturer or his authorized representative / importer, including their respective contact addresses on the product prior to marketing of the product in the European Economic Area.
In case you have a change regarding your involved local representative for the certificate, please inform us in due time.

With kind regards,

Certification Body

Dipl.-Ing. (FH) A. Klinker

Enclosure

Appendix to TÜV approved Certificate No.: R 50091668
Certified Product : DC Fan
Report Number : 10009602 022
Type Designation : BX1X2X3X4X5Z, FX1X2X3XX54Z, KX1X2X3X4X5Z, DX1X2X3X4X5Z, XX1X2X3X4X5Z, RX1X2X3X4X5Z, SX1X2X3X4X5Z, TX1X2X3X4X5Z (EVERFLOW) (X1=A,B,C,D,05,12,24,48,54; X2=10,12,30,40,50,60,70, 75,80,90,92,120,140; X3=10,15,18,20,25,28,32,38,40,56,80; X4=B,D,S;X5=L,M,H,U; Z=20 variables, each variable may be A-Z, 0-9, "(",")","-" or blank)

91	(R/F/T/S/K/D/X)(**B/12**)1225(B/D/S)U**Z**	12	2.0
92	(T/F/R/S/K/X)055010(B/D/S)L**Z**	5	0.20
93	(T/F/R/S/K/X)055010(B/D/S)M**Z**	5	0.25
94	(T/F/R/S/K/X)055010(B/D/S)H**Z**	5	0.40
95	(T/F/R/S/K/X)055010(B/D/S)U**Z**	5	0.45
96	(R/F)241225(B/D/S)L**Z**	24	0.20
97	(R/F)241225(B/D/S)M**Z**	24	0.25
98	(R/F)241225(B/D/S)H**Z**	24	0.30
99	(R/F)241225(B/D/S)U**Z**	24	0.35
100	(T/K/X)129215(B/D/S)L**Z**	12	0.20
101	(T/K/X)129215(B/D/S)M**Z**	12	0.25
102	(T/K/X)129215(B/D/S)H**Z**	12	0.30
103	(T/K/X)129215(B/D/S)U**Z**	12	0.50
104	(R/F/T/K/X/S)128010(B/D/S)L**Z**	12	0.15
105	(R/F/T/K/X/S)128010(B/D/S)M**Z**	12	0.20
106	(R/F/T/K/X/S)128010(B/D/S)H**Z**	12	0.25
107	(R/F/T/K/X/S))128010(B/D/S)U**Z**	12	0.35
108	(R/F)248015(B/D/S)L**Z**	24	0.15
109	(R/F)248015(B/D/S)M**Z**	24	0.20
110	(R/F)248015(B/D/S)H**Z**	24	0.25
111	(R/F)248015(B/D/S)U**Z**	24	0.30
112	R054010(B/D/S)L**Z**	5	0.13
113	R054010(B/D/S)M**Z**	5	0.2

TÜV Rheinland Group

Appendix to TÜV approved Certificate No.: R 50091668
Certified Product : DC Fan
Report Number : 10009602 022
Type Designation : BX1X2X3X4X5Z, FX1X2X3XX54Z, KX1X2X3X4X5Z, DX1X2X3X4X5Z, XX1X2X3X4X5Z, RX1X2X3X4X5Z, SX1X2X3X4X5Z, TX1X2X3X4X5Z (EVERFLOW) (X1=A,B,C,D,05,12,24,48,54; X2=10,12,30,40,50,60,70, 75,80,90,92,120,140; X3=10,15,18,20,25,28,32,38,40,56,80; X4=B,D,S;X5=L,M,H,U; Z=20 variables, each variable may be A-Z, 0-9, "(",")","-" or blank)

206	R123010(B/D/S)H**Z**	12	0.15
207	R123010(B/D/S)U**Z**	12	0.18
208	R053010(B/D/S)L**Z**	5	0.06
209	R053010(B/D/S)M**Z**	5	0.08
210	R053010(B/D/S)H**Z**	5	0.12
211	R053010(B/D/S)U**Z**	5	0.15

Date: April 13, 2023

TÜV Rheinland LGA Products GmbH TÜVRheinland Zertifizierungsstelle

Certification

Dipl.-Ing. A. Klinker

UL Product iQ®

GPWV2.E236658 - Fans, Electric - Component

Note: We are enhancing our systems and you may notice duplicate entries/missing/outdated data. During this interim period, please contact our Customer Service at https://www.ul.com/about/locations.

Fans, Electric - Component

EVERFLOW PRECISION ELECTRONIC (DONG GUAN) CO LTD E236658
GE KENG INDUSTRIAL ZONE
HENG LI TOWN
DONGGUAN, GUANGDONG 523460 China

Marking: Company name or tradename "E236658" , or trademark 

, 

, and model designation.

Note: For additional marking information, refer to the Guide Information Page.

Model(s): 103142H, 103142L, 103142M, B126013BH, B126013BM, B126013BU, B127015BH, B127015BM, B127015BU

Model(s): (A)121225(C)((x)(Z) Above (A) may be R or F, (C) may be S, D or B, (x) may be U, H, M or L, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): (A)121238(C)(x)(Z) Above (A) may be R or F, (C) may be S, D or B, (x) may be U, H, M or L, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): (A)124028(C)(D)(Z) Above (A) may be R, F, T represents screw hold on Frame, (C) may be S, D or B represents Bearing Type, (D) may be L, M, H or U represents Fan Speed, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): (A)124028(C)(x)(Z) Above (A) may be R or F, (C) may be S, D or B, (x) may be U, H, M or L, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): (A)126038(C)(x)(Z) Above (A) may be R or F, (C) may be S, D or B, (x) may be U, H, M or L, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): (A)128038(C)(x)(Z) Above (A) may be R or F, (C) may be S, D or B, (x) may be U, H, M or L, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): (A)128056(C)(x)(Z) Above (A) may be R or F, (C) may be S, D or B, (x) may be U, H, M or L, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): (A)128080(C)(x)(Z) Above (A) may be R or F, (C) may be S, D or B, (x) may be U, H, M or L, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Model(s): F128080CDZ C may be B, D or S, D may be L, M, H or U.Z may be A through Z,0 through 9,"(" , "),"-" or blank

Model(s): F248080CDZ C may be B, D or S, D may be L, M, H or U.Z may be A through Z,0 through 9,"(" , "),"-" or blank

Model(s): F488080CDZ A may be R, F or T, C may be B, D or S, D may be L, M, H or U.Z may be A through Z,0 through 9,"(" , "),"-" or blank

Model(s): F548080CDZ C may be B, D or S, D may be L, M, H or U.Z may be A through Z,0 through 9,"(" , "),"-" or blank

Model(s): R053010CDZ C may be B, D or S, D may be L, M, H or U.Z may be A through Z,0 through 9,"(" , "),"-" or blank

Model(s): R123010CDZ C may be B, D or S, D may be L, M, H or U.Z may be A through Z,0 through 9,"(" , "),"-" or blank

Feedback

DC fans, Model(s): RB14025SH where X5 may be S, B or D.

DC fans, Model(s): (A)124010(XX)(Z) , where (A) may be R, F, S, X, T or K, (XX) may be BL, BM, BH, BU, SL, SM, SH, SU, DL, DM, DH or DU, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC fans, Model(s): (A)124020(XX)(Z) , where (A) may be R, F, S, X, T or K, (XX) may be BL, BM, BH, BU, SL, SM, SH, SU, DL, DM, DH or DU, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC fans, Model(s): (A)125010(YY)(Z) , where (A) may be R, F, S, X, T or K, (YY) may be BL, BM, BH, DL, DM, DH, SL, SM or SH, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC fans, Model(s): (A)128010(C)(D)(Z) series, where (A) may be R or F, (C) may be X5, where X5 may be B, D, S or EBR, (D) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC fans, Model(s): (A)241225(C)(D)(Z) series, where (A) may be R or F, (C) may be X5, where X5 may be B, D, S or EBR, (D) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC fans, Model(s): (A)248015(C)(D)(Z) series, where (A) may be R or F, (C) may be X5, where X5 may be B, D, S or EBR, (D) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC fans, Model(s): (B)128010(C)(D)(Z) series, where (B) may be T, K or X, (C) may be X5, where X5 may be B, D, S or EBR, (D) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC fans, Model(s): (B)129215(C)(D)(Z) series, where (B) may be T, K or X, (C) may be X5, where X5 may be B, D, S or EBR, (D) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): (W)(B/12)6010(Y)U(55)(Z) , where (W) may be R, S or T, (B/12) may be B or 12, (Y) may be S, D or B, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): (X)(C/24)6025(Y)(V)(Z) , where (X) may be R, F or T, (C/24) may be C or 24, (Y) may be S, D or B, (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): B127515B(V)(Z) , where (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): F(B/12)1232B(V)(Z) , Where (B/12) may be B or 12, (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): F(B/12)8038B(V)(Z) , Where (B/12) may be B or 12, (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): F(B/12)9238B(V)(Z) , Where (B/12) may be B or 12, (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): F(C/24)9025(Y)(V)(Z) , Where (C/24) may be C or 24, (Y) may be S, D or B, (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): R(B/12)7038B(V)(Z) , Where (B/12) may be B or 12, (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): R(B/12)8020(Y)(A)(Z) , Where (B/12) may be B or 12, (Y) may be S, D or B, (A) may be L, M or H, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): R(B/12)8020BU(Z) , where (B/12) may be B or 12, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

DC Fans, Model(s): R(C/24)8032(Y)(V)(Z) , Where (C/24) may be C or 24, (Y) may be S, D or B, (V) may be L, M, H or U, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

Electric Fans - Component, Model(s): (A)(B)1817(C)L(Z) , where (A) may be R or F, (B) may be A or 05, (C) may be S, B, D or C, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.
Electric Fans - Component, Model(s): (A)128015(C)(D)(Z) , Where (A) may be R, F, T represents screw hold on Frame, (C) may be S, D or B represents Bearing Type, (D) may be L, M, H or U represents Fan Speed, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(" ")", "-" or blank.

Electric Fans - Component, Model(s): (A)128038B(D)(2)(Z) , Where (A) may be R, F, T represents screw hold on Frame, (D) may be L, M, H or U represents Fan Speed, (2) may be (2) or blank, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Electric Fans - Component, Model(s): (A)129025(C)(D)(E)(Z) , Where (A) may be R, F, T represents screw hold on Frame, (C) may be S, D or B represents Bearing Type, (D) may be L, M, H or U represents Fan Speed, (E)may be (2), (3), (4), (5) ,(6) or blank represents different frames, (Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Electric Fans - Component, Model(s): B053510BU(Z) , where (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

Electric Fans - Component, Model(s): B055015BL(Z) , where (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

Low Voltage Component Fan, Model(s): (A)124020(C)H(5)(Z) , where (A) may be R, F for different numbers of screw holes on frame shapes, (C) may be S, D, B or C for different bearing types, (5) may be (5) or blank, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

Low Voltage Component Fan, Model(s): (A)124020(C)L(5)(Z) , where (A) may be R, F for different numbers of screw holes on frame shapes, (C) may be S, D, B or C for different bearing types, (5) may be (5) or blank, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

Low Voltage Component Fan, Model(s): (A)124020(C)M(5)(Z) , where (A) may be R, F for different numbers of screw holes on frame shapes, (C) may be S, D, B or C for different bearing types, (5) may be (5) or blank, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

Low Voltage Component Fan, Model(s): (A)124020(C)U(5)(Z) , where (A) may be R, F for different numbers of screw holes on frame shapes, (C) may be S, D, B or C for different bearing types, (5) may be (5) or blank, (Z) stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.

Low Voltage DC Components Fan, Model(s): (A)124056(Y)(X)(Z) Above (A) may be R or F, (Y) may be S, B, D or C, (X) may be U, H, M or L,(Z) stands for 20 variables, each variable maybe A-Z, 0-9, "(",")", "-" or blank.

Low Voltage DC Components Fan, Model(s): F056025BH(+) Where (+) can be any seven combination of digit or letter.

Low Voltage DC Components Fan, Model(s): R248025BM(+) Where (+) can be any seven combination of digit or letter.

Last Updated on 2023-04-21

Shenzhen Tian Hai Test Technology Co.,Ltd.

CE Certificate of Conformity

Certification number: TH2302237-C04-C01 Report number: TH2302237-C04-R01

Shenzhen Tian Hai Test Technology Co., Ltd. hereby declares that testing has been completed and reports have been generated for:

Applicant:	EVERFLOW PRECISION ELECTRONIC (DONG GUAN) CO LTD
Address:	GE KENG INDUSTRIAL ZONE HENG LI TOWN DONGGUAN, GUANGDONG, 523460, CN
Manufacturer:	EVERFLOW PRECISION ELECTRONIC (DONG GUAN) CO LTD
Address:	GE KENG INDUSTRIAL ZONE HENG LI TOWN DONGGUAN, GUANGDONG, 523460, CN
Product:	DC FAN
Model:	See the model lists below

And, in accordance with the following applicable directives:

2014/30/EU Electromagnetic Compatibility (EMC)

This product has been assessed against the following applicable standards:

Standard(s): **EN 55032:2015+A1:2020**
EN 55035:2017+A11:2020

Therefore, Shenzhen Tian Hai Test Technology Co., Ltd. hereby acknowledges that the applicant may issue a DECLARATION of CONFORMITY and apply the CE marking in accordance with European Union Rules.

Attestation by:

Thomas Wong

Date of Issued: 2023-03-02

4F,A3 BLDG,The Silicon Valley Power intelligent terminal industrial park,Guan lan street,Longhua district,Shenzhen
Tel:+86-755-86615100 Fax:+86-755-86615105 http://www.tianhaitest.com

Attachment of TH2302237-C04-C01					
No.	Series	Model	Voltage(Vdc)	Current(A)	Speed(RPM)
91	9215 Series	(T/K/X)129215(B/D/S)LZ	12	0.20	2000
		(T/K/X)129215(B/D/S)MZ	12	0.25	2500
		(T/K/X)129215(B/D/S)HZ	12	0.30	3000
		(T/K/X)129215(B/D/S)UZ	12	0.50	3500
92	8010 Series	(R/F/T/K/X/S)128010(B/D/S)LZ	12	0.15	2400
		(R/F/T/K/X/S)128010(B/D/S)MZ	12	0.20	3000
		(R/F/T/K/X/S)128010(B/D/S)HZ	12	0.25	3600
		(R/F/T/K/X/S))128010(B/D/S)UZ	12	0.35	4200
93	8015 Series	(R/F)248015(B/D/S)LZ	24	0.15	2400
		(R/F)248015(B/D/S)MZ	24	0.20	3000
		(R/F)248015(B/D/S)HZ	24	0.25	3600
		(R/F)248015(B/D/S)UZ	24	0.30	4200
94	1817 Series	(R/F)(A/05)1817(B/D/S/C)LZ	5	0.24	/
95	9025 Series	(R/F/T)129025(B/D/S)LZ	12	0.25	3000
		(R/F/T)129025(B/D/S)MZ	12	0.3	3400
		(R/F/T)129025(B/D/S)HZ	12	0.4	3800
		(R/F/T)129025(B/D/S)UZ	12	0.5	4200
96	8038 Series	(R/F/T)128038(B/D/S)LZ	12	0.4	4800
		(R/F/T)128038(B/D/S)MZ	12	0.6	5800
		(R/F/T)128038(B/D/S)HZ	12	0.8	6800
		(R/F/T)128038(B/D/S)UZ	12	1.2	7800
97	8015 Series	(R/F/T)128015(B/D/S)LZ	12	0.19	2400
		(R/F/T)128015(B/D/S)HZ	12	0.25	3000
		(R/F/T)128015(B/D/S)MZ	12	0.32	3600
		(R/F/T)128015(B/D/S)UZ	12	0.5	4200
98	4028 Series	(R/F/T)124028(B/D/S)LZ	12	0.15	6000
		(R/F/T)124028(B/D/S)MZ	12	0.38	10000
		(R/F/T)124028(B/D/S)HZ	12	0.65	14000
		(R/F/T)124028(B/D/S)UZ	12	0.9	18000
99	5020 Series	(R/F/T/B)055020(B/D/S)LZ	5	0.2	2500
		(R/F/T/B)055020(B/D/S)MZ	5	0.3	3100
		(R/F/T/B)055020(B/D/S)HZ	5	0.4	3700
		(R/F/T/B)055020(B/D/S)UZ	5	0.5	4300
100	6015 Series	(R/F/T/B)056015(B/D/S)LZ	5	0.18	1500
		(R/F/T/B)056015(B/D/S)MZ	5	0.28	2000

119	8080 Series	F128080(B/D/S)LZ	12	1.5	8000+6000
		F128080(B/D/S)MZ	12	2.7	10000+8000
		F128080(B/D/S)HZ	12	6.3	13000+11000
		F128080(B/D/S)UZ	12	11	15500+14000
120	3010 Series	R123010(B/D/S)LZ	12	0.08	6500
		R123010(B/D/S)MZ	12	0.12	9000
		R123010(B/D/S)HZ	12	0.15	12000
		R123010(B/D/S)UZ	12	0.18	14500
121	3010 Series	R053010(B/D/S)LZ	5	0.06	6000
		R053010(B/D/S)MZ	5	0.08	7000
		R053010(B/D/S)HZ	5	0.12	8000
		R053010(B/D/S)UZ	5	0.15	9500

Z stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.
The variable (Z) is for marketing purpose only.

Shenzhen Tian Hai Test Technology Co.,Ltd.

Certificate of Conformity

Certification number: TH2302238-C08-C01 Report number: TH2110138-C08-R01

Shenzhen Tian Hai Test Technology Co.,Ltd. hereby declares that testing has been completed and reports have been generated for:

Applicant:	**EVERFLOW PRECISION ELECTRONIC (DONG GUAN) CO LTD**
Address:	GE KENG INDUSTRIAL ZONE HENG LI TOWN DONGGUAN, GUANGDONG, 523460, CN
Manufacturer:	**EVERFLOW PRECISION ELECTRONIC (DONG GUAN) CO LTD**
Address:	GE KENG INDUSTRIAL ZONE HENG LI TOWN DONGGUAN, GUANGDONG, 523460, CN
Product:	**DC FAN**
Model:	See attachment
Rating:	See attachment
Tested according to:	BS EN IEC 62368-1:2020+A11:2020

The submitted products have been tested by us with the listed standards.

This Attestation of Compliance is issued according to the Great Britain legislation Electrical Equipment (Safety)Regulations 2016. It confirms that the listed product complies with all essential requirements of the Regulations and applies only to the sample and its technical documentation submitted to Shenzhen Tian Hai Test Technology Co.,Ltd. for testing.

After preparation of the necessary technical documentation (which must be kept for up to 10years after the product is placed on the GB market) as well as the UK Declaration of Conformity, the required UKCA marking can be affixed on the product.Other relevant Regulations have to be observed.

UKCA

Attestation by:

Thomas Wong

Date of Issued: 2023-02-28

4F,A3 BLDG,The Silicon Valley Power intelligent terminal industrial park,Guan lan street,Longhua district,Shenzhen

Tel:+86-755-86615100 Fax:+86-755-86615105 http://www.tianhaitest.com

Attachment of TH2302238-C08-C01					
No.	Series	Model	Voltage(Vdc)	Current(A)	Speed(RPM)
91	9215 Series	(T/K/X)129215(B/D/S)LZ	12	0.20	2000
		(T/K/X)129215(B/D/S)MZ	12	0.25	2500
		(T/K/X)129215(B/D/S)HZ	12	0.30	3000
		(T/K/X)129215(B/D/S)UZ	12	0.50	3500
92	8010 Series	(R/F/T/K/X/S)128010(B/D/S)LZ	12	0.15	2400
		(R/F/T/K/X/S)128010(B/D/S)MZ	12	0.20	3000
		(R/F/T/K/X/S)128010(B/D/S)HZ	12	0.25	3600
		(R/F/T/K/X/S))128010(B/D/S)UZ	12	0.35	4200
93	8015 Series	(R/F)248015(B/D/S)LZ	24	0.15	2400
		(R/F)248015(B/D/S)MZ	24	0.20	3000
		(R/F)248015(B/D/S)HZ	24	0.25	3600
		(R/F)248015(B/D/S)UZ	24	0.30	4200
94	1817 Series	(R/F)(A/05)1817(B/D/S/C)LZ	5	0.24	/
95	9025 Series	(R/F/T)129025(B/D/S)LZ	12	0.25	3000
		(R/F/T)129025(B/D/S)MZ	12	0.3	3400
		(R/F/T)129025(B/D/S)HZ	12	0.4	3800
		(R/F/T)129025(B/D/S)UZ	12	0.5	4200
96	8038 Series	(R/F/T)128038(B/D/S)LZ	12	0.4	4800
		(R/F/T)128038(B/D/S)MZ	12	0.6	5800
		(R/F/T)128038(B/D/S)HZ	12	0.8	6800
		(R/F/T)128038(B/D/S)UZ	12	1.2	7800
97	8015 Series	(R/F/T)128015(B/D/S)LZ	12	0.19	2400
		(R/F/T)128015(B/D/S)HZ	12	0.25	3000
		(R/F/T)128015(B/D/S)MZ	12	0.32	3600
		(R/F/T)128015(B/D/S)UZ	12	0.5	4200
98	4028 Series	(R/F/T)124028(B/D/S)LZ	12	0.15	6000
		(R/F/T)124028(B/D/S)MZ	12	0.38	10000
		(R/F/T)124028(B/D/S)HZ	12	0.65	14000
		(R/F/T)124028(B/D/S)UZ	12	0.9	18000
99	5020 Series	(R/F/T/B)055020(B/D/S)LZ	5	0.2	2500
		(R/F/T/B)055020(B/D/S)MZ	5	0.3	3100
		(R/F/T/B)055020(B/D/S)HZ	5	0.4	3700
		(R/F/T/B)055020(B/D/S)UZ	5	0.5	4300

118	8080 Series	F248080(B/D/S)LZ	24	1	8000+6000
		F248080(B/D/S)MZ	24	2.7	12000+10000
		F248080(B/D/S)HZ	24	5.5	15000+13000
		F248080(B/D/S)UZ	24	7.5	17000+15000
119	8080 Series	F128080(B/D/S)LZ	12	1.5	8000+6000
		F128080(B/D/S)MZ	12	2.7	10000+8000
		F128080(B/D/S)HZ	12	6.3	13000+11000
		F128080(B/D/S)UZ	12	11	15500+14000
120	3010 Series	R123010(B/D/S)LZ	12	0.08	6500
		R123010(B/D/S)MZ	12	0.12	9000
		R123010(B/D/S)HZ	12	0.15	12000
		R123010(B/D/S)UZ	12	0.18	14500
121	3010 Series	R053010(B/D/S)LZ	5	0.06	6000
		R053010(B/D/S)MZ	5	0.08	7000
		R053010(B/D/S)HZ	5	0.12	8000
		R053010(B/D/S)UZ	5	0.15	9500

Z stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.
The variable (Z) is for marketing purpose only.

Shenzhen Tian Hai Test Technology Co.,Ltd.

Certificate of Conformity

Certification number: TH2302238-C07-C01 Report number: TH2302238-C07-R01

Shenzhen Tian Hai Test Technology Co., Ltd. hereby declares that testing has been completed and reports have been generated for:

Applicant:	EVERFLOW PRECISION ELECTRONIC (DONG GUAN) CO LTD
Address:	GE KENG INDUSTRIAL ZONE HENG LI TOWN DONGGUAN, GUANGDONG, 523460, CN
Manufacturer:	EVERFLOW PRECISION ELECTRONIC (DONG GUAN) CO LTD
Address:	GE KENG INDUSTRIAL ZONE HENG LI TOWN DONGGUAN, GUANGDONG, 523460, CN
Product:	DC FAN
Model:	See the model lists below
Tested according to:	BS EN 55032:2015+A11:2020 BS EN 55035:2017+A11:2020

The submitted products have been tested by us with the listed standards.

This Attestation of Compliance is issued according to the Great Britain legislation Electromagnetic Compatibility Regulations 2016. It confirms that the listed product complies with all essential requirements of the Regulations and applies only to the sample and its technical documentation submitted to Shenzhen Tian Hai Test Technology Co.,Ltd. for testing.

After preparation of the necessary technical documentation (which must be kept for up to 10years after the product is placed on the GB market) as well as the UK Declaration of Conformity, the required UKCA marking can be affixed on the product.Other relevant Regulations have to be observed.

UKCA

Attestation by:

Thomas Wong

Date of Issued: 2023-03-02

4F,A3 BLDG,The Silicon Valley Power intelligent terminal industrial park,Guan lan street,Longhua district,Shenzhen
Tel:+86-755-86615100 Fax:+86-755-86615105 http://www.tianhaitest.com

Attachment of TH2302238-C07-C01					
No.	Series	Model	Voltage(Vdc)	Current(A)	Speed(RPM)
91	9215 Series	(T/K/X)129215(B/D/S)LZ	12	0.20	2000
		(T/K/X)129215(B/D/S)MZ	12	0.25	2500
		(T/K/X)129215(B/D/S)HZ	12	0.30	3000
		(T/K/X)129215(B/D/S)UZ	12	0.50	3500
92	8010 Series	(R/F/T/K/X/S)128010(B/D/S)LZ	12	0.15	2400
		(R/F/T/K/X/S)128010(B/D/S)MZ	12	0.20	3000
		(R/F/T/K/X/S)128010(B/D/S)HZ	12	0.25	3600
		(R/F/T/K/X/S))128010(B/D/S)UZ	12	0.35	4200
93	8015 Series	(R/F)248015(B/D/S)LZ	24	0.15	2400
		(R/F)248015(B/D/S)MZ	24	0.20	3000
		(R/F)248015(B/D/S)HZ	24	0.25	3600
		(R/F)248015(B/D/S)UZ	24	0.30	4200
94	1817 Series	(R/F)(A/05)1817(B/D/S/C)LZ	5	0.24	/
95	9025 Series	(R/F/T)129025(B/D/S)LZ	12	0.25	3000
		(R/F/T)129025(B/D/S)MZ	12	0.3	3400
		(R/F/T)129025(B/D/S)HZ	12	0.4	3800
		(R/F/T)129025(B/D/S)UZ	12	0.5	4200
96	8038 Series	(R/F/T)128038(B/D/S)LZ	12	0.4	4800
		(R/F/T)128038(B/D/S)MZ	12	0.6	5800
		(R/F/T)128038(B/D/S)HZ	12	0.8	6800
		(R/F/T)128038(B/D/S)UZ	12	1.2	7800
97	8015 Series	(R/F/T)128015(B/D/S)LZ	12	0.19	2400
		(R/F/T)128015(B/D/S)HZ	12	0.25	3000
		(R/F/T)128015(B/D/S)MZ	12	0.32	3600
		(R/F/T)128015(B/D/S)UZ	12	0.5	4200
98	4028 Series	(R/F/T)124028(B/D/S)LZ	12	0.15	6000
		(R/F/T)124028(B/D/S)MZ	12	0.38	10000
		(R/F/T)124028(B/D/S)HZ	12	0.65	14000
		(R/F/T)124028(B/D/S)UZ	12	0.9	18000
99	5020 Series	(R/F/T/B)055020(B/D/S)LZ	5	0.2	2500
		(R/F/T/B)055020(B/D/S)MZ	5	0.3	3100
		(R/F/T/B)055020(B/D/S)HZ	5	0.4	3700
		(R/F/T/B)055020(B/D/S)UZ	5	0.5	4300
100	6015 Series	(R/F/T/B)056015(B/D/S)LZ	5	0.18	1500

		F248080(B/D/S)UZ	24	7.5	17000+15000
119	8080 Series	F128080(B/D/S)LZ	12	1.5	8000+6000
		F128080(B/D/S)MZ	12	2.7	10000+8000
		F128080(B/D/S)HZ	12	6.3	13000+11000
		F128080(B/D/S)UZ	12	11	15500+14000
120	3010 Series	R123010(B/D/S)LZ	12	0.08	6500
		R123010(B/D/S)MZ	12	0.12	9000
		R123010(B/D/S)HZ	12	0.15	12000
		R123010(B/D/S)UZ	12	0.18	14500
121	3010 Series	R053010(B/D/S)LZ	5	0.06	6000
		R053010(B/D/S)MZ	5	0.08	7000
		R053010(B/D/S)HZ	5	0.12	8000
		R053010(B/D/S)UZ	5	0.15	9500

Z stands for 20 variables, each variable may be A through Z,0 through 9,"(" , ")","-" or blank.
The variable (Z) is for marketing purpose only.