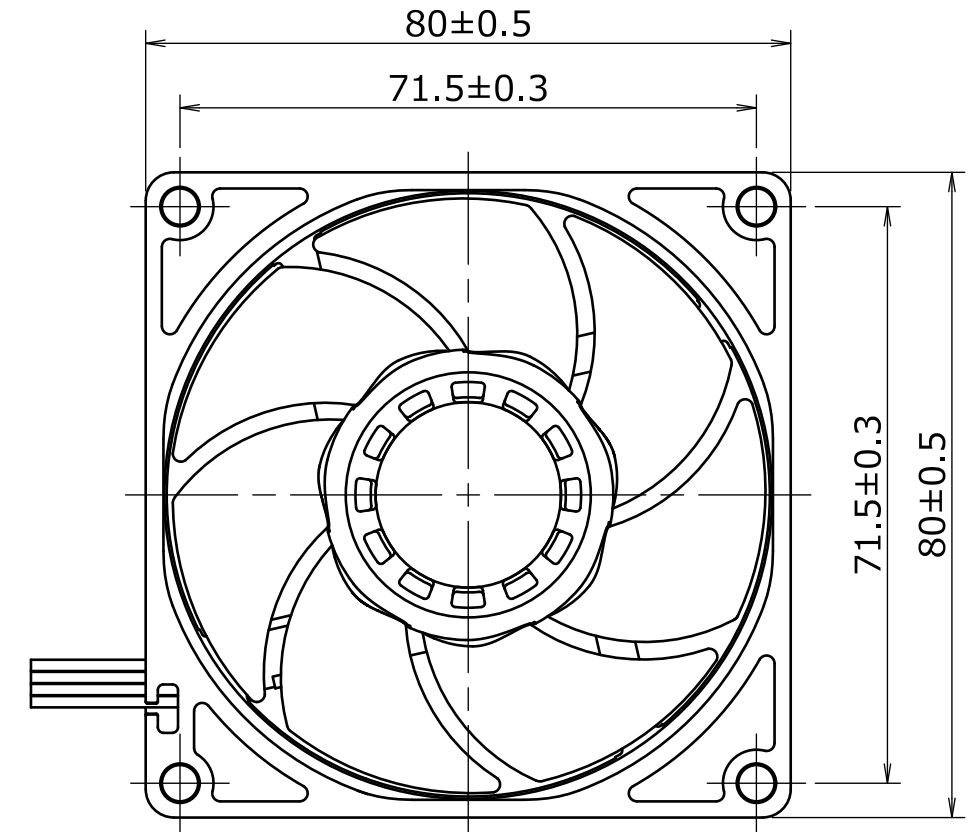
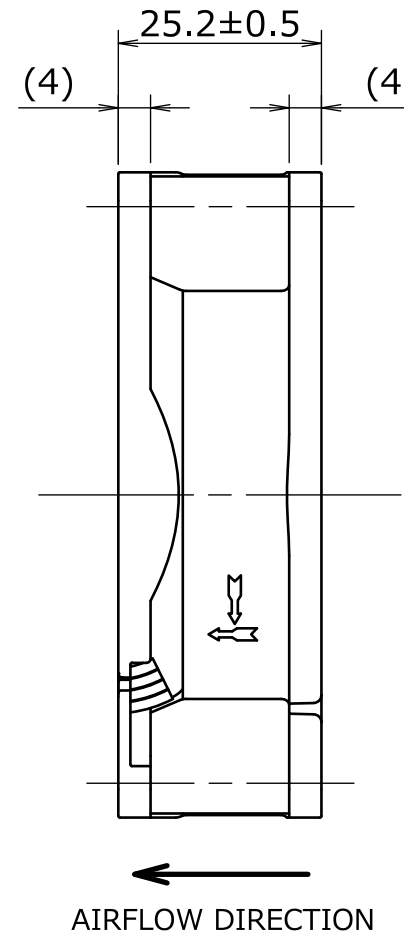
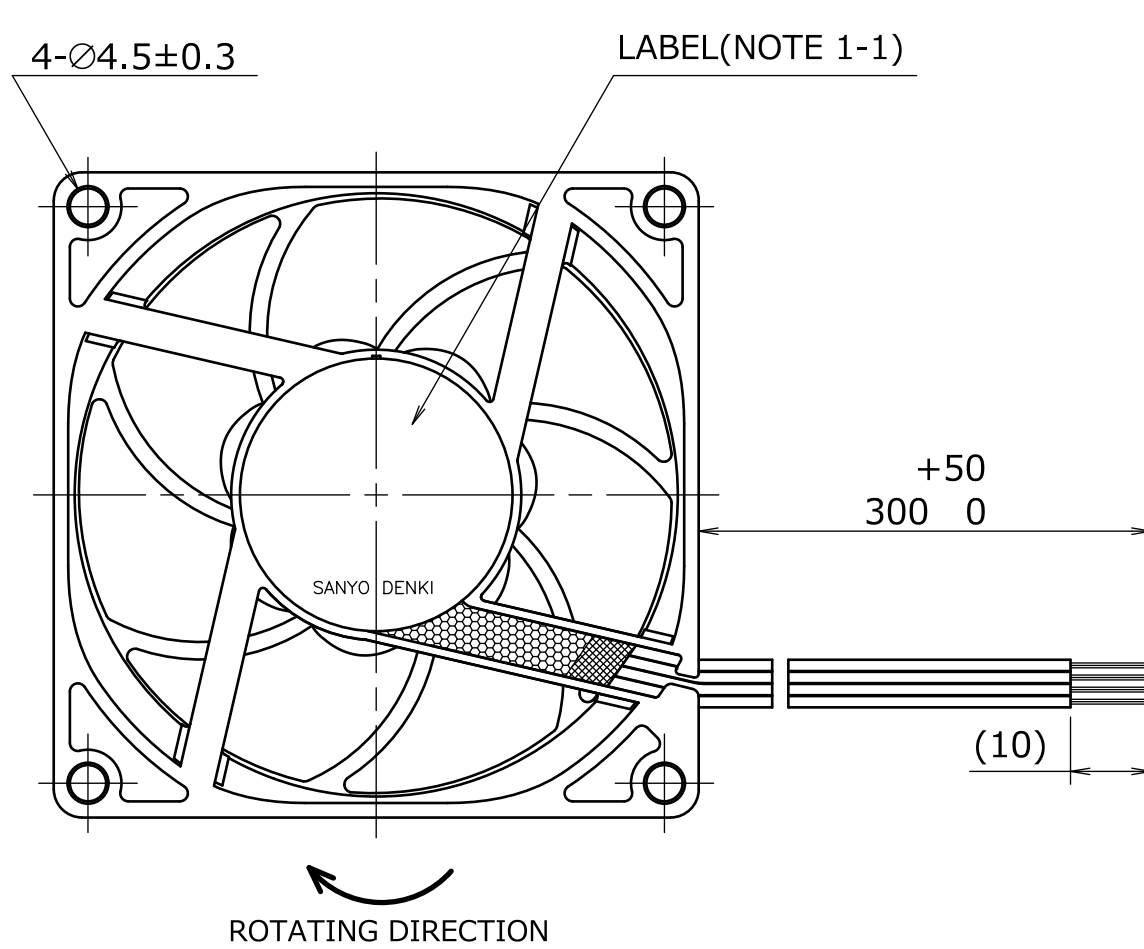


# 1. DIMENSIONS AND PARTS LIST

<DIMENSIONS>



<LEAD WIRE CONNECTION TABLE>		
FAN		
SIGNAL	LEAD WIRE	COLOR
+	UL1430 AWG26	RED
GND	UL1430 AWG26	BLACK
PWM	UL1430 AWG26	BROWN
SENSOR	UL1430 AWG26	YELLOW

NOTE 1-1. PRINT PRODUCT NAME, MODEL No., MANUFACTURER, AND MANUFACTURED DATE ETC.  
品名, 型名, 製造会社名 及び 製造年月日等を表示する。

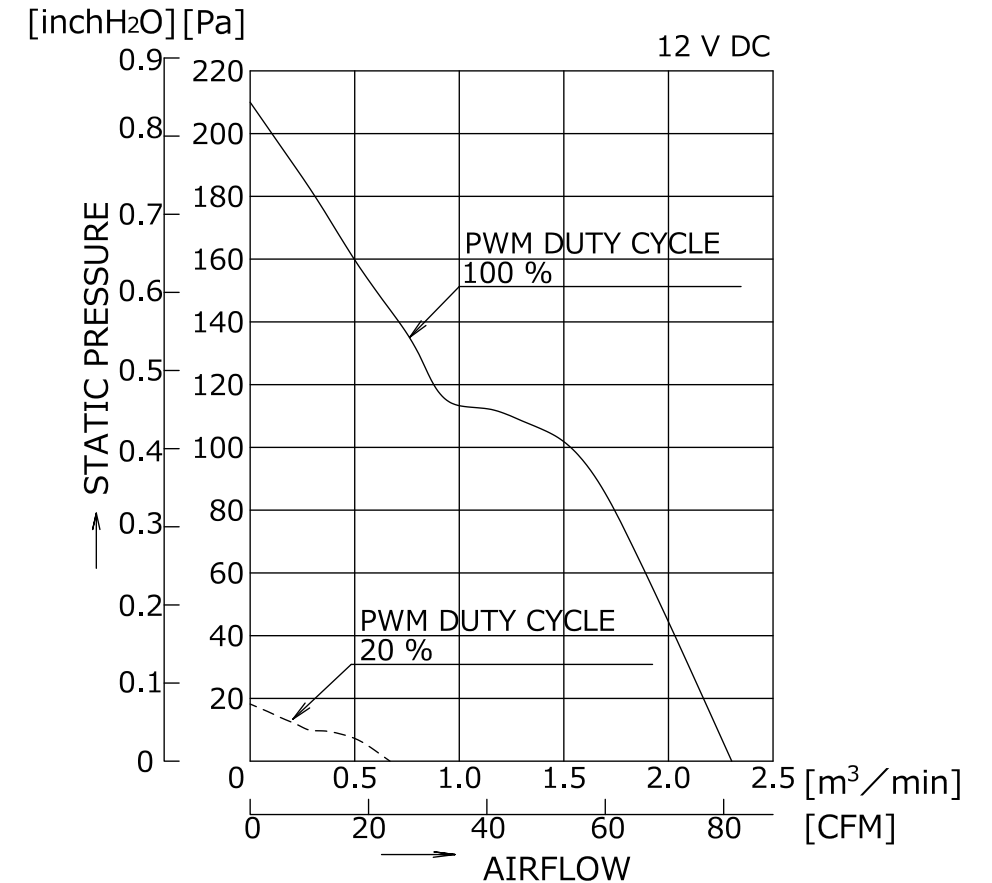
	ECN No.	名称 Title
	E0204670	San Ace 80W (9WPA)
単位 Unit	新規 New Design	RIBBED/PULSE_SENSOR/PWM_CONTROL
mm	T.KAISE 20-10-27	
尺度 Scale	図面番号 Dwg. No.	9WPA0812P4G201
-	-	Rev. B
<b>SANYO DENKI</b>		承認 Approved By
		T.IKEDA
Group		20-11-13
D12K		審査 Checked By
User		M.TAKAKUWA
E0		20-11-12
Page		設計 Designed By
1/4		T.KAISE
		20-11-12

## 2. DESCRIPTION AND AIRFLOW-STATIC PRESSURE CHARACTERISTICS EXAMPLE

### <DESCRIPTION>

ITEM	UNIT	DESCRIPTION		
PWM DUTY CYCLE	%	100	20	0
RATED VOLTAGE	V DC	12		
OPERATING VOLTAGE RANGE	V DC	10.8 ~ 13.2		
MAX. AIRFLOW (NOTE 2-2)	m <sup>3</sup> /min (CFM)	2.32 (81.9)	0.67 (23.6)	-
MAX. STATIC PRESSURE (NOTE 2-2)	Pa (inchH <sub>2</sub> O)	210 (0.84)	18.2 (0.073)	-
RATED CURRENT (NOTE 2-2)	A	0.71	0.07	0.04 MAX.
RATED SPEED	min <sup>-1</sup>	8250±825	2400±720	NO ROTATION
INSULATION RESISTANCE (NOTE 2-3)	-	10 MΩ MIN. AT 500 V DC		
DIELECTRIC STRENGTH (NOTE 2-3)	-	1 MINUTE AT 500 V AC, 50/60 Hz		
OPERATING TEMPERATURE	℃	-40 ~ 70		
STORAGE TEMPERATURE	℃	-40 ~ 70		
EXPECTED LIFE	-	40,000 h / 60 °C (L10, CONTINUOUS OPERATION)		
SOUND PRESSURE LEVEL (NOTE 2-2, 2-4)	dB(A)	54	21	-
MASS	g	APPROX. 130		
MATERIAL	-	FRAME, IMPELLER : PLASTICS		
BEARING SYSTEM	-	2 BALL BEARINGS		
CONTROL TERMINAL	-	SOURCE CURRENT: 1 mA MAX. AT CONTROL VOLTAGE 0 V		
	-	SINK CURRENT : 1 mA MAX. AT CONTROL VOLTAGE 5.25 V		
	-	CONTROL TERMINAL VOLTAGE : 5.25 V MAX. (OPEN CIRCUIT)		
IP CODE	-	IP68 (IEC 60529:2001)		

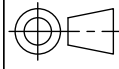
### <AIRFLOW-STATIC PRESSURE CHARACTERISTICS EXAMPLE>



- NOTE 2-1. VALUES FOR EACH CHARACTERISTIC ARE AT ROOM TEMPERATURE AND NORMAL HUMIDITY.  
諸特性は常温、常湿での値。
- 2-2. UNSPECIFIED VALUE IS THE NOMINAL VALUE.  
指定なき値は標準値。
- 2-3. MEASURED BETWEEN LEAD WIRE CONDUCTORS AND FRAME.  
リード線導体部とフレームとの間。
- 2-4. MEASURED AT 1 m FROM THE AIR INLET.  
ファン吸込側より1 mにて測定する。
- 2-5. MOTOR IS PROTECTED FROM DAMAGE OF LOCKED ROTOR CONDITION AT THE OPERATING VOLTAGE.  
DO NOT LOCK ROTOR OUTSIDE OF OPERATING VOLTAGE.  
ファン拘束時焼損の恐れはない。使用電圧範囲外でファンを拘束しないこと。

2-6. ALL ELECTRICAL PARTS IN THIS FAN MOTOR HAVE BEEN COATED WITH A LAYER OF RESIN.

本ファンモータは、活電部に樹脂コーティングを施しています。

	ECN No.	名称 Title		
	E0204670	San Ace 80W (9WPA) RIBBED/PULSE_SENSOR/PWM_CONTROL		
単位 Unit	新規 New Design	<div style="text-align: right; font-weight: bold; font-size: 1.2em;">9WPA0812P4G201</div> <div style="text-align: right; font-weight: bold; font-size: 1.2em;">B</div>		
mm	T.KAISE 20-10-27			
尺度 Scale	図面番号 Dwg. No.	Rev.		
-	-	-		
SANYO DENKI		承認 Approved By	審査 Checked By	設計 Designed By
		T.IKEDA 20-11-13	M.TAKAKUWA 20-11-12	T.KAISE 20-11-12
Group		D12K	User	E0
Page		2/4		

### 3. SENSOR SPECIFICATIONS

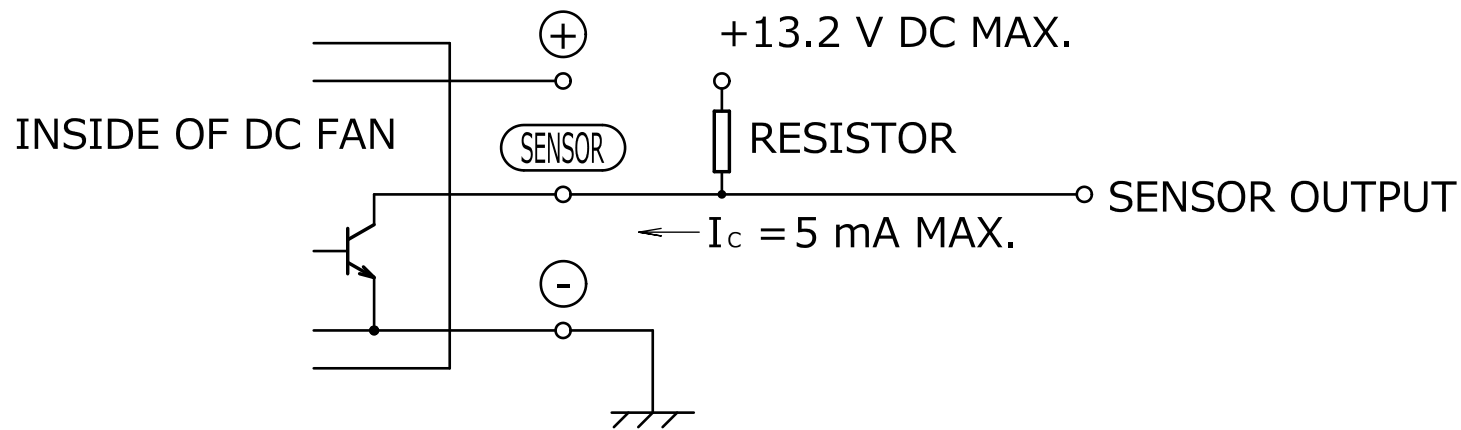
<OUTPUT CIRCUIT>

OPEN COLLECTOR

<SPECIFICATIONS>

$V_{CE} = +13.2 \text{ V DC MAX.}$

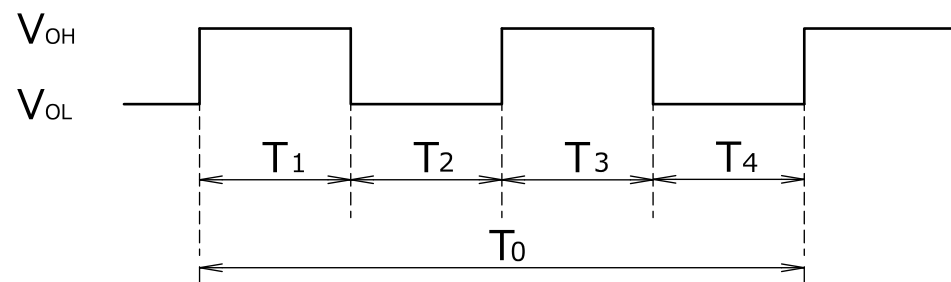
$I_C = 5 \text{ mA MAX. (} V_{CE} \text{ (SAT)} = 0.8 \text{ V MAX.)}$



<OUTPUT WAVEFORM>

(a) IN CASE OF STEADY RUNNING

ONE REVOLUTION



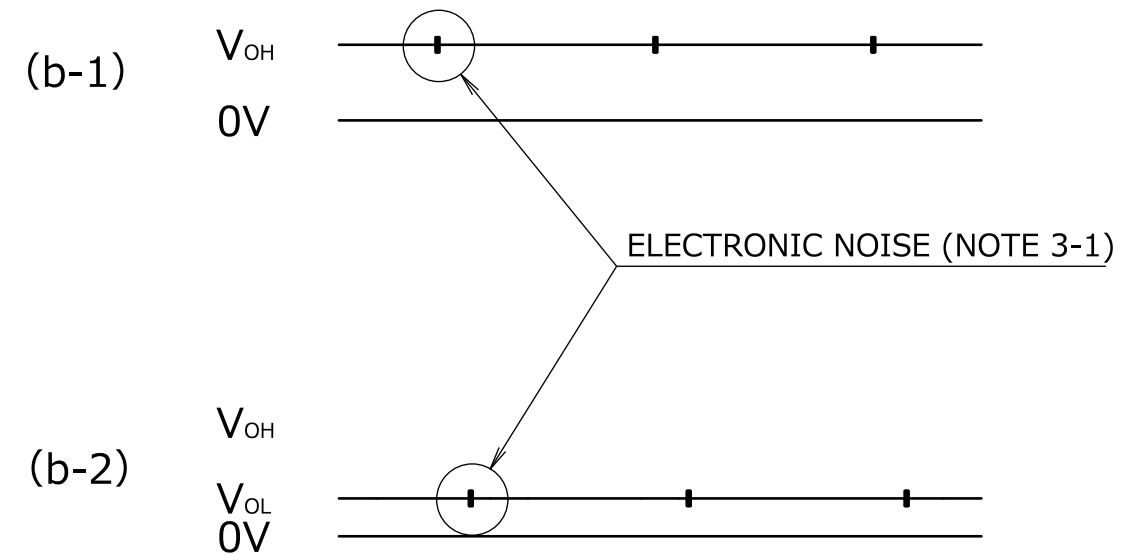
$$T_{1 \text{ to } 4} \cong (1/4) T_0$$

$$T_{1 \text{ to } 4} \cong (1/4) T_0 = 60/4 \text{ N (s)}$$

$$N = \text{FAN SPEED (min}^{-1}\text{)}$$

(b) IN CASE OF STEADY LOCKED ROTOR

SENSOR OUTPUT IS FIXED EITHER (b-1) OR (b-2).  
センサー出力は(b-1)あるいは(b-2)のどちらかに固定される。



NOTE: 3-1. THE ELECTRONIC NOISE DUE TO AUTO-RESTART BEHAVIOR OF THE MOTOR MAY INFLUENCE  $V_{OH}$  OR  $V_{OL}$ .  
モータの再起動動作にともない、 $V_{OH}$ あるいは $V_{OL}$ にノイズが載ることがある。

	ECN No.	名称 Title	
	E0204670	San Ace 80W (9WPA) RIBBED/PULSE_SENSOR/PWM_CONTROL	
単位 Unit	新規 New Design	設計 Designed By	
mm	T.KAISE 20-10-27	T.KAISE 20-11-12	
尺度 Scale	図面番号 Dwg. No.	承認 Approved By	
-		T.IKEDA 20-11-13	
		審査 Checked By	設計 Designed By
		M.TAKAKUWA 20-11-12	T.KAISE 20-11-12
Group		User	Page
D12K		E0	3/4