

MESSRS.**SPECIFICATION FOR APPROVAL****承 認 书**

Product	PIEZO BUZZER (SELF DRIVE)
Part No.	HZ-4228S-C5 (RoHS)
Customer Approval	

Approved By	Checked By	Made By
王台平 JUN-09-2014	曹丽萍 JUN-09-2014	LILY JUN-09-2014

常州华龙电子有限公司**DRAGONSTATE ELECTRONIC CORPORATION**

中国江苏省常州市新区电子园新四路 36 号

Tel: +86-519-85110078. 86-519-85106698, Fax: +86-519-85101081

File Name:

EDITION:1.1

1. Specifications

HZ-4228S-C5(RoHS)

Items		Units	Specifications	Conditions
01	Rated Voltage	VDC	12	
02	Operating Voltage	VDC	3~20	
03	Rated Current	mA(Max)	9	At 12VDC
04	Sound Output At 30cm	dBA(Min)	92	At 12VDC
05	Resonant Frequency	Hz	2800±500	
06	Tone Nature	CONTINUEOUS		
07	Operating Temp.	°C	-20 ~ +60	
08	Storage Temp.	°C	-20 ~ +70	
09	Weight	g	14.6	

2. Measuring Method

2-1. Test Condition

STANDARD

Temperature : 15 ~ 35°C

Relative humidity : 25% ~ 85%,

Atmospheric pressure : 860mbar to 1060mbar.

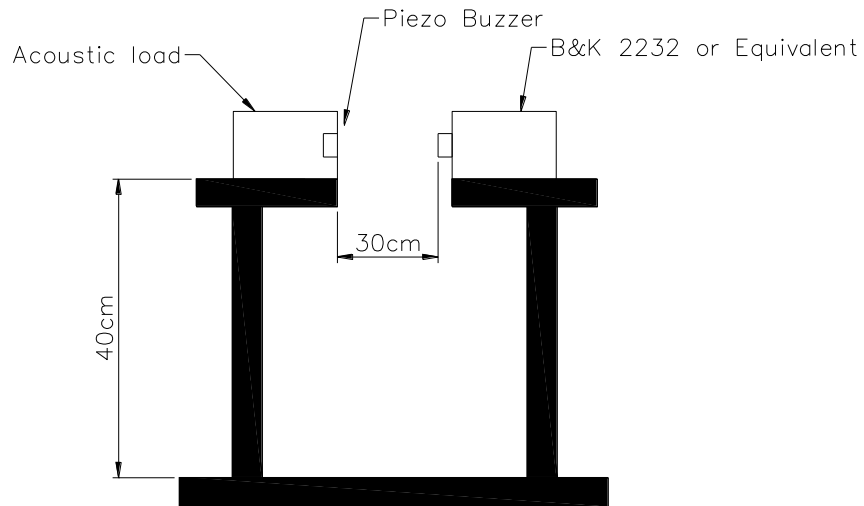
JUDGEMENT

Temperature : 20±3°C

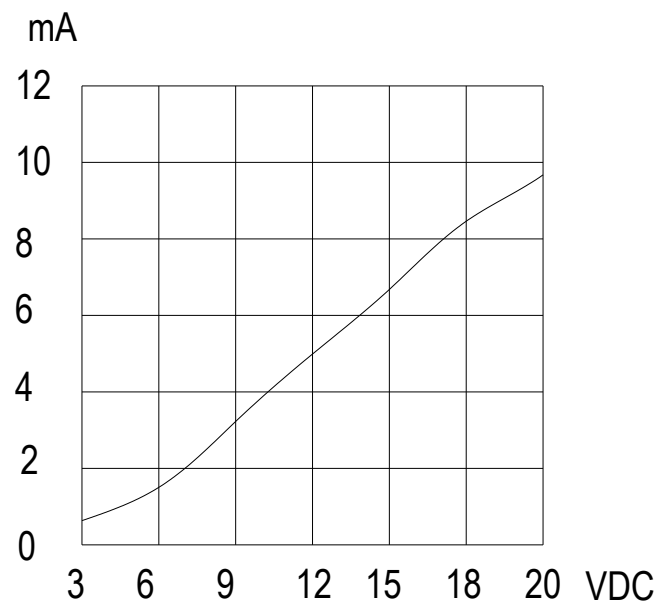
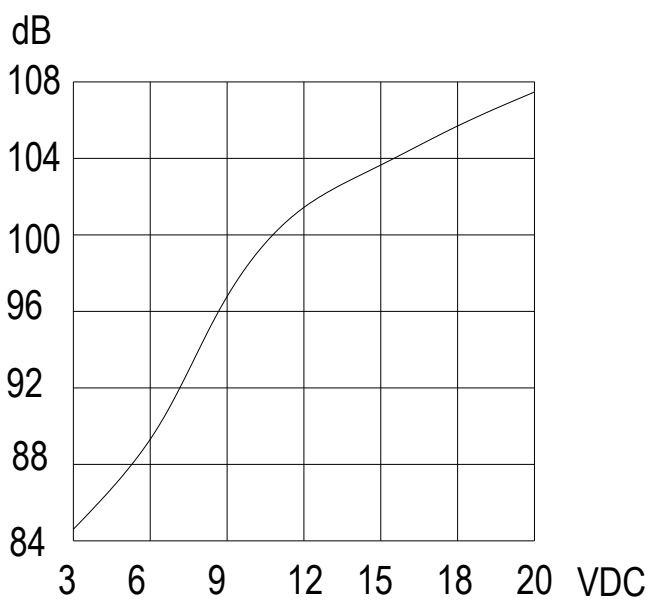
Relative humidity : 60% ~ 70%,

Atmospheric pressure : 860mbar to 1060mbar

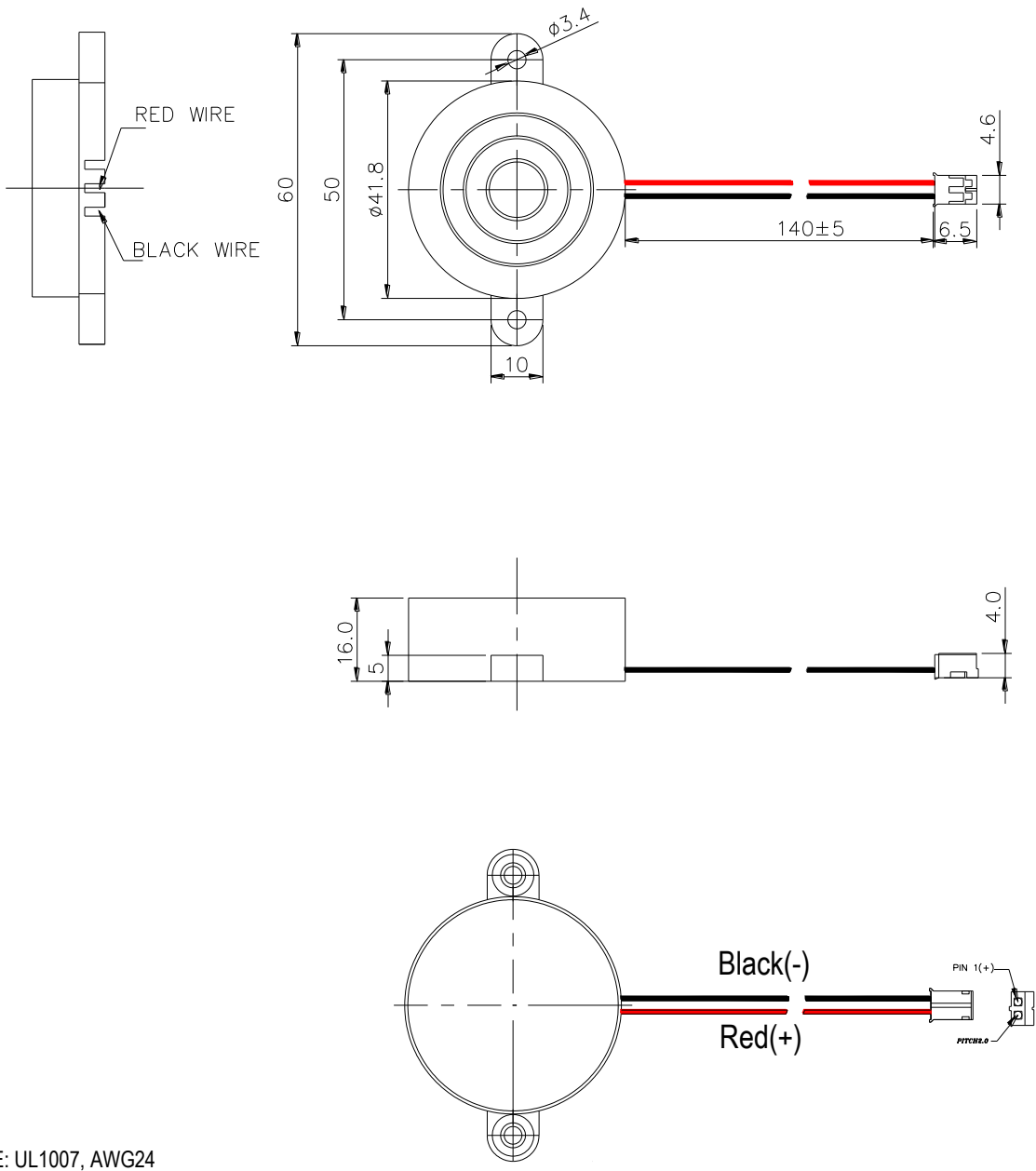
2-2. Standard Test Fixture



2-3. Characteristic Curve



REV NO.	REVISION NOTE	APPROVAL	DATE
---------	---------------	----------	------



WIRE: UL1007, AWG24
CONNECTOR: JST PHR-2 COMPATIBLE.
HOUSING JST PH 2.0, 2PIN.

TITLE: <i>PIEZO BUZZER</i>		DRAWN: Lily	2007/12/07	SCALE: 1:1	SHEET: 1 : 1
PART NO. <i>HZ-4228S-C5</i>	1	DESIGNED: R & D OF D.S.	UNITS: mm		
DWG NO. <i>DPE-1246</i>		CHECKED: Emily	TOLERANCE ± 0.5		
REV		APPROVAL: Eric	UNLESS OTHERWISE SPECIFIED: ONE PLACE DECIMAL \pm *** TWO PLACE DECIMAL \pm *** THREE PLACE DECIMAL \pm ***		
		MATERIAL: ABS777			

DS DRAGONSTATE ELECTRONIC CORPORATION

4. Reliability Test

Item		Conditions	Evaluation standard
01	Low Temp. Storage Test	-20°C±2°C ,240Hr	After the test the part shall meet specifications without Any degradation and performance except S.P.L S.P.L shall be 84dB or more.
02	High Temp.Storage Test	70°C±2°C ,240Hr	
03	Temp./Humidity Storage Test	40°C±2°C , RH90-95% 240Hr	
04	Thermal Shock Test	-40°C±2°C (0.5Hr)→ ,20°C±2°C (0.25Hr) 85°C±2°C (0.5Hr)→ ,20°C±2°C (0.5Hr) 5 cycles	
05	Vibration Test	10-55Hz/2 Hr amplitude1.5mm X,Y, Z,3 directions	
06	Mechanical Shock Test	+100G,Half Sine wave, XYZ , 3 impacts per axis ,3 times.	
07	Free Drop Test	The part shall be dropped freely from a height of 75 cm X,Y, Z,3 directions 3times (total 9 times)	
08	Life Burning Test	The part shall be subjected to 500 hrs in the room temp with rated voltage applied	
09	Lead Strength Test	Pull Lead with a force of 10N,on the direction of the lead axis for 10±1 sec.	