

Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from, Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



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PRODUCT: Dynamic Speaker

EDITION: A/2016



THIS SPECIFICATION COVERS OUR PRODUCT OF DYNAMIC SPEAKER UNIT FOR MOBILE TELEPHONE USE

SPEAKER ELECTROACOUSTIC CHARACTERISTICS

	sound pressure level	85±3dB SPL @0.7,0.8 ,1.0,1.5and2.0KHz in average (0dB SPL=20μPa)
	measuring condition	0.1W (Sine wave) 10cm measured with baffler shown in Fig.1
	frequency response curve	As shown in Fig. 2
	response frequency	700±20%Hz @ 1V in free air
		900±20%Hz @ 1V in 1cc box
	rated noise power	0.5W (in 1cc box)
	short term max. power	0.7W (in 1cc box)
	operation test	Must be free of audible noise (buzzes and rattles)
		(300 ~ 5KHz frequency range, input level up to 2.0Vrms in 1cc box)
	distortion	Less than 10% @1KHz,0.1M,0.5W frequency range ,input level up to 0.5W)
·	ac impedance	$7\pm15\%\Omega$ (@1.5KHz 1V) without baffler

GENERAL SPECIFICATIONS

operating temperatur	operating temperature -20°C ~+60°C				
range					
standard test conditions					
tempe	rature	temperature			
relative	humidity	45%~80%(RH)			
dimension	15 x 8 x	2.6 mm			

RELIABILITY TESTS

The sound pressure as specified shall neither deviate more than ± 3 dB form the initial value, nor have any significant damage after any of following testing.

HIGH TEMPERATURE TEST

high temperature	+60±2°C
duration	96 hours
LOW TEMPERATURE TEST	
low temperature	-20±2°C
duration	96 hours
HEAT SHOCK TEST	
high temperature	+60±2°C
low temperature	-20±2°C
changeover time	<30 seconds
duration	1 hour
 cycle	100



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RELIABILITY TESTS (Continued)

HUMIDITY TEST

temperature	+ 40±2°C
relative humidity	90%~95%
duration	96 hours
TEMPERATURE CYCLE TES	т
temperature	-20°C +60°C
duration	45minutes 45minutes
temperature gradient	1~3°C/min
cycle	25
DROP TEST	
mounted with dummy set	100 g
 mass	
height	1.5 m
 cycle	6(1 each plain) Onto the concrete board
LOAD TEST	
Speaker mode	white noise(EIA filter)for 1 hour@0.5W(in 1CC box) input power

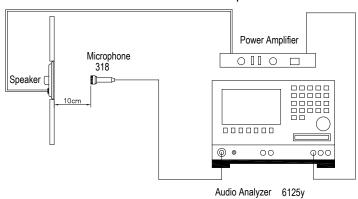
MEASURING METHOD (SPEAKER MODE)

STANDARD

TEST CONDITION	
temperature	15 ~ 35℃
relative humidity	45% ~ 85%
atmospheric pressure	860mbar to 1060mbar
STANDARD TEST FIXTURE	
input power	0.1W(0.89V)
zero level	-dB
mode	TSR
potentiometer range	50dB
sweep time	0.5sec

(Fig. 1)

Standard test condition of speaker

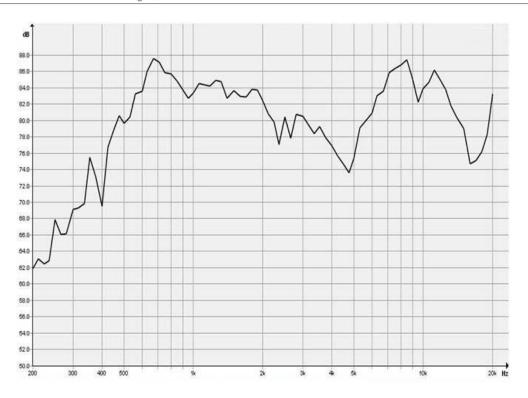




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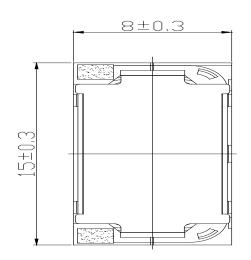
EDITION: A/2016

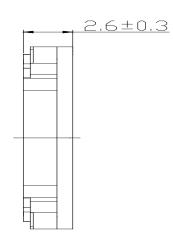
FREQUENCY RESPONSE CURVE (Fig. 2)

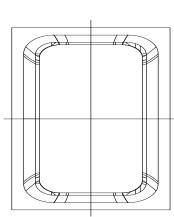


DIMENSIONS

Tolerance:±0.5 (unit: mm)







no.	part name	material	quantity
1	Cap	Scotch ABS	1
2	Diaphragm	PEEK	1
3	Magnet	Nd Fe B10.6*6.6*1.0	1
4	Plate3	SPCC10.65*6.65*0.4	1
5	Voice Coil	POLYURETHANEENAMELLED WIRE 10.95*6.95*1.05	1
6	Frame	BLACK PBT	1
7	Gasket		1



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PACKING



