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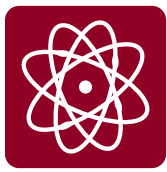
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Audio Products Division

2007 Catalog

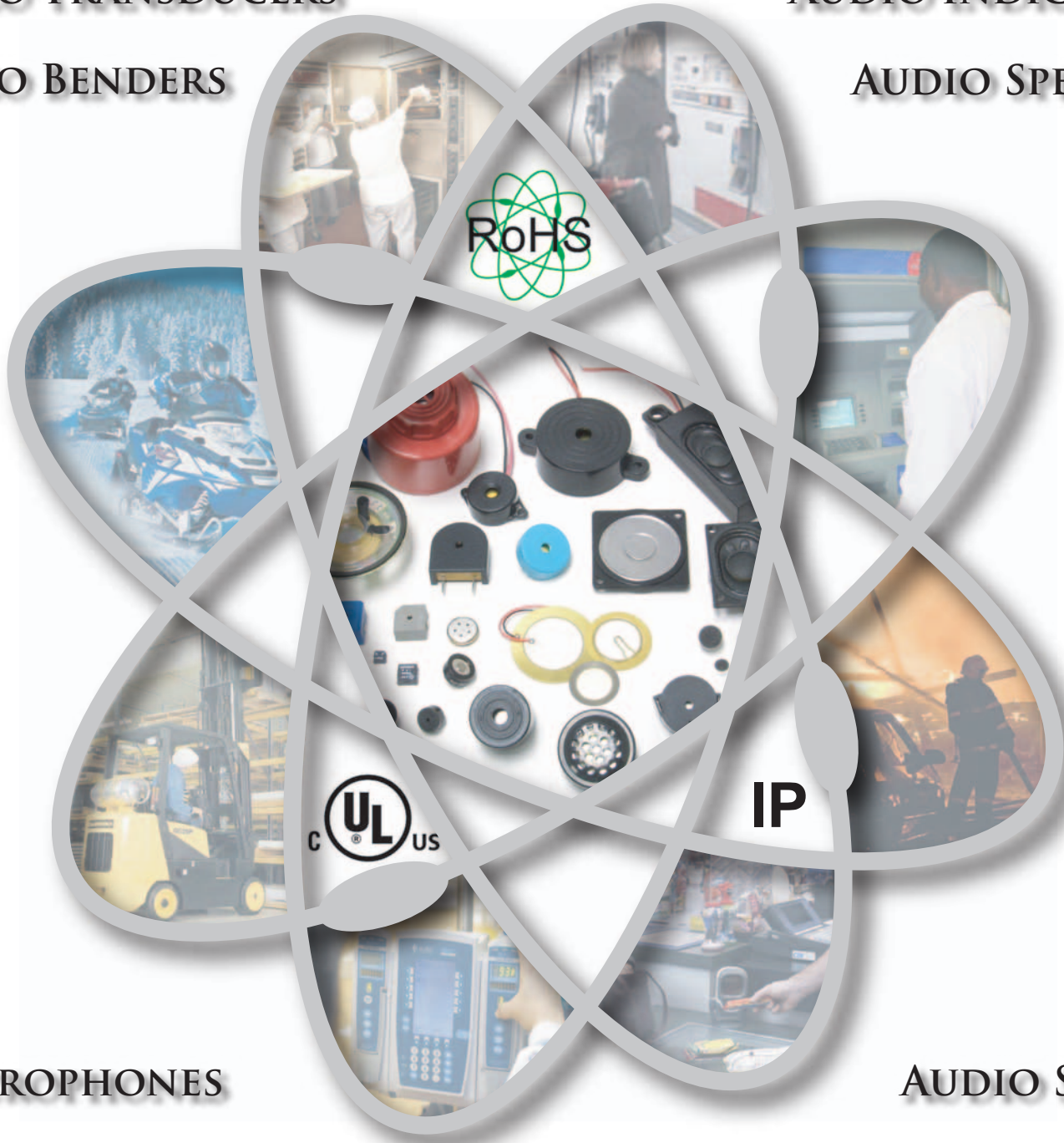
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The central screenshot shows the main website interface with the following content:

- Header: "Our Audio Products are now RoHS compliant."
- Navigation: Home, Products, What's New, Where to Buy, Sample/Quote Requests, Customer Services, Distribution Services, Tech Notes, About Us, Part Search.
- Left Sidebar: Indicators, Transducers, Sirens, Microphones, Piezo Benders, Speakers.
- Center: "Innovating Sound Solutions for over 50 years" with a stylized atomic logo.
- Right Sidebar: "Experience the PUI Difference" (describing PUI as a world-class supplier for commercial, medical, fire/safety, and industrial applications) and "New Global Agreement" (announcing a partnership with Digi-Key Corporation).
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Application & Design Engineering Support



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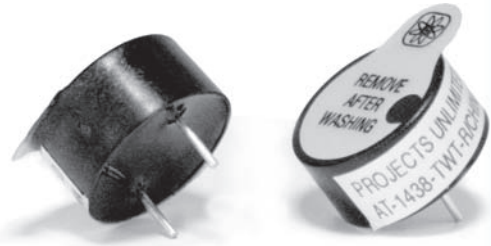
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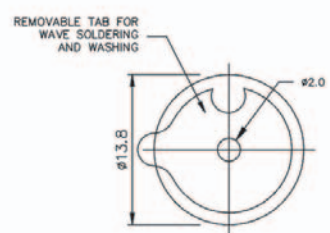
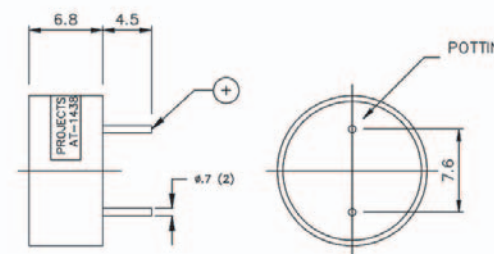
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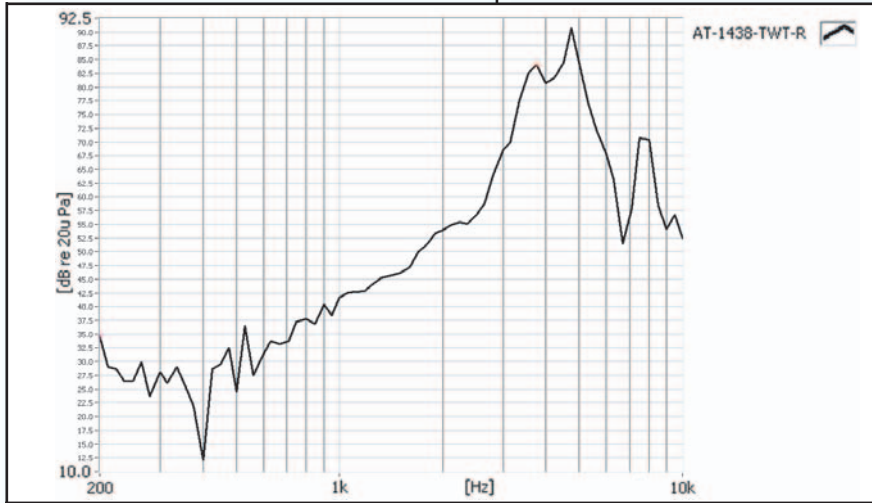
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TRANSDUCERS (PIEZO)



Part Number	Rated Vp-p	Voltage Range (Vp-p)	Rated Current (mA)	SPL Min. (10cm)	Res Freq (KHz)	Operating Temp.(C°)	Washable
AT-1438-TWT-R	5	1 - 20	1	80	3.8±0.5	-30 ~ +80	Yes

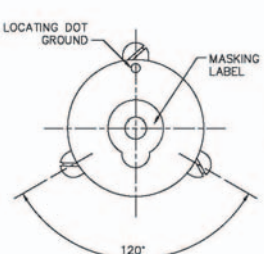
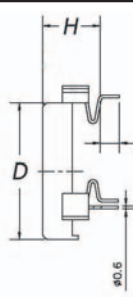
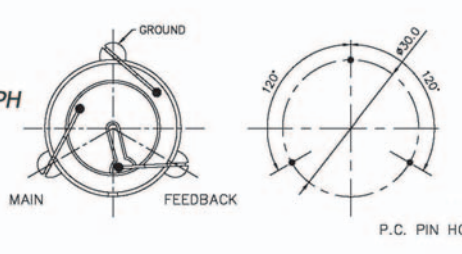



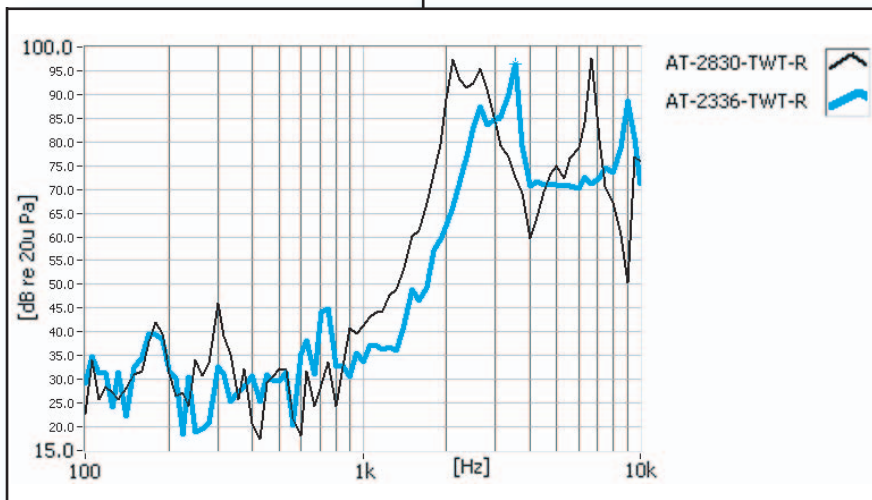


Piezo Transducers require an AC signal (0-peak voltage) to operate and are manufactured using a piezo ceramic bender to produce sound.

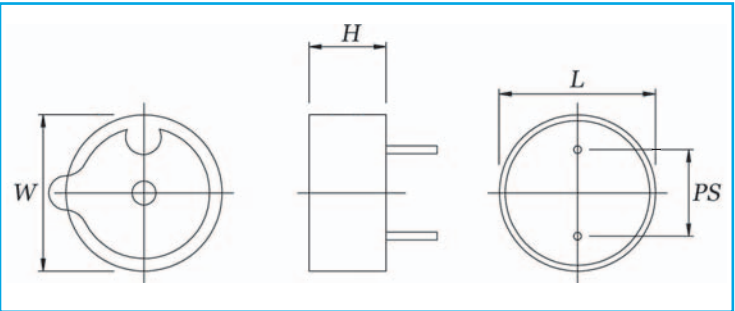


Part Number	Rated Vp-p	Voltage Range (Vp-p)	Rated Current (mA)	SPL Min. (10cm)	Res Freq (KHz)	Washable	D (mm)	H (mm)	PH (mm)
AT-2830-TWT-R	12	3 - 28	8	93	3.0±0.5	Yes	28.5	12.7	3.5
AT-2336-TWT-R	12	3 - 18	8	90	3.6±0.5	Yes	22.5	12	4



- Low Power Consumption
- High Reliability
- Lower Cost

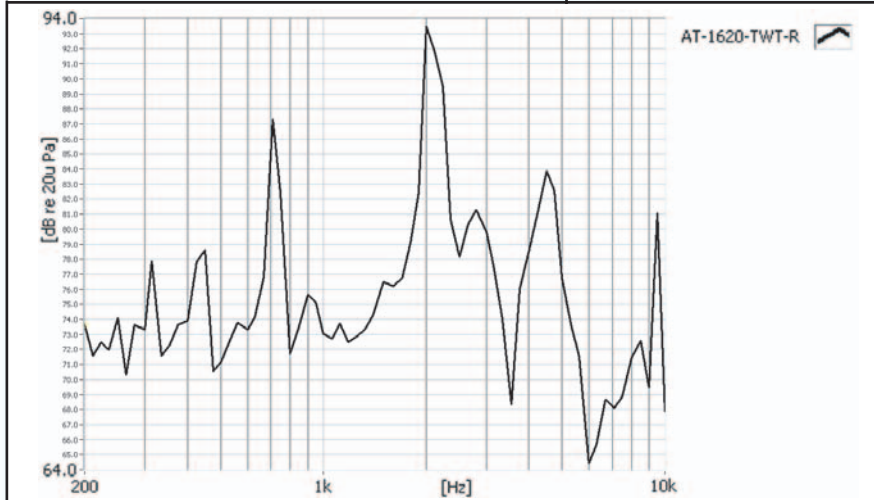


Thru Hole										
Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res Freq (KHz)	SPL Min (10cm)	Volt Range (Vp-p)	Rated (Vp-p)	Firing Type	Washable
AT-2720-ST-R	26.5	22	7	12.5	2.0 ± 0.5	70	1 - 25	3	Side	No
AT-2532-ST-R	25	24	10	12.5	3.2 ± 0.5	90	5 - 24	10	Side	No
AT-1340-TT-R	6.3	12.8	12.8	5	4.0 ± 0.5	80	1 - 30	5	Top	Yes
AT-1436-TWT-R	6.8	13.8	13.8	7.6	3.6 ± 0.5	80	1 - 20	5	Top	Yes
AT-1438-TWT-2-R	6.8	13.8	13.8	5	3.8 ± 0.5	80	1 - 20	5	Top	Yes
AT-1438-TWT-R	6.8	13.8	13.8	7.6	3.8 ± 0.5	80	1 - 20	5	Top	Yes
AT-1740-TT-3-R	6.7	16.5	16.5	11	4.0 ± 0.5	78	1 - 30	3	Top	No
AT-1740-TT-R	7	16.8	16.8	10	4.0 ± 0.5	78	1 - 30	5	Top	No
AT-1720-TT-R	8.6	17	17	10	2.0 ± 0.5	70	3 - 25	3	Top	No
AT-1830-TT-R	9	21.5	18	17.5	3.0 ± 0.5	88	1 - 30	10	Top	No
AT-2235-TT-R	8.2	22	22	10	3.5 ± 0.5	75	1 - 30	3	Top	No
AT-2250-T-LW50-R	4.5	22	22	N/A	5.0 ± 0.5	92	1 - 30	15	Top	No
AT-2336-TWT-R	6	22.5	22.5	N/A	3.6 ± 0.5	90	3 - 18	12	Top	Yes
AT-2720-TT-R	9	26.5	23	22.5	2.0 ± 0.5	88	1 - 30	10	Top	No
AT-2429-TWT-R	16	23.8	23.8	15	2.9 ± 0.5	90	2 - 30	12	Top	Yes
AT-2428-TWT-R	12.2	24	24	N/A	3.0 ± 0.5	92	3 - 28	12	Top	Yes
AT-2440-TWT-R	7.5	24	24	10	4.0 ± 0.5	80	1 - 30	3	Top	Yes
AT-2460-TWT-R	4.5	24	24	10	6.0 ± 0.5	85	1 - 30	10	Top	Yes
AT-2830-TWT-R	12.7	28.5	28.5	N/A	3.0 ± 0.5	93	3 - 28	12	Top	Yes
AT-3025-TT-2-R	10	30	30	15	2.5 ± 0.5	80	1 - 30	3	Top	No
AT-3035-TT-R	12	30	30	N/A	3.5 ± 0.5	90	1.5 - 24	12	Top	No
AT-3037-TT-R	12.1	30	30	N/A	3.7 ± 0.5	90	3 - 18	12	Top	No
AT-3320-TT-R	7.5	33	33	N/A	2.0 ± 0.5	85	3 - 24	12	Top	No
AT-3425-TWT-R	11.5	33.6	33.6	N/A	2.5 ± 0.5	85	3 - 28	12	Top	Yes
AT-3934-TT-CS-R	20	39	39	N/A	3.4 ± 0.5	92	6 - 18	9	Top	No
AT-4228-TWT-F-R	14	42	42	N/A	2.8 ± 0.5	92	3 - 28	12	Top	Yes
AT-5210-TT-R	15.4	54.6	54.6	N/A	1.0 ± 0.2	105	1 - 60	18	Top	No
Panel Mount										
AT-4328-P-R	33	43	43	33	2.8 ± 0.5	95	1 - 20	12	Top	Yes
Flange										
AT-2460-TF-LW100-R	4	34	24	N/A	6.0 ± 0.5	88	1 - 30	10	Top	No
AT-3045-TF-LW110-R	5.1	44.5	30	N/A	4.5 ± 0.5	97	1 - 50	10	Top	No
AT-3237-TF-LW140-R	13.5	44	32	N/A	3.7 ± 0.5	98	3 - 28	12	Top	No
AT-3311-TF-LW110-R	9	34.5	34.5	N/A	1.1 ± 0.5	86	1 - 30	5	Top	No
AT-4228-TF-LW145-R	16	60	41.8	N/A	2.8 ± 0.5	95	1 - 30	5	Top	No
AT-4230-TF-LW135-R	16	60	41.8	N/A	3.0 ± 0.5	96	1 - 30	10	Top	No
Miscellaneous										
AT-1348-TF-LW90-R	2.5	13	13	N/A	4.8 ± 0.5	80	1 - 30	10	Top	No
AT-1750-TFL-LW95-R	4	16.5	16.5	N/A	5.0 ± 0.5	80	1 - 30	10	Top	No
AT-1740-T-LW100-R	4	17	17	N/A	4.0 ± 0.5	78	1 - 30	3	Top	No
AT-1740-T-LW65-R	4	17	17	N/A	4.0 ± 0.5	88	1 - 30	9	Top	No

TRANSDUCERS (ELECTRO-MECHANICAL) www.pui.com/apd



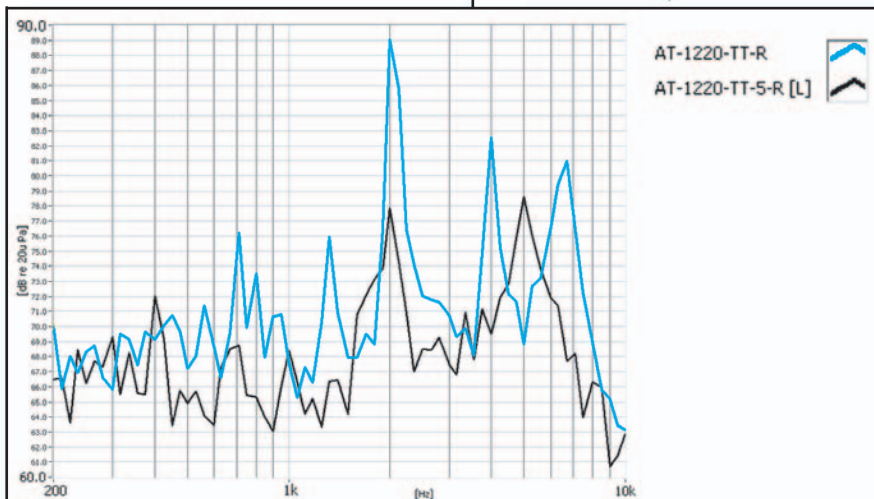
Part Number	Rated Vp-p	Voltage Range (Vp-p)	Rated Current (mA)	SPL Min. (10cm)	Res Freq (KHz)	Operating Temp(C°)	Washable
AT-1620-TWT-R	6	4 - 8	40	85	2.0±0.5	-20 ~ +70	Yes



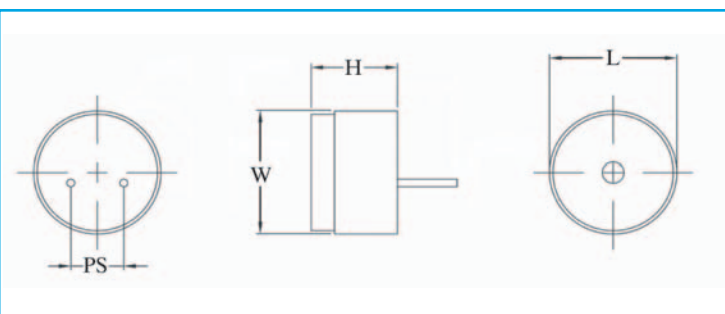
Electro-Mechanical Transducers require an AC signal (0-peak voltage) to operate and are manufactured using a coil along with a metal diaphragm to produce sound.



Part Number	Rated Vp-p	Voltage Range (Vp-p)	Rated Current (mA)	SPL Min. (10cm)	Resonant Freq. (KHz)	Operating Temp(C°)	Washable	Height (mm)
AT-1220-TT-R	1.5	1 - 3	10	85	2.0±0.5	-20 ~ +70	No	8.5
AT-1220-TT-5-R	1.5	1 - 3	10	73	2.0±1.0	-20 ~ +70	No	5.5

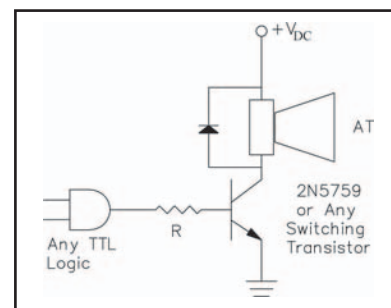
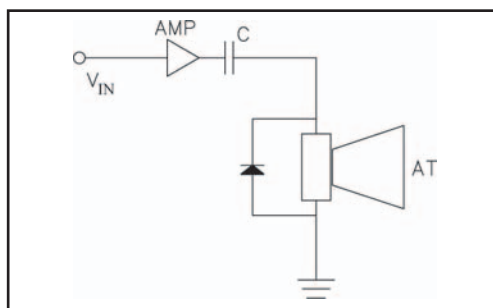
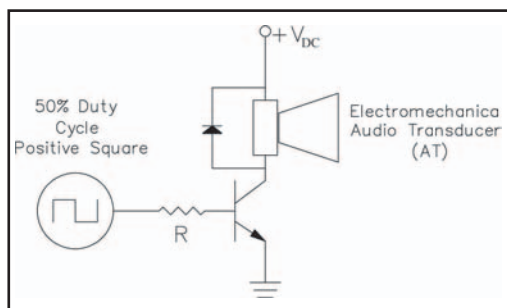


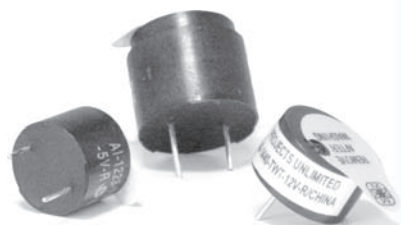
- P.C. Board Mounting
- Lower Resonant Frequency
- Wave Solderable



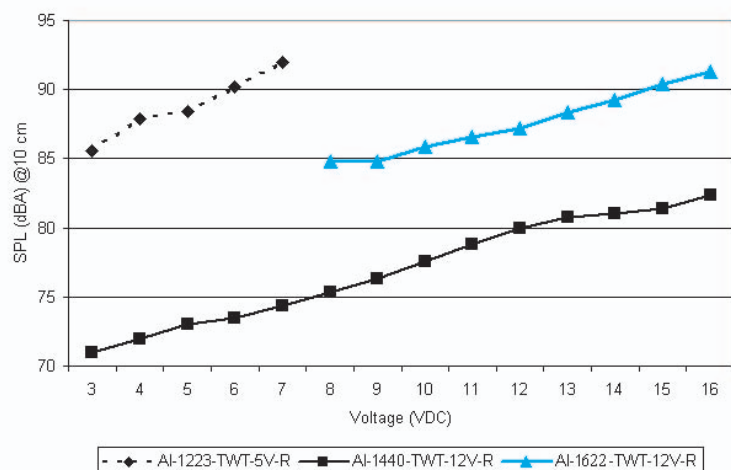
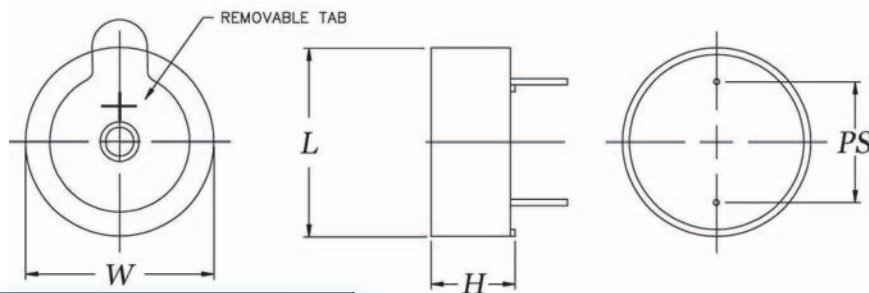
Thru Hole										
Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res Freq (Khz)	SPL Min (10cm)	Volt Range (Vp-p)	Rated (Vp-p)	Firing Type	Washable
AT-0927-TT-2-R	4	9	9	4	2.7 ± 0.5	86	2 - 4	3	Top	No
AT-1031-TT-R	6.5	9.6	9.6	4	3.1 ± 0.5	85	1 - 3	1.5	Top	No
AT-1220-TT-5-R	5.5	12	12	6.5	2.0 ± 0.1	73	1 - 3	1.5	Top	No
AT-1220-TWT-5V-R	9.5	12	12	6.5	2.0 ± 0.2	85	3 - 8	5	Top	Yes
AT-1220-TT-2-R	5.5	12	12	6.5	2.0 ± 0.5	75	1 - 3	1.5	Top	No
AT-1220-TT-3-R	5.5	12	12	6.5	2.0 ± 0.5	73	1 - 3	1.5	Top	No
AT-1220-TT-R	8.5	12	12	6.5	2.0 ± 0.5	85	1 - 3	1.5	Top	No
AT-1420-ST-2-R	7.5	13.8	12	6.5	2.0 ± 0.5	80	1 - 3	1.5	Side	No
AT-1420-ST-R	7.5	13.8	12	6.5	2.0 ± 0.5	80	1 - 3	1.5	Side	No
AT-1224-TWT-12V-R	9.5	12	12	6.5	2.4 ± 0.5	85	6 - 15	12	Top	Yes
AT-1224-TWT-4-R	9	12	12	6.5	2.4 ± 0.5	85	6 - 15	12	Top	Yes
AT-1224-TWT-R	9	12	12	6.5	2.4 ± 0.5	85	3 - 8	5	Top	Yes
AT-1427-ST-R	7.5	13.8	12	6.5	2.7 ± 0.5	88	1 - 3	1.5	Side	No
AT-1228-TT-R	10	12	12	6.5	2.8 ± 0.5	85	1 - 1.7	1.5	Top	Yes
AT-1820-TWT-1V-R	11	18	14	6.5	2.0 ± 0.5	85	1 - 2	1.5	Top	Yes
AT-1820-TWT-6V-R	11	18	14	6.5	2.0 ± 0.5	85	3 - 10	6	Top	Yes
AT-1425-TWT-R	11	14	14	5	2.5 ± 0.2	85	1 - 3	1.5	Top	Yes
AT-1620-TWT-12V-R	14	16	16	7.6	2.0 ± 0.5	85	9 - 15	12	Top	Yes
AT-1620-TWT-2-R	14	16	16	7.6	2.0 ± 0.5	80	1 - 3	1.5	Top	Yes
AT-1620-TWT-R	14	16	16	7.6	2.0 ± 0.5	85	4 - 8	6	Top	Yes
Miscellaneous										
AWT-4703-R	15.5	46.5	46.5	N/A	2.0 ± 0.5	100	1 - 30	12	Top	No

Audio transducers require driver circuits to operate. Below are some examples of basic drive circuits for electromechanical transducers.





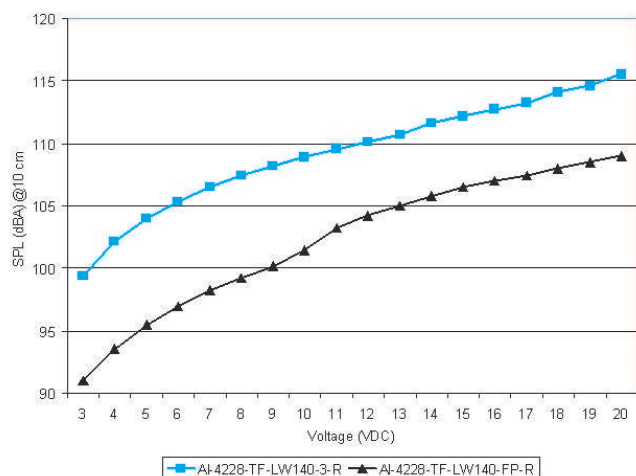
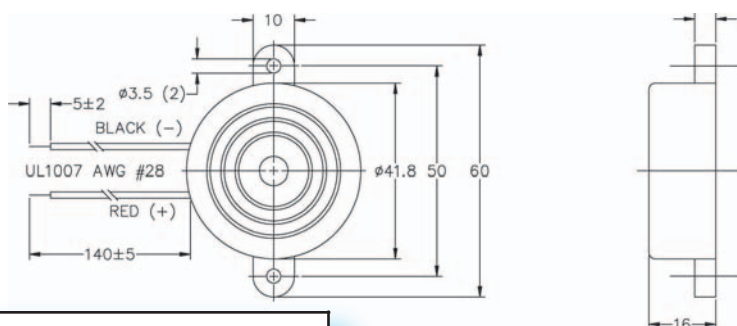
Part Number	Rated Vdc	Voltage Range (Vdc)	SPL Min. (10cm)	Resonant Freq. (KHz)	Tone Rate	H (mm)	W (mm)	L (mm)	PS (mm)	Washable
AI-1223-TWT-5V-R	5	3 - 7	85	2.3±0.3	Cont.	9.5	12	12	7.6	Yes
AI-1440-TWT-12V-R	12	3 - 16	80	4.0±0.5	Cont.	7.5	13.8	13.8	7.6	Yes
AI-1622-TWT-12V-R	12	8 - 15	85	2.2±0.3	Cont.	14	16	16	7.6	Yes



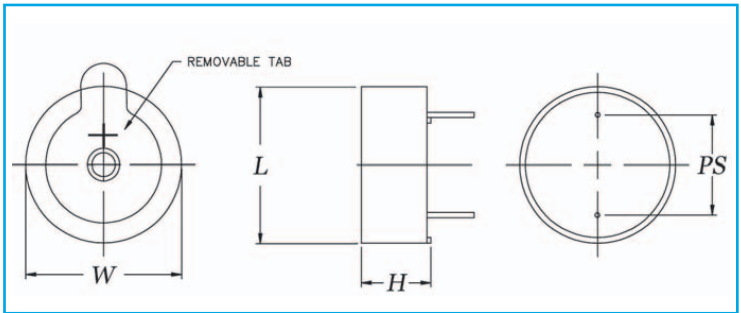
Audio Indicators have built-in electronics to provide siren, pulsating or continuous tones when DC voltage is applied.



Part Number	Rated Vdc	Voltage Range (Vdc)	Rated Current (mA)	SPL Min. (10cm)	Resonant Freq. (KHz)	Tone Rate	Operating Temp(C°)	Washable
AI-4228-TF-LW140-3-R	12	3 - 20	10	106	2.8±0.5	Cont.	-20 ~ +60	No
AI-4228-TF-LW140-FP-R	12	3 - 20	10	98	2.8±0.5	Fast	-20 ~ +60	No

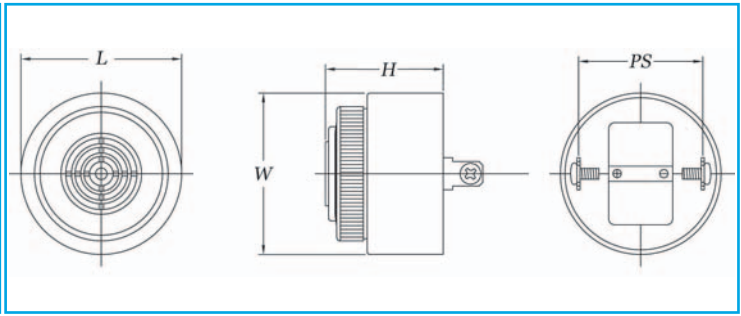


- Built-In Drive Circuits
- Different Tones Available
- Multiple Mounting Types

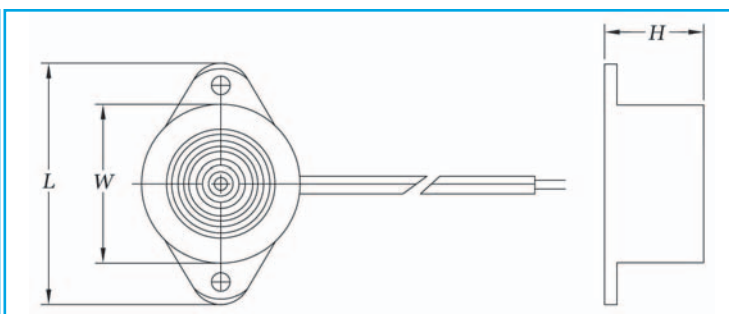
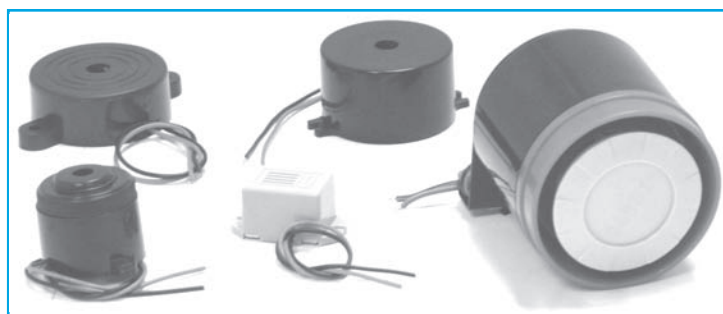


Thru Hole												
Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res Freq (Khz)	Tone	SPL Min (10cm)	Voltage Range	Rated Voltage	Firing Type	Washable	
AI-1027-TWT-3V-R	5	9.5	9.5	5	2.7 ± 0.2 Hz	Cont	80	2 - 5	3 Vdc	Top	Yes	
AI-1027-TWT-5V-R	5	9.5	9.5	5	2.7 ± 0.2 Hz	Cont	80	3 - 8	5 Vdc	Top	Yes	
AI-1027-TWT-12V-R	5	9.5	9.5	5	2.7 ± 0.3 Hz	Cont	85	7 - 15	12 Vdc	Top	Yes	
AI-1223-TWT-5V-R	9.5	12	12	7.6	2.3 ± 0.3 Hz	Cont	85	3 - 7	5 Vdc	Top	Yes	
AI-1223-TWT-12V-R	9.5	12	12	7.6	2.3 ± 0.4 Hz	Cont	85	8 - 16	12 Vdc	Top	Yes	
AI-1223-TWT-5V-2-R	7.5	12	12	7.6	2.3 ± 0.4 Hz	Cont	85	3 - 7	5 Vdc	Top	Yes	
AI-1223-TWT-2-R	7.5	12	12	7.6	2.3 ± 0.5 Hz	Cont	80	1.2 - 3	1.5 Vdc	Top	Yes	
AI-1433-TWT-R	7.5	13.8	13.8	7.6	3.3 ± 0.3 Hz	Cont	80	3 - 18	12 Vdc	Top	Yes	
AI-1440-TWT-12V-R	7.5	13.8	13.8	7.6	4.0 ± 0.5 Hz	Cont	80	3 - 16	12 Vdc	Top	Yes	
AI-1440-TWT-24V-2-R	7.5	13.8	13.8	7.6	4.0 ± 0.5 Hz	Cont	87	6 - 30	24 Vdc	Top	Yes	
AI-1622-TWT-12V-R	14	16	16	7.6	2.2 ± 0.3 Hz	Cont	85	8 - 15	12 Vdc	Top	Yes	
AI-1622-TWT-5V-R	14	16	16	7.6	2.2 ± 0.3 Hz	Cont	85	4 - 8	5 Vdc	Top	Yes	
AI-2304-TT-12V-R	14.5	17	22.5	7.6	0.4 ± 0.1 Hz	Cont	81	9 - 15	12 Vdc	Top	No	
AI-2304-TT-24V-R	14	17	22.5	7.6	0.4 ± 0.1 Hz	Cont	81	15 - 27	24 Vdc	Top	No	
AI-2331-TWT-2-R	10.2	23.3	23.3	15	3.2 ± 0.5 Hz	Cont	85	3 - 20	12 Vdc	Top	Yes	
AI-2332-TWT-12V-R	10.2	23.3	23.3	17.5	3.2 ± 0.5 Hz	Cont	85	3 - 20	12 Vdc	Top	Yes	
AI-2331-TWT-R	9.7	23.4	23.4	15	3.1 ± 0.5 Hz	Cont	85	3 - 20	12 Vdc	Top	Yes	
AI-2332-TWT-12V-2-R	9.7	23.4	23.4	17.5	3.2 ± 0.5 Hz	Cont	85	3 - 20	12 Vdc	Top	Yes	
AI-2429-TT-12V-R	16	23.8	23.8	15	2.9 ± 0.5 Hz	Cont	95	3 - 20	12 Vdc	Top	No	
AI-2429-TWT-12V-2-R	16	23.8	23.8	15	2.9 ± 0.5 Hz	Cont	100	3 - 20	12 Vdc	Top	Yes	
AI-2429-TWT-12V-3-R	16	23.8	23.8	15	2.9 ± 0.5 Hz	Cont	95	3 - 20	12 Vdc	Top	Yes	
AI-2429-TWT-12V-4-R	16	23.8	23.8	15	2.9 ± 0.5 Hz	Cont	95	3 - 20	12 Vdc	Top	Yes	
AI-2429-TWT-3P-R	16	23.8	23.8	15	2.9 ± 0.5 Hz	Cont	90	3 - 24	12 Vdc	Top	Yes	
AI-2429-TWT-R	16	23.8	23.8	15	2.9 ± 0.5 Hz	Cont	100	3 - 20	12 Vdc	Top	Yes	
AI-2429-TWT-2-R	16	24	24	15	2.9 ± 0.5 Hz	Cont	95	8 - 18	12 Vdc	Top	Yes	
AI-2532-ST-R	25	10	24	12.5	3.2 ± 0.5 Hz	Cont	90	3.3 - 24	12 Vdc	Side	No	
AI-2437-TWT-R	18	24	24	15	3.7 ± 0.5 Hz	Cont	100	3 - 16	12 Vdc	Top	Yes	
AI-2438-TT-R	17.2	24	24	15	3.8 ± 0.5 Hz	Cont	95	8 - 18	12 Vdc	Top	No	
AI-2604-TT-R	19.7	26	26	19	0.4 ± 0.1 Hz	Cont	95	8 - 16	12 Vdc	Top	No	
X-2629-TWT-R	22.8	25	26	15	2.9 ± 0.5 Hz	Cont	107	5 - 14	12 Vdc	Top	Yes	
AI-2828-TT-6V-R	20	28	28	14	2.8 ± 0.2 Hz	Cont	100	4 - 9	6 Vdc	Top	No	
AI-3018-TWT-R	17.5	30	30	15	1.8 ± 0.5 Hz	Cont	87	3 - 28	12 Vdc	Top	Yes	
AI-3035-TT-R	19.5	30	30	15	3.5 ± 0.5 Hz	Cont	100	3 - 20	12 Vdc	Top	No	
AI-3035-TWT-3V-R	20	30	30	15	3.5 ± 0.5 Hz	Cont	100	2 - 5	3 Vdc	Top	Yes	
AI-3039-TWT-12V-R	20	30	30	15	3.9 ± 0.5 Hz	Cont	100	3 - 24	12 Vdc	Top	Yes	
AI-4033-TWT-R	8.1	40	40	25.4	3.3 ± 0.5 Hz	Cont	95	3 - 20	12 Vdc	Top	Yes	
AI-4228-TWT-R	14	42	42	25.4	2.8 ± 0.5 Hz	Cont	99	3 - 28	12 Vdc	Top	Yes	
X-4328-TT-R	14	43	43	25.4	2.8 ± 0.5 Hz	Cont	108	3 - 20	9 Vdc	Top	No	
AI-5025-TWT-R	29	50	50	22	2.5 ± 0.5 Hz	Cont	115	5 - 13	12 Vdc	Top	Yes	

Cont.=Continuous ● Slow=Slow Pulse ● Fast=Fast Pulse ● Siren=Siren



Panel Mount											
Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res. Freq. (Khz)	Tone	SPL Min (10cm)	Voltage Range	Rated Voltage	Firing Type	Washable
AI-3622-P-S15-R	32	36	36	25.5	2.2 ± 0.3	Siren	105	5 - 15	9 Vdc	Top	IP67
AI-3622-P-S-12V-R	35.5	36	36	25.5	2.2 ± 0.5	Siren	105	3 - 18	12 Vdc	Top	IP67
AI-3622-P-S-28V-R	35.5	36	36	25.5	2.2 ± 0.5	Siren	105	6 - 28	28 Vdc	Top	IP67
AI-3629-P-30V-R	25.5	36	36	25.5	2.9 ± 0.5	Cont	100	5 - 32	30 Vdc	Top	IP67
AI-3629-P-FP-100V-R	35.5	36	36	25.5	2.9 ± 0.5	Fast	105	25 - 130	110 Vac	Top	IP67
AI-3736-P-C28-R	23.5	36.5	36.5	23	3.6 ± 0.5	Cont	90	4 - 28	12 Vdc	Top	No
AI-4028-P-SP32-R	23	40	40	25.5	2.8 ± 0.5	Slow	98	3 - 32	12 Vdc	Top	IP67
X-4035-P-FP32-R	23	40	40	25.7	2.8 ± 0.5	Fast	95	3 - 32	32 Vdc	Top	No
X-4028-P-C32-R	23	40	40	26	2.8 ± 0.5	Cont	105	3 - 32	32 Vdc	Top	No
AI-4228-S-C28-R	14.5	42	42	10	2.9 ± 0.5	Cont	88	4 - 28	12 Vdc	Top	No
AI-4228-S-FP16-R	14.5	42	42	10	2.9 ± 0.5	Fast	88	6 - 16	12 Vdc	Top	No
AI-4228-S-SP16-R	14.5	42	42	10	2.9 ± 0.5	Slow	88	6 - 16	12 Vdc	Top	No
AI-4230-S-C24-R	20.5	42	42	10	2.9 ± 0.5	Cont	95	1 - 28	24 Vdc	Top	No
AI-4219-P-C28-R	32.5	42.5	42.5	33	1.9 ± 0.5	Cont	81	6 - 28	12 Vdc	Top	IP67
AI-4219-P-C48-R	32.5	42.5	42.5	33	1.9 ± 0.5	Cont	81	10 - 48	24 Vdc	Top	IP67
AI-4228-P-C120-R	32.5	42.5	42.5	33	2.8 ± 0.5	Cont	92	30 - 120	110 Vac/Vdc	Top	IP67
AI-4228-P-C250-R	42	42.5	42.5	33	2.8 ± 0.5	Cont	94	60 - 250	220 Vac/Vdc	Top	IP67
AI-4228-P-C28D-R	32.5	42.5	42.5	33	2.8 ± 0.5	Cont	90	6 - 28	12 Vac/Vdc	Top	IP67
AI-4228-P-C28-R	32.5	42.5	42.5	33	2.8 ± 0.5	Cont	88	6 - 28	12 Vdc	Top	IP67
AI-4228-P-C48-R	32.5	42.5	42.5	33	2.8 ± 0.5	Cont	86	10 - 48	12 Vdc	Top	IP67
AI-4228-P-FP120-R	32.5	42.5	42.5	33	2.8 ± 0.5	Fast	92	30 - 120	110 Vac/Vdc	Top	IP67
AI-4228-P-FP250-R	42	42.5	42.5	33	2.8 ± 0.5	Fast	94	60 - 250	220 Vac/Vdc	Top	IP67
AI-4228-P-FP28D-R	32.5	42.5	42.5	33	2.8 ± 0.5	Fast	90	6 - 28	12 Vac/Vdc	Top	IP67
AI-4228-P-FP28-R	32.5	42.5	42.5	33	2.8 ± 0.5	Fast	88	6 - 28	12 Vdc	Top	IP67
AI-4228-P-SP120-R	32.5	42.5	42.5	33	2.8 ± 0.5	Slow	92	30 - 120	110 Vac/Vdc	Top	IP67
AI-4228-P-SP250-R	42	42.5	42.5	33	2.8 ± 0.5	Slow	94	60 - 250	220 Vac/Vdc	Top	IP67
AI-4228-P-SP28D-R	32.5	42.5	42.5	33	2.8 ± 0.5	Slow	90	6 - 28	12 Vac/Vdc	Top	IP67
AI-4228-P-SP28-R	32.5	42.5	42.5	33	2.8 ± 0.5	Slow	88	6 - 28	12 Vdc	Top	IP67
AI-4328-P-C28-R	33	42.5	42.5	33	2.8 ± 0.5	Cont	91	4 - 28	12 Vdc	Top	IP67
AI-4328-P-FP250-R	42	42.5	42.5	33	2.8 ± 0.5	Fast	91	60 - 250	220 Vac/Vdc	Top	IP67
AI-4228-P-C18-R	32.5	42.5	42.5	33	2.9 ± 0.5	Cont	108	7 - 18	12 Vdc	Top	IP67
AI-4228-P-CH16-R	32.5	42.5	42.5	33	2.9 ± 0.5	Chime	86	6 - 16	12 Vdc	Top	IP67
AI-4228-P-FP18-R	32.5	42.5	42.5	33	2.9 ± 0.5	Fast	108	7 - 18	12 Vdc	Top	IP67
AI-4228-P-SP18-R	32.5	42.5	42.5	33	2.9 ± 0.5	Slow	108	7 - 18	12 Vdc	Top	IP67
AI-4328-P-C120D-R	33	43	43	33	2.8 ± 0.5	Cont	98	30 - 120	110 Vac/Vdc	Top	IP67
AI-4328-P-C28-2-R	33	43	43	33	2.8 ± 0.5	Cont	97	4 - 28	12 Vdc	Top	IP67
AI-4329-P-FP28-R	33	43	43	33	2.9 ± 0.5	Fast	88	6 - 28	12 Vdc	Top	IP67
AI-4329-P-SP28-R	33	43	43	33	2.9 ± 0.5	Slow	88	4 - 28	12 Vdc	Top	IP67
AI-4429-P-C12-R	34.5	43.5	43.5	30	2.9 ± 0.5	Cont	105	1 - 16	12 Vdc	Top	IP67
AI-4429-P-CP12-R	34.5	43.5	43.5	33	2.9 ± 0.5	Mult	100	4 - 16	12 Vdc	Top	IP67
X-5328-P-C-LW165-R	31	53	53	N/A	2.8 ± 0.5	Cont	103	3 - 12	6 Vdc	Top	No

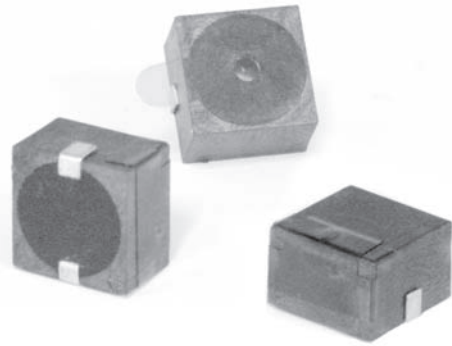


Flange											
Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res Freq (Khz)	Tone	SPL Min (10cm)	Voltage Range	Rated Voltage	Firing Type	Washable
AI-2304-TF-LW120-12V-R	15.5	17	22.8	N/A	0.4 ± 0.1	Cont	89	8 - 16	12 Vdc	Top	No
AI-2304-TF-LW120-R	15.5	17	23	N/A	0.4 ± 0.1	Cont	86	20 - 28	24 Vdc	Top	No
AI-2304-TF-LW120-5V-R	15.5	17	23	N/A	0.4 ± 0.1	Cont	75	3 - 6	4.5 Vdc	Top	No
AI-3025-TF-LW80-R	16	30	30	N/A	2.5 ± 0.5	Cont	100	3 - 28	12 Vdc	Top	No
AI-3245-TF-LW95-R	10.8	22	32	N/A	4.5 ± 0.5	Cont	90	3 - 28	12 Vdc	Top	No
AI-2337-TF-LW115-R	17	23	33	N/A	3.7 ± 0.5	Cont	100	3 - 16	12 Vdc	Top	No
AI-2604-TF-LW115-12V-R	16.2	26	39	N/A	0.4 ± 0.1	Cont	89	8 - 16	12 Vdc	Top	No
AI-2604-TF-LW115-24V-R	16.2	26	39	N/A	0.4 ± 0.1	Cont	92	20 - 28	24 Vdc	Top	No
AI-2835-TF-LW150-3-R	25	28	39.5	N/A	3.5 ± 0.5	Cont	100	3 - 28	12 Vdc	Top	No
AI-2835-TF-LW254-R	25	28	39.5	N/A	3.5 ± 0.5	Cont	100	3 - 28	12 Vdc	Top	No
XL-2835-TF-FP-LW150-R	25.4	28	39.5	N/A	3.5 ± 0.5	Fast	92	4 - 28	12 Vdc	Top	No
XL-2835-TF-LW150-R	25.4	28	39.5	N/A	3.5 ± 0.5	Cont	95	3 - 28	12 Vdc	Top	No
AI-3238-TF-LW140-R	13.5	32	44	N/A	3.8 ± 0.5	Cont	106	3 - 20	12 Vdc	Top	No
X-4032-TF-LW105-R	23	40	50	N/A	3.2 ± 0.5	Cont	97	15 - 130	90 Vdc	Top	No
X-4033-TF-LW80-R	23	40	50	N/A	3.3 ± 0.5	Cont	106	1.5 - 12	6 Vdc	Top	No
X-5030-TF-LW150-R	38	50	50	N/A	Siren	Siren	115	6 - 16	12 Vdc	Top	No
AI-3135-TF-LW100-R	14	31	51.4	N/A	3.5 ± 0.5	Cont	105	3 - 20	9 Vdc	Top	No
AI-4228-TF-LW140-3-R	16	41.8	60	N/A	2.8 ± 0.5	Cont	106	3 - 20	12 Vdc	Top	No
AI-4228-TF-LW140-4-R	16	41.8	60	N/A	2.8 ± 0.5	Cont	95	3 - 28	12 Vdc	Top	No
AI-4228-TF-LW140-C-R	16	41.8	60	N/A	2.8 ± 0.5	Cont	106	1.5 - 20	12 Vdc	Top	No
AI-4228-TF-LW140-FP-R	16	41.8	60	N/A	2.8 ± 0.5	Fast	98	3 - 20	12 Vdc	Top	No
AI-4228-TF-LW140-R	16	41.8	60	N/A	2.8 ± 0.5	Cont	105	3 - 20	12 Vdc	Top	No
AI-4228-TF-SP-LW145-R	16	41.8	60	N/A	2.8 ± 0.5	Slow	98	3 - 20	12 Vdc	Top	No
XL-5020-TF-LW150-S-R	37.5	50	70	N/A	Siren	Siren	110	3 - 16	12 Vdc	Top	No
Miscellaneous											
AI-1450-TW-LW80-WP-R	9.5	14	14	N/A	5.0 ± 0.5	Cont	90	9 - 16	12 Vdc	Top	IP67
X-4035-TFL-LW140-R	8.1	40	40	N/A	3.5 ± 0.5	Cont	99	3 - 20	12 Vdc	Top	No
XL-5530L-LW300-S-R	54.5	54.5	56	N/A	Siren	Siren	123	6 - 16	12 Vdc	N/A	No
XL-5530-LW300-S-R	54.5	54.5	56	N/A	Siren	Siren	123	6 - 16	12 Vdc	N/A	No
X-5735-LW350-SP-R	40	44.5	57.5	N/A	3.0 ± 0.5	Slow	115	7 - 15	12 Vdc	Side	No
X-5735-LW350-S-R	40	44.5	57.5	N/A	Siren	Siren	110	5 - 15	12 Vdc	Side	No

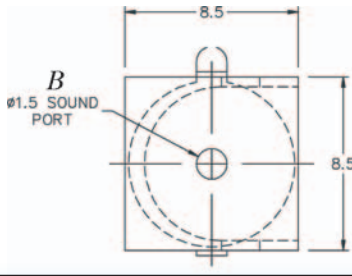
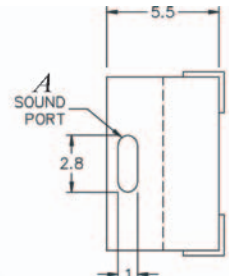
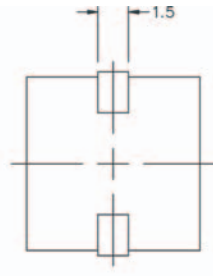


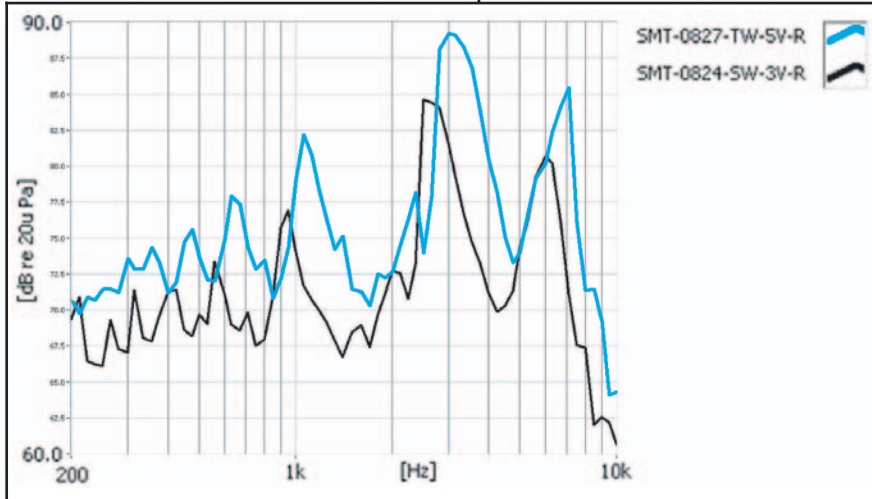
Projects Unlimited, Inc. offers a full line of audio products that includes our new Extreme Series product line. These products are designed to withstand even the harshest environments whether it is extreme hot, cold or wet conditions. This makes these products ideal for industrial, marine, safety and security applications. Contact your PUI representative or visit our website to learn more about these products.

SURFACE MOUNTS



Part Number	Rated Vp-p	Voltage Range (Vp-p)	Rated Current (mA)	Coil Resist. (Ω)	SPL Min. (10cm)	Resonant Freq. (KHz)	Port	Washable
SMT-0824-SW-3V-R	3.6	2.5 - 4.5	60	15 $\pm$ 3	80	2.4 $\pm$ 0.5	A	Yes
SMT-0827-SW-5V-R	5	4 - 6	80	30 $\pm$ 5	85	2.7 $\pm$ 0.5	A	Yes
SMT-0824-TW-5V-R	3.6	3 - 8	60	30 $\pm$ 5	80	2.4 $\pm$ 0.5	B	Yes

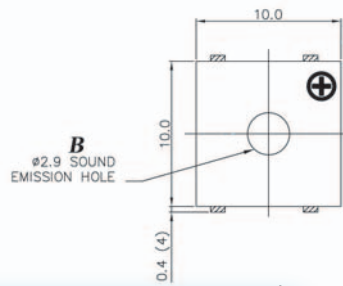
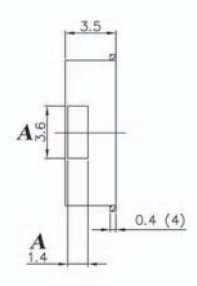
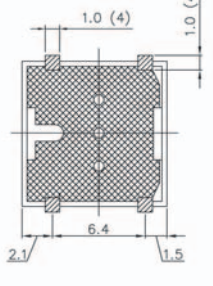




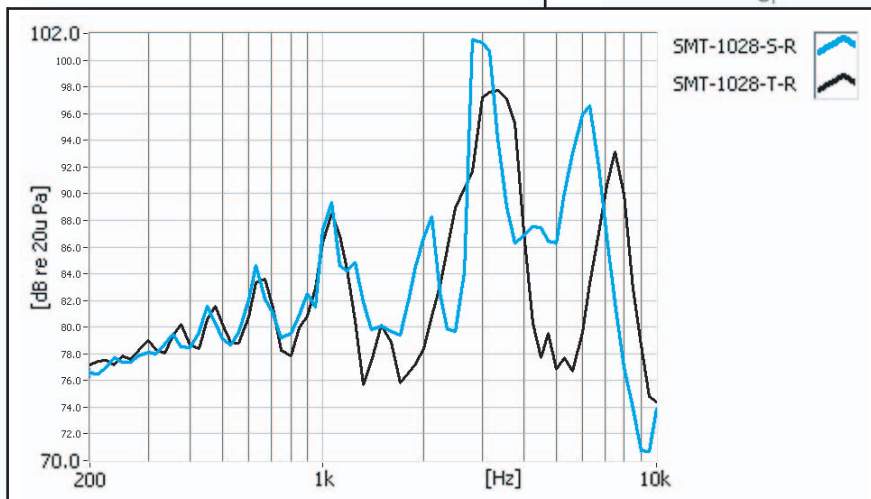


Surface Mount devices are smaller versions that are designed to be used with pick and place machines and reflow ovens.

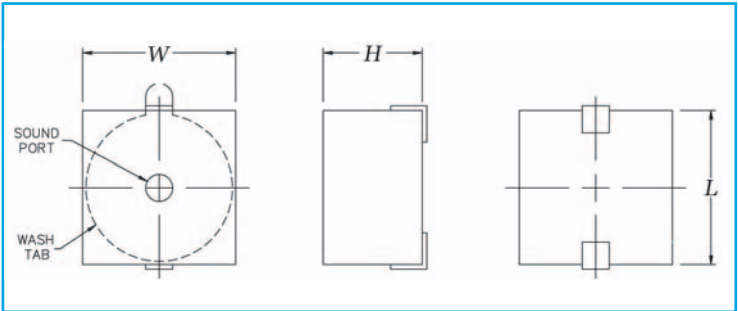


Part Number	Rated Vp-p	Voltage Range (Vp-p)	Rated Current (mA)	Coil Resist. (Ω)	SPL Min. (10cm)	Resonant Freq. (KHz)	Port	Washable
SMT-1028-S-R	3.6	3 - 4.6	100	18 $\pm$ 5	93	2.8 $\pm$ 0.5	A	No
SMT-1028-T-R	3.6	3 - 4.6	100	18 $\pm$ 5	90	2.8 $\pm$ 0.5	B	No

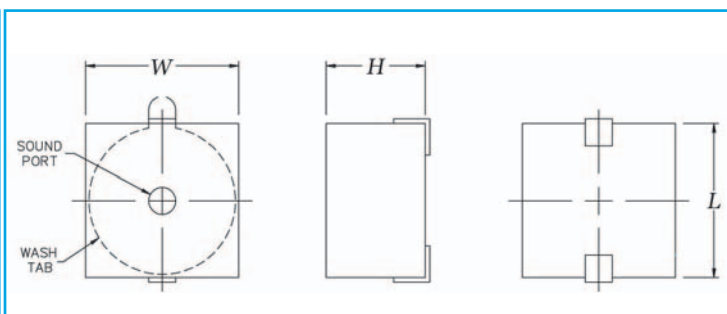


- Compact Size
- Top and Side Firing
- Tape and Reel Packaging



Surface Mount Electro-Mechanical Transducer

Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res Freq (Khz)	SPL Min (10cm)	Voltage Range (Vp-p)	Rated (Vp-p)	Firing Type	Washable
SMT-0540-S-R	2	5	5	N/A	4.0 ± 0.5	78	2 - 4	3	Side	No
SMT-0540-T-6-R	2	5	5	N/A	4.0 ± 0.5	78	2 - 4	3	Top	No
SMT-0540-T-2-R	3	5	5	N/A	4.0 ± 0.5	78	2 - 4	3	Top	No
SMT-0727-S-R	2	7.5	7.5	N/A	2.7 ± 0.5	85	2 - 5	3.6	Side	No
SMT-0827-S-R	2.5	7.5	7.5	N/A	2.7 ± 0.5	85	2.5 - 4.5	3.6	Side	No
SMT-0826-S-R	3	8	8	N/A	2.6 ± 0.5	90	2.5 - 4.5	3.6	Side	No
SMT-0820-S-R	4	8.5	8.5	N/A	2.0 ± 0.5	70	4 - 6	5	Side	No
SMT-0821-S-2-R	3	8.5	8.5	N/A	2.1 ± 0.5	85	2.5 - 4.5	3.6	Side	No
SMT-0821-S-R	4	8.5	8.5	N/A	2.1 ± 0.5	87	2.5 - 4.5	3.6	Side	No
SMT-0821-T-R	4	8.5	8.5	N/A	2.1 ± 0.5	87	2 - 5	3.6	Top	No
SMT-0823-S-R	4	8.5	8.5	N/A	2.3 ± 0.5	87	3 - 7	5	Side	No
SMT-0825-S-2-R	4	8.5	8.5	N/A	2.5 ± 0.5	87	2.5 - 4.5	3.6	Side	No
SMT-0825-S-4-R	3	8.5	8.5	N/A	2.5 ± 0.5	85	2.5 - 4.5	3.6	Side	No
SMT-0825-T-R	4	8.5	8.5	N/A	2.5 ± 0.5	87	2.5 - 4.5	3.6	Top	No
SMT-1025-S-R	3	10.2	8.5	N/A	2.5 ± 0.5	85	2.5 - 4.5	3.6	Side	No
SMT-0825-T-2-R	3	8.5	8.5	N/A	2.7 ± 0.5	85	2.5 - 4.5	3.6	Top	No
SMT-0827-S-2-R	4	8.5	8.5	N/A	2.7 ± 0.5	87	2.5 - 4.5	3.6	Side	No
SMT-0827-S-3-R	3	8.5	8.5	N/A	2.7 ± 0.5	85	2.5 - 4.5	3.6	Side	No
SMT-0927-S-6-R	3	8.5	8.5	N/A	2.7 ± 0.5	90	2 - 5	3.6	Side	No
SMT-1027-S-2-R	3	10.2	8.5	N/A	2.7 ± 0.5	87	2.5 - 4.5	3.6	Side	No
SMT-0836-S-R	4	8.5	8.5	N/A	3.6 ± 0.5	90	2 - 5	3.6	Side	No
SMT-0927-T-R	4.4	9	9	N/A	2.7 ± 0.2	85	2 - 4	3	Top	No
SMT-0927-S-3-R	4	9	9	N/A	2.7 ± 0.5	85	1 - 2	1.5	Side	No
SMT-0927-S-4-R	4	9	9	N/A	2.7 ± 0.5	85	2 - 4	3.6	Side	No
SMT-0927-S-5-R	4	9	9	N/A	2.7 ± 0.5	85	3 - 7	5	Side	No
SMT-1027-S-3-R	3	10	10	N/A	2.7 ± 0.5	85	2.5 - 4.5	3.6	Side	No
SMT-1027-S-R	3	10	10	N/A	2.7 ± 0.5	85	1 - 2	1.5	Side	No
SMT-1028-S-5V-R	3.5	10	10	N/A	2.8 ± 0.5	93	4 - 6	5	Side	No
SMT-1028-S-R	3.5	10	10	N/A	2.8 ± 0.5	93	3 - 4.6	3.6	Side	No
SMT-1028-T-R	3.5	10	10	N/A	2.8 ± 0.5	90	3 - 4.6	3.6	Top	No
SMT-1427-S-2-R	3	14	11	N/A	2.7 ± 0.5	85	1.2 - 1.7	1.5	Side	No
SMT-1427-S-3-R	3	14	11	N/A	2.7 ± 0.5	87	3 - 4.5	3	Side	No
SMT-1427-S-4-R	3	14	11	N/A	2.7 ± 0.5	87	4 - 7	5	Side	No
SMT-1427-S-R	3.4	14.2	11	N/A	2.7 ± 0.5	85	3 - 7	5	Side	No
SMT-1427-T-R	3.4	14.2	11	N/A	2.7 ± 0.5	85	3 - 7	5	Top	No
SMT-1220-TW-R	9	12	12	N/A	2.0 ± 0.2	80	2 - 5	3	Top	Yes
SMT-1224-TW-R	9	12	12	N/A	2.4 ± 0.2	80	1 - 3	1.5	Top	Yes
SMT-1324-TW-12V-R	6.5	12.5	12.5	N/A	2.4 ± 0.5	85	8 - 16	12	Top	Yes
SMT-1324-TW-1V-R	6.5	12.5	12.5	N/A	2.4 ± 0.5	80	1 - 3	1.5	Top	Yes
SMT-1324-TW-5V-R	6.5	12.5	12.5	N/A	2.4 ± 0.5	85	4 - 8	5	Top	Yes
SMT-1324-TW-R	10	12.8	12.8	N/A	2.4 ± 0.5	85	4 - 8	5	Top	Yes



Surface Mount Electro-Mechanical Transducers

Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res Freq (Khz)	SPL Min (10cm)	Voltage Range (Vp-p)	Rated (Vp-p)	Firing Type	Washable
SMT-0824-SW-3V-R	5.5	8.5	8.5	N/A	2.4 ± 0.2	80	2.5 - 4.5	3	Side	Yes
SMT-0824-TW-3V-R	5.5	8.5	8.5	N/A	2.4 ± 0.2	80	2 - 5	3	Top	Yes
SMT-0824-SW-5V-R	5.5	8.5	8.5	N/A	2.4 ± 0.2	80	3 - 8	5	Side	Yes
SMT-0824-TW-5V-R	5.5	8.5	8.5	N/A	2.4 ± 0.2	80	3 - 8	5	Top	Yes
SMT-0827-SW-3V-R	5.5	8.5	8.5	N/A	2.7 ± 0.2	85	2.5 - 4.5	3	Side	Yes
SMT-0827-TW-3V-R	5.5	8.5	8.5	N/A	2.7 ± 0.2	85	2 - 5	3	Top	Yes
SMT-0827-SW-5V-R	5.5	8.5	8.5	N/A	2.7 ± 0.2	85	3 - 8	5	Side	Yes
SMT-0827-TW-5V-R	5.5	8.5	8.5	N/A	2.7 ± 0.2	85	3 - 8	5	Top	Yes

Surface Mount Piezo Transducer

SMT-1341-T-R	2.5	12.8	12.8	N/A	4.1 ± 0.5	75	1 - 25	5	Side	No
SMT-1540-T-R	7.5	14.8	14.8	N/A	4.0 ± 0.5	80	1 - 25	5	Top	Yes
SMT-1640-S-R	2.5	16	16	N/A	4.0 ± 0.5	70	1 - 25	5	Side	No
SMT-1740-TW-R	6	17	17	N/A	4.0 ± 0.5	80	1 - 30	5	Side	No
SMT-2225-T-R	5.6	22	22	N/A	2.5 ± 0.5	80	1 - 30	10	Top	No
SMT-2240-TW-R	7	22.5	22.5	N/A	4.0 ± 0.5	90	1 - 30	10	Top	No

Surface Mount Indicator

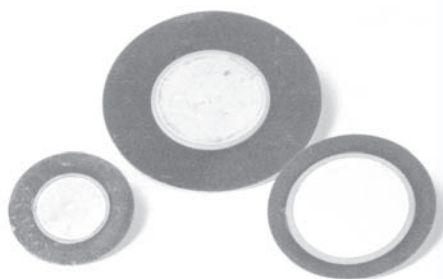
Part Number	H (mm)	W (mm)	L (mm)	PS (mm)	Res Freq (Khz)	Tone	SPL Min (10cm)	Voltage Range (Vp-p)	Rated (Vp-p)	Firing Type	Washable
SMI-1324-TW-5V-R	6.7	12.5	12.5	N/A	2.4 ± 0.3 Hz	Cont	85	4 - 7	5 Vdc	Top	Yes
SMI-1324-TW-3V-R	6.5	12.8	12.8	N/A	2.4 ± 0.4 Hz	Cont	75	2 - 5	3 Vdc	Top	Yes
SMI-1324-TW-5V-2-R	6.5	12.8	12.8	N/A	2.4 ± 0.4 Hz	Cont	88	4 - 7	5 Vdc	Top	Yes
SMI-1324-TW-12V-R	6.5	12.5	13.1	N/A	2.4 ± 0.3 Hz	Cont	85	8 - 15	12 Vdc	Top	Yes
SMI-1740-TW-12V-R	7.8	17	17	N/A	4.0 ± 0.5 Hz	Cont	83	3 - 20	12 Vdc	Top	Yes

Surface Mount Speaker

Part Number	Height (mm)	Width (mm)	Length (mm)	Power (Rated/Max (W))	Imp (Ω)	Cone Material	Res Freq (Hz)	Freq Range (Hz)
SMS-1508-2-R	5	15	15	0.3 / 0.5	8	Mylar	850	850 - 20000
SMS-1508MS-R	4	15	15	0.5 / 0.8	8	Mylar	800	500 - 10000

Surface Mount Microphone

Part Number	Sens (dB)	Imp (KΩ)	Operating Vdc	Terminal	Height (mm)	Length (mm)	Width (mm)
POS-1644R-C3310-2-R	-44	2.2	3	Surface Mount	1.6	6.4	6.4
POS-1644R-C3310-R	-44	2.2	3	Surface Mount	1.6	8.8	6.4
TOS-1844R-C3310-2-R	-44	2.2	2	Surface Mount	1.8	6.6	4.8
TOS-1844R-C3310-3-R	-44	2.2	3	Surface Mount	1.8	4.8	4.8
ROS-1442R-1033-R	-42	2.2	2.2	Surface Mount	1.5	4.5	4.5
TOS-1844R-C3310-R	-44	2.2	2	Surface Mount	1.8	4.8	4.8



Part Number	Res Freq (KHz)	Resonant Impedance (Max)(Ω)	Max Input Volt (Vp-p)	Capacitance (pF)($\pm 30\%$)	BD (mm)	CD (mm)	TT (mm)	BT (mm)
AB1541	4.1 $\pm$ 0.5	1,000	15	8,000	15	8.4	0.20	0.10
AB2040B	4.0 $\pm$ 0.5	350	30	25,000	20	15	0.28	0.15
AB2734B	3.4 $\pm$ 0.5	1,000	30	13,000	27	14.6	0.53	0.30

Part Number	Res Freq (KHz)	Max Input Volt (Vp-p)	Capacitance (pF) (+/-30%)	Feedback	Bender Diameter (mm)	Ceramic Diameter (mm)	Total Thickness (mm)	Bender Thickness (mm)
AB1070B	7.0 $\pm$ 0.6	15	10000	No	9.9	7.4	0.12	0.05
AB1290B	9.0 $\pm$ 0.5	30	8000	No	12	9	0.21	0.1
AB1541	4.1 $\pm$ 0.5	15	8000	No	15	8.4	0.2	0.1
AB1548B	4.8 $\pm$ 0.5	20	7500	No	15	8.9	0.21	0.09
AB1560B	6.0 $\pm$ 0.5	15	12000	No	15	11.4	0.21	0.1
AB2020B-2	2.0 $\pm$ 0.3	30	90000	No	20	15	0.1	0.05
AB2022A	2.2 $\pm$ 0.3	30	80000	No	20	15	0.1	0.05
AB2025B	2.5 $\pm$ 0.3	30	80000	No	20	15	0.1	0.05
AB2036AF	3.7 $\pm$ 0.5	30	20000	Yes	20	15	0.21	0.1
AB2036B	3.6 $\pm$ 0.5	30	25000	No	20	15	0.23	0.1
AB2040B	4.0 $\pm$ 0.5	30	25000	No	20	15	0.28	0.15
AB2065B	6.5 $\pm$ 0.5	30	14000	No	20	15	0.42	0.2
AB2720B	2.0 $\pm$ 0.5	30	45000	No	27	20	0.23	0.1
AB2726B	2.6 $\pm$ 0.5	30	50000	No	27	20	0.26	0.13
AB2734B	3.4 $\pm$ 0.5	30	13000	No	27	14.6	0.53	0.3
AB2745BF	4.5 $\pm$ 0.5	20	16000	Yes	27	20	0.51	0.25
AB2746B	4.6 $\pm$ 0.5	20	16000	No	27	20	0.5	0.25
AB3432F	3.2 $\pm$ 0.15	30	30000	Yes	34.6	25	0.63	0.27
AB3526B	2.6 $\pm$ 0.5	30	30000	No	35	25	0.53	0.25
AB3528B	2.8 $\pm$ 0.5	30	30000	No	35	25	0.56	0.3
AB3529BF	2.9 $\pm$ 0.5	30	25000	Yes	35	25	0.58	0.3
AB4113B	1.3 $\pm$ 0.5	30	150000	No	41	32	0.4	0.1
AB4129B-D	2.9 $\pm$ 0.5	20	200	No	41	29.5	0.42	0.11
AB4141B	4.1 $\pm$ 0.5	30	100000	No	41	25	0.32	0.2
APS4812B-LW100-R	1.2 $\pm$ 0.2	30	65000	No	50	44	2.2	2.2
APS4812B-R	1.2 $\pm$ 0.2	30	65000	No	50	44	2.2	2.2

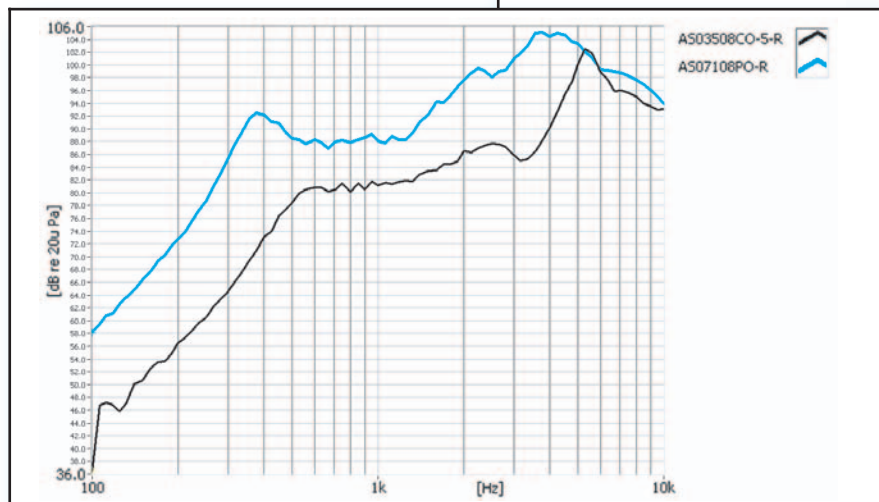
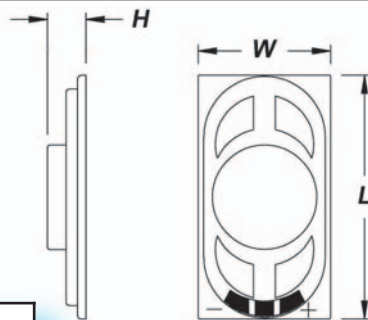
Piezo Benders are manufactured using a silver coated ceramic disc adhered onto a metal substrate that produces sound when an AC voltage is applied or produces an AC voltage when force is applied.

- Low Cost
- High Reliability
- Available in Brass, Stainless Steel or Nickel Alloy
- Can be supplied with wires, connectors, spring contacts, and/or, Double sided adhesive

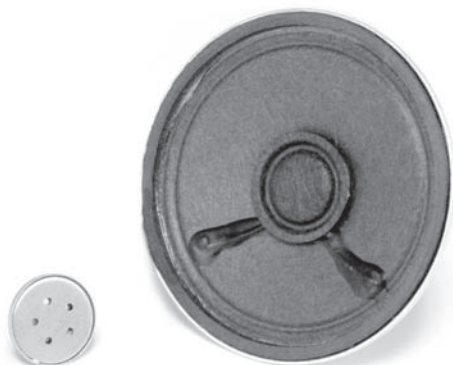
AUDIO SPEAKERS



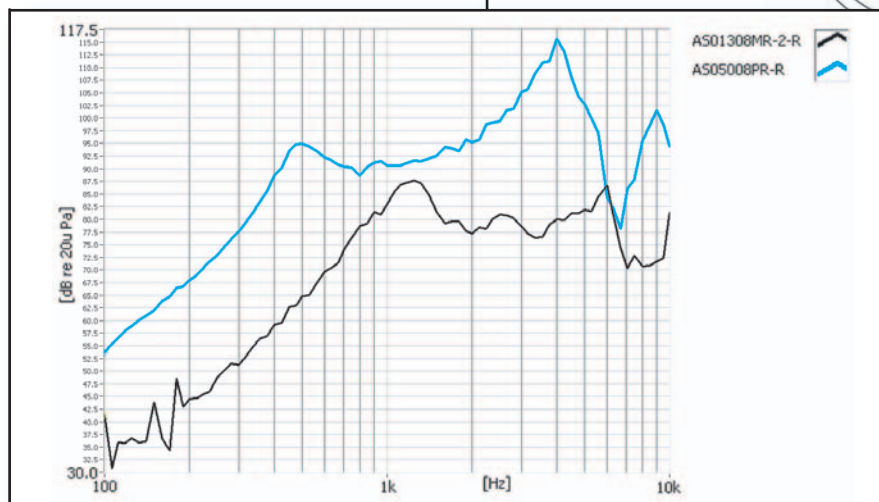
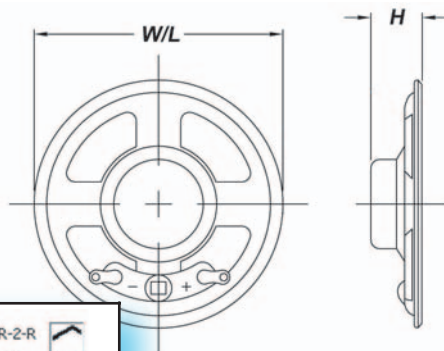
Part Number	Rated Power (Watts)	Max. Power (Watts)	Imped. (Ω)	Res Freq (KHz)	Washable	H (mm)	W (mm)	L (mm)
AS03508CO-5-R	1	2	$8 \pm 15\%$	$0.45 \pm 20\%$	No	5.5	19	35
AS07108PO-R	3	5	$8 \pm 15\%$	$0.28 \pm 20\%$	No	25	41	71



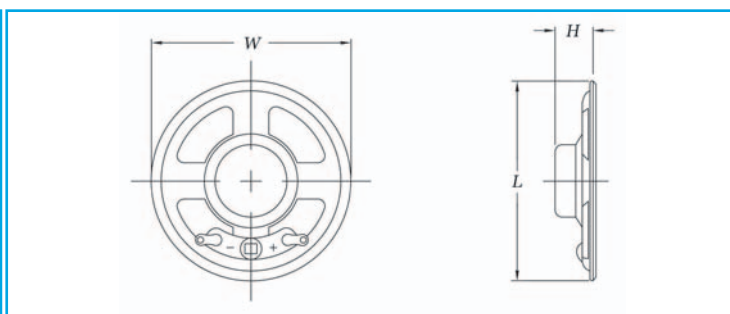
Audio Speakers are electro-mechanical devices that use a diaphragm cone made of paper, mylar, cloth or other light-weight materials to convert electrical audio signals back into sound.



Part Number	Rated Power (Watts)	Max. Power (Watts)	Imped. (Ω)	SPL Min. (10cm)	Res Freq (KHz)	Washable	H (mm)	W/L (mm)
AS01308MR-2-R	0.2	0.3	$8 \pm 15\%$	85	$1.1 \pm 20\%$	No	2.8	13
AS05008PR-R	0.1	0.2	$8 \pm 15\%$	91	$0.5 \pm 20\%$	No	9.5	50

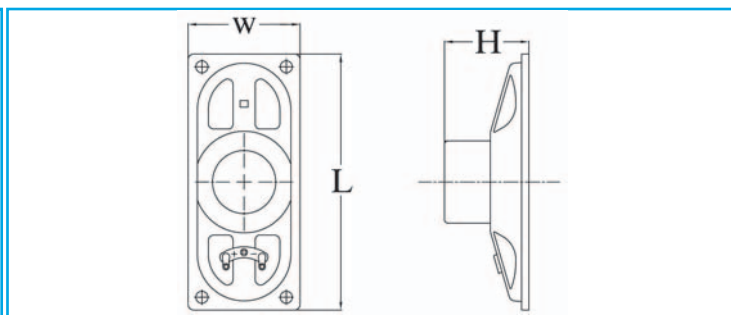


- Wide Range of Size
- Variety of Cone Materials
- Low Profiles Available
- Water Resistant



Round								
Part Number	Height (mm)	Width (mm)	Length (mm)	Power (Rated/Max) (W)	Imp (Ω)	Cone Material	Res Freq (Hz)	Freq Range (Hz)
ADS02008MR-R	4	19.9	19.9	0.08 / 0.2	8	Mylar	750	750 - 5000
ADS02908MR-R	9.5	29	29	0.1 / 0.2	8	Mylar	650	650 - 4000
AS01308MR-2-R	2.8	13	13	0.2 / 0.3	8	Mylar	1100	700 - 5000
AS01308MR-R	2	13	13	0.2 / 0.4	8	Mylar	1050	1050 - 20000
AS01508MR-3-R	2.8	15	15	0.3 / 0.5	8	Mylar	900	900 - 20000
AS01508MR-R	4.4	15	15	1.2 / 1.8	8	Mylar	900	900 - 12000
AS01508MR-SC-2-R	3.8	15	15	0.5 / 0.7	8	Mylar	900	900 - 5000
AS01708MR-SC-R	4.8	17	17	0.3 / 0.5	8	Mylar	750	750 - 5000
AS01808MR-R	5.8	18	18	1 / 1.5	8	Mylar	450	250 - 20000
AS02008MR-R	3	20	20	0.5 / 0.8	8	Mylar	500	500 - 4000
AS02808MR-R	5.3	28	28	1 / 2	8	Mylar	500	500 - 20000
AS03008MR-R	4.8	30	30	0.5 / 1	8	Mylar	650	650 - 15000
AS03608MR-3-R	4.9	36	36	0.5 / 0.7	8	Mylar	600	600 - 7000
AS03608MR-4-R	4.3	36	36	0.8 / 1	8	Mylar	450	450 - 20000
AS04008PR-R	6.55	40	40	0.5 / 0.8	8	Paper	700	700 - 4750
AS04008PR-WR-R	6.55	40	40	0.5 / 0.8	8	*Treated Paper	700	700 - 4750
AS04508MR-3-R	5	45	45	1 / 1.5	8	Mylar	450	450 - 6000
AS05008MR-3-R	10.6	50	50	1.5 / 3	8	Mylar	800	800 - 5000
AS05008MR-4-R	7.2	50	50	1.5 / 2	8	Mylar	350	350 - 20000
AS05008MR-R	18.5	50	50	0.2 / 0.4	8	Mylar	550	550 - 4500
AS05008PR-2-R	18.5	50	50	0.2 / 0.4	8	Paper	550	550 - 4500
AS05008PR-3-R	10.6	50	50	1.5 / 3	8	Paper	800	800 - 5000
AS05008PR-3-WR-R	10.6	50	50	1.5 / 3	8	*Treated Paper	800	800 - 5000
AS05008PR-6-R	18.5	50	50	0.4 / 0.7	8	Paper	500	500 - 5000
AS05008PR-A-R	12	50	50	1 / 1.5	8	Paper	550	550 - 5000
AS05008PR-R	9.5	50	50	0.1 / 0.2	8	Paper	500	500 - 4500
AS05008PR-WR-R	12	50	50	1 / 1.5	8	*Treated Paper	550	550 - 5000
AS05708MR-R	13	57	57	0.5 / 1	8	Mylar	450	450 - 4500
AS05708PR-2-R	13	57	57	1 / 1.5	8	Paper	350	350 - 8000
AS05708PR-2-WR-R	13	57	57	1 / 1.5	8	*Treated Paper	350	350 - 8000
AS05708PR-4-R	22	57	57	1 / 2	8	Paper	200	200 - 12000
AS06608MR-R	12.5	66	66	0.5 / 0.8	8	Mylar	380	380 - 7500
AS13708PR-R	31.5	137	137	5 / 10	8	Paper	160	160 - 5700

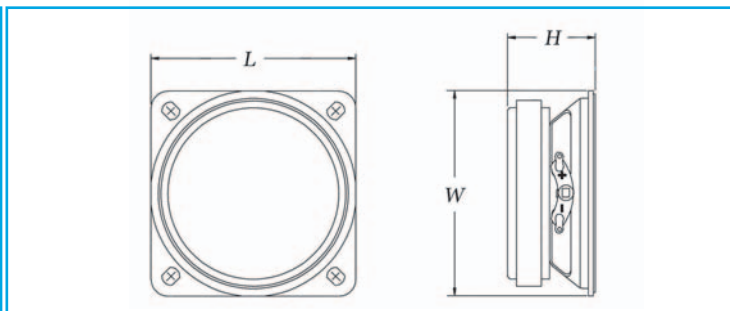
*Projects Unlimited Inc, has combined the quality of paper with the durability of Mylar in our new line of **Water-Resistant Speakers**. We have developed a process that improves the moisture, heat and weather resistance of standard paper diaphragm speakers. We are able to offer the sound quality of paper diaphragm speakers with similar element resistance as a Mylar diaphragm speaker. This process can be applied to almost any paper or cloth speaker we sell. Contact your PUI representative or visit our website to learn more about these products.



Oval								
Part Number	Height (mm)	Width (mm)	Length (mm)	Power (Rated/Max) (W)	Imp (Ω)	Cone Material	Res Freq (Hz)	Freq Range (Hz)
AS02508CO-2-R	5	14.9	24.9	0.5 / 1.0	8	Cloth	900	900 - 20000
AS02508CO-2-WR-R	5	14.9	24.9	0.5 / 1	8	*Treated Cloth	900	900 - 20000
AS02708CO-2-R	6.5	20	27	1 / 3	8	Cloth	550	550 - 20000
AS02708CO-R	6	20.5	27	1 / 2	8	Cloth	550	250 - 20000
AS02708CO-WR-R	6	20.5	27	1 / 3	8	*Treated Cloth	550	250 - 20000
AS03508CO-2-R	8	20	35	1 / 2	8	Cloth	500	500 - 20000
AS03508CO-5-R	5.5	19	35	1 / 2	8	Cloth	450	450 - 2000
AS03508CO-7-R	5.5	16	35	1 / 2	8	Cloth	600	600 - 13000
AS04008CO-2-R	8	20	40	1.5 / 3	8	Cloth	450	200 - 20000
AS04008CO-4-R	5.8	20	40	1.5 / 3	8	Cloth	450	450 - 20000
AS04008CO-R	5.8	20	40	2 / 3	8	Cloth	400	200 - 20000
AS04008CO-WR-R	5.8	20	40	2 / 3	8	*Treated Cloth	400	200 - 20000
AS04008PO-2-R	11.5	28.3	40	1 / 2	8	Paper	450	450 - 20000
AS04008PO-2-WR-R	11.5	28.3	40	1 / 2	8	*Treated Paper	450	450 - 20000
AS04008PO-R	11.5	28.3	40	2 / 4	8	Paper	380	380 - 20000
AS04008PS-4W-R	11.5	28.3	40	2 / 4	8	Paper	380	380 - 20000
AS04008PS-4W-WR-R	11.5	28.3	40	2 / 4	8	*Treated Paper	380	380 - 20000
AS07008PO-2-R	23	30.5	70	2 / 5	8	Paper	300	300 - 20000
AS07008PO-2-WR-R	23	30.5	70	2 / 5	8	*Treated Paper	300	300 - 20000
AS07008PO-R	23	30.5	70	2 / 5	8	Paper	300	100 - 20000
AS07108PO-2-R	28	41	71	4 / 6	8	Paper	350	350 - 20000
AS07108PO-2-WR-R	28	41	71	4 / 6	8	*Treated Paper	350	350 - 20000
AS07108PO-3-R	23.5	41	71	3 / 5	8	Paper	250	100 - 20000
AS07108PO-4-R	25	41	71	5 / 6	8	Paper	250	100 - 20000
AS07108PO-4-WR-R	25	41	71	5 / 6	8	*Treated Paper	250	100 - 20000
AS07108PO-R	25	41	71	3 / 5	8	Paper	250	100 - 20000
AS07108PO-WR-R	25	41	71	3 / 5	8	*Treated Paper	250	100 - 20000
AS09008PO-2-R	40.5	50	90	5 / 8	8	Paper	240	240 - 18000
AS09008PO-2-WR-R	40.5	50	90	5 / 8	8	*Treated Paper	240	240 - 18000
AS09008PO-3-R	40.5	50	90	1 / 2	8	Paper	240	240 - 18000
AS09008PO-R	48	50	90	5 / 7	8	Paper	180	180 - 15000
AS09008PO-WR-R	48	50	90	5 / 7	8	*Treated Paper	180	180 - 15000

Converting speaker output power: When the input power to the speaker is doubled or halved, the output SPL changes by about 3dB. For example, a speaker with an 83dB output at 0.5W will measure 86dB at 1W.

Converting speaker distance: When the reference distance of a speaker is halved or doubled, the output SPL changes by about 6dB. For example, a speaker measuring 83dB at 1 meter will measure 89dB at 0.5 meter.

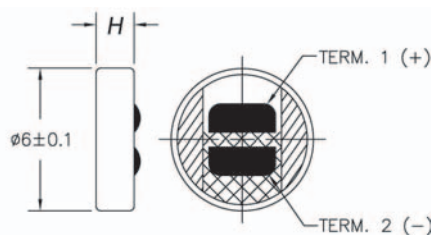


Square								
Part Number	Height (mm)	Width (mm)	Length (mm)	Power (Rated/Max) (W)	Imp (Ω)	Cone Material	Res Freq (Hz)	Freq Range (Hz)
AS04008MS-R	15.7	40.5	40.5	0.4 / 0.5	8	Mylar	800	800 - 5000
AS04008PS-2-R	16.7	40.5	40.5	0.2 / 0.4	8	Paper	530	530 - 8000
AS05008MS-R	12	50.5	50.5	1.5 / 3	8	Mylar	800	800 - 7000
AS05008PS-R	16.8	50.2	50.2	0.25 / 0.5	8	Paper	550	550 - 3500
AS06508MS-R	31	64.5	64.5	2 / 4	8	Mylar	400	400 - 13000
AS06608PS-2-R	21	66	66	0.5 / 1	8	Paper	300	300 - 3100
AS06608PS-R	29	66.3	66.3	4 / 5	8	Paper	230	230 - 12000
AS06608PS-WR-R	29	66.3	66.3	4 / 5	8	*Treated Paper	230	230 - 12000
AS07008PS-R	27	70	70	2 / 4	8	Paper	300	300 - 20000
AS07008PS-WR-R	27	70	70	2 / 4	8	*Treated Paper	300	300 - 20000
AS07708PS-2-R	25.5	77	77	4 / 8	8	Paper	270	270 - 8000
AS07708PS-2-WR-R	25.5	77	77	4 / 8	8	*Treated Paper	270	270 - 8000
AS07708PS-3-R	44	77	77	10 / 15	8	Paper	120	120 - 17000
AS07708PS-3-WR-R	44	77	77	10 / 15	8	*Treated Paper	120	120 - 17000
AS10308PS-R	45	103	103	15 / 20	8	Paper	170	170 - 15000
AS10308PS-WR-R	45	103	103	15 / 20	8	*Treated Paper	170	170 - 15000
Thru-Hole								
AST-01508MR-R	7.5	15	15	0.3 / 0.5	8	Mylar	1700	1700 - 20000
AST-01532MR-R	7.5	15	15	0.3 / 0.5	32	Mylar	2100	2100 - 20000
AST-01708MR-R	8	17	17	0.2 / 0.5	8	Mylar	1500	1500 - 20000
AST-02308MR-R	8.5	23	23	0.08 / 0.15	8	Mylar	1500	600 - 20000
AST-03008MR-R	12.5	29.9	29.9	0.15 / 0.2	8	Mylar	1400	500 - 20000
AST-03032MR-R	12	30	30	0.1 / 0.2	32	Mylar	1200	1200 - 20000
AST-030C0MR-R	12.7	29.7	29.7	0.15 / 0.3	100	Mylar	1200	1200 - 10000
AST-03208MR-2-R	14	31.7	31.7	0.15 / 2	8	Mylar	1100	700 - 4000
AST-03208MR-R	15.1	31.9	31.9	0.1 / 0.2	8	Mylar	1500	500 - 20000
AST-1732MR-R	8	17	17	0.2 / 0.5	32	Mylar	1700	1700 - 20000
Surface Mount								
SMS-1508-2-R	5	15	15	0.3 / 0.5	8	Mylar	850	850 - 20000
SMS-1508MS-R	4	15	15	0.5 / 0.8	8	Mylar	800	500 - 10000

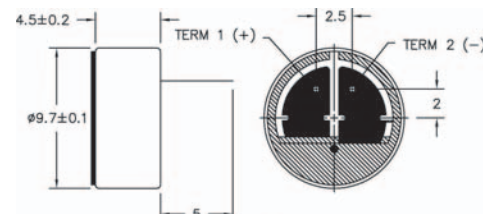
Projects Unlimited, Inc. has the capabilities to supply you with [Value Added Services](#) such as lead wires, connectors, wiring harnesses or alternative mounting options. Our in-house [Engineering Support Staff](#) can answer all your questions, aid in design and provide production support. Contact your PUI representative for more information.



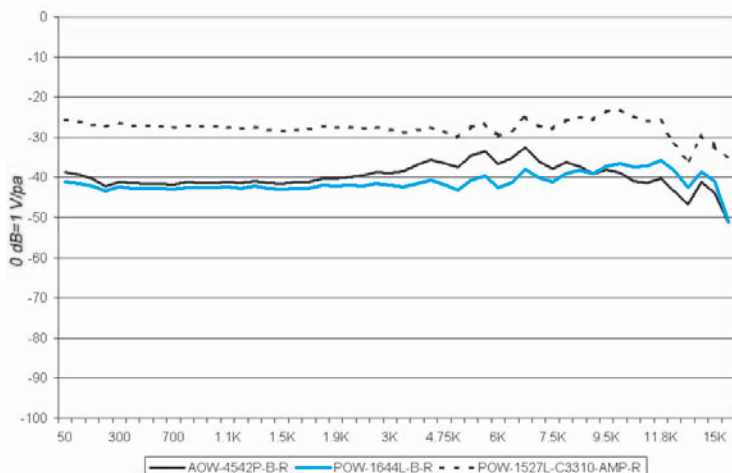
Part Number	Directivity	Sensitivity (dB)	Oper Volt (Vdc)	Impedance (Ω)	Inter Cap (pF)	H (mm)	Washable
AOW-4542P-B-R	Omni	-42 ± 3	1.5	2.2	N/A	4.5	Yes
POW-1527L-C3310-AMP-R	Omni	-27 ± 3	2	2.2	33,10	1.5	Yes
POW-1644L-B-R	Omni	-44 ± 3	2	2.2	N/A	1.6	Yes



POW-1527L-C3310-AMP-R & POW-1644L-B-R



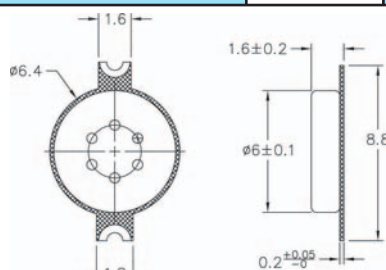
AOW-4542P-B-R



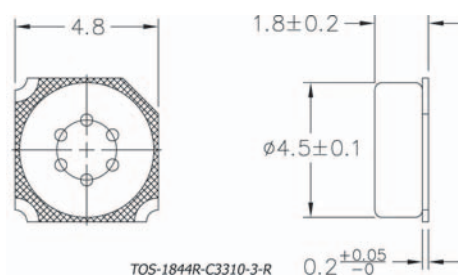
Electret-Condenser Microphones use a lightweight diaphragm and a field-effect transistor (FET) to convert sound into electrical impulses for recording or amplifying.



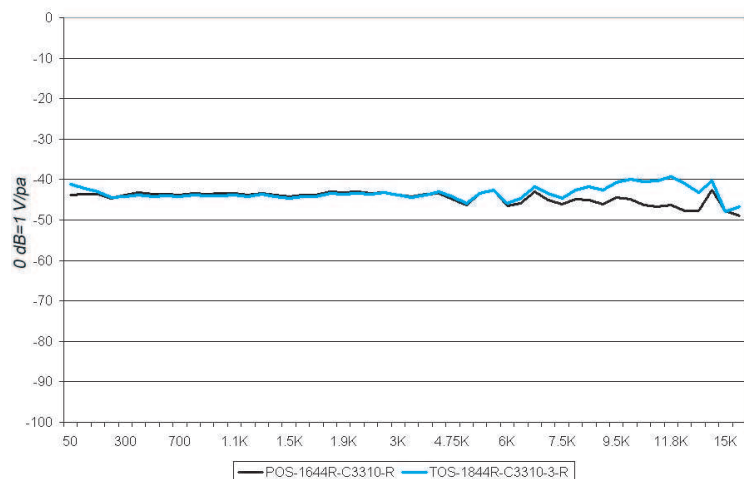
Part Number	Directivity	Sensitivity (dB)	Oper Volt (Vdc)	Impedance (Ω)	Inter Cap (pF)	Washable
POS-1644R-C3310-R	Omni	-44 ± 3	3	2.2	33,10	No
TOS-1844R-C3310-3-R	Omni	-44 ± 3	2	2.2	33,10	No



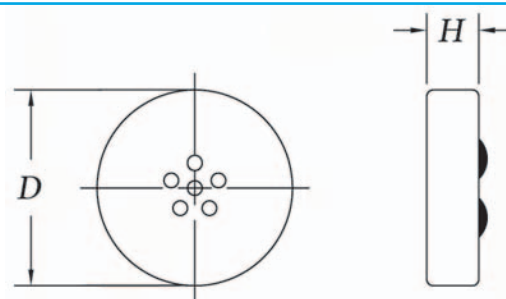
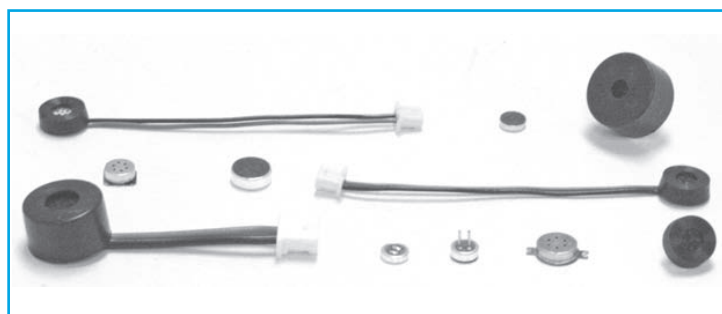
POS-1644R-C3310-R



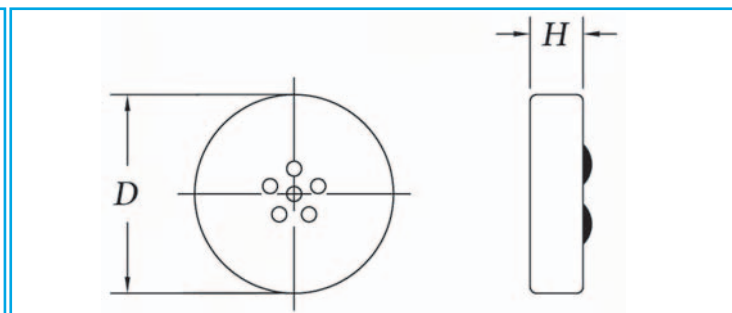
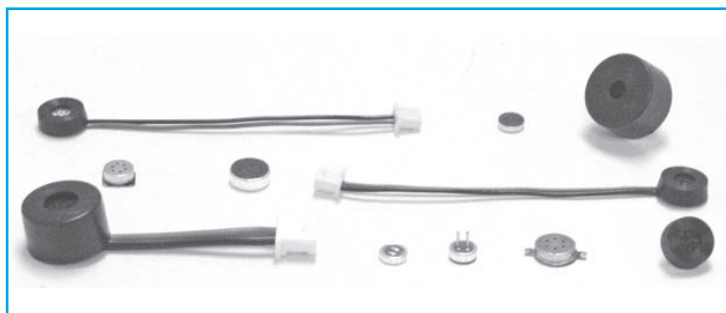
TOS-1844R-C3310-3-R



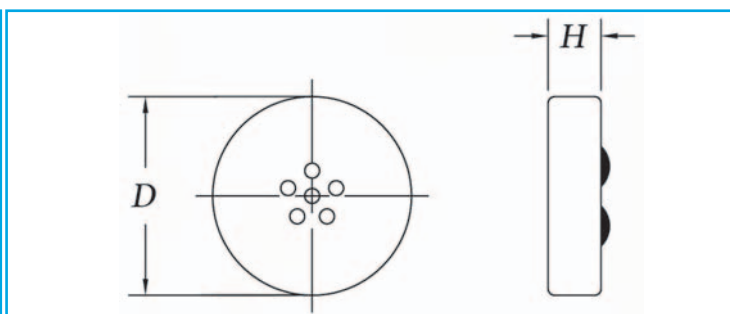
- Available in Noise Canceling, Omni and Uni-directional
- Internal Feedback Capacitors
- Distortion Free Response



Omni-Directional							
Part Number	Sens (dB)	Imp (K Ω)	Operating Vdc	Terminal	Height (mm)	Dia (mm)	Washable
AOM-5538L-NF-R	-38	2.2	1.5	Solder Pad	5.5	10	No
AOM-6746P-R	-46	2.2	1.5	Pin	6.7	9.7	No
AOM-6742L-R	-42	2.2	1.5	Solder Pad	6.7	9.7	No
AOM-6742P-2-R	-42	2.2	1.5	Pin	6.7	9.7	No
AOM-5244L-R	-44	1	4.5	Solder Pad	5.2	9.7	No
AOM-5242L-R	-42	2.2	2.5	Solder Pad	5.2	9.7	No
AOM-4546L-R	-46	2.2	1.5	Solder Pad	4.5	9.7	No
AOM-4546P-R	-46	2.2	1.5	Pin	4.5	9.7	No
AOM-4544L-R	-44	2.2	1.5	Solder Pad	4.5	9.7	No
AOM-4544P-2-R	-44	2.2	1.5	Pin	4.5	9.7	No
AOM-4544P-NF-R	-44	2.2	1.5	Pin	4.5	9.7	No
AOM-4542L-R	-42	2.2	1.5	Solder Pad	4.5	9.7	No
AOM-4542P-R	-42	2.2	1.5	Pin	4.5	9.7	No
AOM-4540L-R	-40	2.2	1.5	Solder Pad	4.5	9.7	No
AOM-4540P-R	-40	2.2	1.5	Pin	4.5	9.7	No
AOM-6545L-R	-45	1	4.5	Solder Pad	6.5	9.4	No
AOM-6545P-R	-45	1	4.5	Pin	6.5	9.4	No
DOM-5246L-R	-46	2.2	1.5	Solder Pad	5.2	8	No
DOM-5242L-R	-42	2.2	1.5	Solder Pad	5.2	8	No
POM-5246L-R	-46	2.2	2	Solder Pad	5.2	6	No
POM-5246P-R	-46	2.2	2	Pin	5.2	6	No
POM-5242L-R	-42	2.2	2	Solder Pad	5.2	6	No
POM-5242P-R	-42	2.2	2	Pin	5.2	6	No
POM-5238L-R	-38	2.2	2	Solder Pad	5.2	6	No
POM-5238P-R	-38	2.2	2	Pin	5.2	6	No
POM-3549L-R	-49	2.2	2	Solder Pad	3.5	6	No
POM-3546L-R	-46	2.2	2	Solder Pad	3.5	6	No
POM-3546P-R	-46	2.2	2	Pin	3.5	6	No
POM-3542L-R	-42	2.2	2	Solder Pad	3.5	6	No
POM-3542P-R	-42	2.2	2	Pin	3.5	6	No
POM-3046L-R	-46	2.2	2	Solder Pad	3	6	No
POM-3046P-R	-46	2.2	2	Pin	3	6	No
POM-3042L-R	-42	2.2	2	Solder Pad	3	6	No
POM-3042P-R	-42	2.2	2	Pin	3	6	No
POM-2746L-R	-46	2.2	2	Solder Pad	2.7	6	No
POM-2746P-R	-46	2.2	2	Pin	2.7	6	No
POM-2744P-C33-R	-44	2.2	2	Pin	2.7	6	No
POM-2742L-2-R	-42	2.2	2	Solder Pad	2.7	6	No
POM-2742P-C10-R	-42	2.2	3	Pin	2.7	6	No
POM-2742P-C33-R	-42	2.2	2	Pin	2.7	6	No
POM-2742S-C33-R	-42	2.2	2	Bullseye	2.7	6	No



Omni-Directional							
Part Number	Sens (dB)	Imp (K Ω)	Operating Vdc	Terminal	Height (mm)	Dia (mm)	Washable
POM-2740L-C33-R	-40	2.2	2	Solder Pad	2.7	6	No
POM-2740P-C33-R	-40	2.2	2	Pin	2.7	6	No
POM-2738L-R	-38	2.2	2	Solder Pad	2.7	6	No
POM-2738P-C33-R	-38	2.2	2	Pin	2.7	6	No
POM-2738P-R	-38	2.2	2	Pin	2.7	6	No
POM-2735P-R	-35	2.2	3	Pin	2.7	6	No
POM-2742P-2-R	-42	2.2	2	Pin	2.7	6	No
POM-2246L-C33-R	-46	2.2	2	Solder Pad	2.2	6	No
POM-2246P-2-R	-46	2.2	2	Pin	2.2	6	No
POM-2246P-C33-R	-46	2.2	2	Pin	2.2	6	No
POM-2246S-2-R	-46	2.2	2	Bullseye	2.2	6	No
POM-2244L-C33-R	-44	2.2	2	Solder Pad	2.2	6	No
POM-2244P-2-R	-44	2.2	2	Pin	2.2	6	No
POM-2242L-C33-R	-42	2.2	2	Solder Pad	2.2	6	No
POM-2242P-C33-R	-42	2.2	2	Pin	2.2	6	No
POM-2242S-C33-R	-42	2.2	2	Bullseye	2.2	6	No
POM-2240L-C1033-R	-40	2.2	2	Solder Pad	2.2	6	No
POM-2240P-C33-R	-40	2.2	2	Pin	2.2	6	No
POM-1844L-C33-R	-44	2.2	2	Solder Pad	1.8	6	No
POM-1844P-C33-R	-44	2.2	2	Pin	1.8	6	No
POM-1644P-NF-R	-44	2.2	2	Pin	1.6	6	No
POM-1547P-R	-47	2.2	2	Pin	1.5	6	No
POM-1547S-R	-47	2.2	2	Bullseye	1.5	6	No
POM-1242L-R	-42	2.2	2	Solder Pad	1.2	6	No
ROM-2244P-NF-R	-44	2.2	2	Pin	2.2	5.8	No
ROM-2238P-NF-R	-38	2.2	2	Pin	2.2	5.8	No
ROM-2238S-NF-R	-38	2.2	2	Bullseye	2.2	5.8	No
TOM-3050L-R	-50	2.2	3	Solder Pad	3	4.5	No
TOM-3046L-R	-46	2.2	2	Solder Pad	3	4.5	No
TOM-3044L-R	-44	2.2	2	Solder Pad	3	4.5	No
TOM-1545L-R	-45	2.2	2	Solder Pad	1.5	4	No
TOM-1545P-R	-45	2.2	2	Pin	1.5	4	No
TOM-1545S-C33-R	-45	2.2	2	Bullseye	1.5	4	No
TOM-1545S-R	-45	2.2	2	Bullseye	1.5	4	No
TOM-1245S-C33-R	-45	2.2	2	Bullseye	1.2	4	No
TOM-1242L-NF-R	-42	2.2	2	Solder Pad	1.2	4	No
TOM-1145S-C33-R	-45	2.2	2	Bullseye	1.1	4	No
TOM-1045S-C33-R	-45	2.2	2	Bullseye	1	4	No



Washable Omni-Directional							
Part Number	Sens (dB)	Imp (K Ω)	Operating Vdc	Terminal	Height (mm)	Dia (mm)	Washable
AOW-4544L-C3310-B-R	-44	2.2	2	Solder Pad	4.5	9.7	IP67
AOW-4544P-C3310-B-R	-44	2.2	2	Solder Pad	4.5	9.7	IP67
AOW-4542P-B-R	-42	2.2	1.5	Pin	4.5	9.7	IP67
POW-2744P-B-R	-44	2.2	2	Pin	2.7	6	IP67
POW-2742P-C3310-B-R	-42	2.2	2	Pin	2.7	6	IP67
POW-2242L-C3310-B-R	-42	2.2	2	Solder Pad	2.2	6	IP67
POW-2242P-C3310-B-R	-42	2.1	2	Pin	2.2	6	IP67
POW-1644L-B-R	-44	2.2	3	Solder Pad	1.6	6	IP67
POW-1644P-B-R	-44	2.2	3	Pin	1.6	6	IP67
POW-2742L-C3310-B-R	-42	2.2	2	Solder Pad	2.7	6	IP67
Uni-Directional							
AUM-5247L-R	-47	0.68	1.5	Solder Pad	5.2	9.7	No
CUM-4537L-R	-37	1.8	1.5	Solder Pad	4.5	9.7	No
DUM-5246L-R	-46	2.2	2	Solder Pad	5.2	8	No
PUM-5250L-R	-50	2.2	2	Solder Pad	5.2	6	No
PUM-3546L-R	-46	2.2	2	Solder Pad	3.5	6	No
PUM-3046L-R	-46	2.2	2	Solder Pad	3	6	No
Noise Canceling							
ANM-5254L-R	-54	0.68	1.5	Solder Pad	5.2	9.7	No
PNM-5250L-R	-50	2.2	1.5	Solder Pad	5.2	6	No
PNM-3546L-R	-46	2.2	2	Solder Pad	3.5	6	No
PNM-2751L-R	-51	2.2	2	Solder Pad	2.7	6	No
TNM-3054L-R	-54	2.2	2	Solder Pad	3	4.5	No
Surface Mount							
Part Number	Sens (dB)	Imp (K Ω)	Operating Vdc	Terminal	Height (mm)	Length (mm)	Width (mm)
POS-1644R-C3310-2-R	-44	2.2	3	Surface Mount	1.6	6.4	6.4
POS-1644R-C3310-R	-44	2.2	3	Surface Mount	1.6	8.8	6.4
TOS-1844R-C3310-2-R	-44	2.2	2	Surface Mount	1.8	6.6	4.8
TOS-1844R-C3310-3-R	-44	2.2	3	Surface Mount	1.8	4.8	4.8
ROS-1442R-1033-R	-42	2.2	2.2	Surface Mount	1.5	4.5	4.5
TOS-1844R-C3310-R	-44	2.2	2	Surface Mount	1.8	4.8	4.8

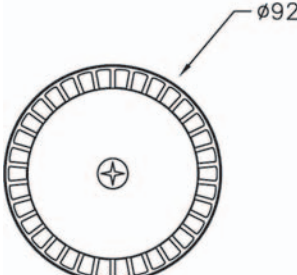
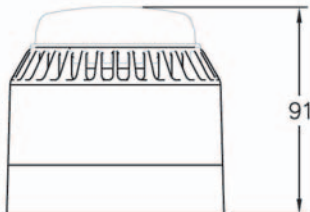
Omni-Directional microphones collect sound waves from all directions. Ideal for general applications

Uni-Directional microphones offer increased front sensitivity in comparison to Omni-Directional models.

Noise-Canceling microphones have identical front and rear sensitivity. Side sensitivity is significantly less. Sound porting to the rear is necessary to fully utilize these microphones.



Part Number	Rated Vdc	Voltage Range (Vdc)	Tone Output	(Nominal) Current	Ingress Protection	Flash Rate	Washable
AVW-15SBR-RL-12	1.5	9 - 18	See Chart	See Chart	IP 54	1/S	No

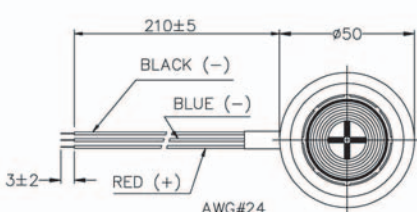
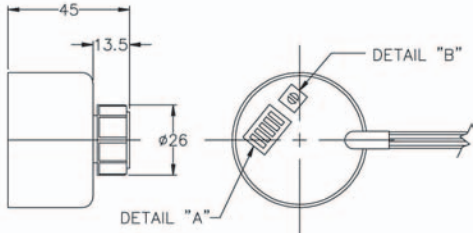
32 Selectable Tones to choose from

Primary Tone	Second Tone	Description	Primary Tone	Second Tone	Description
1	14	Alt tones 800/970Hz@2Hz	17	17	Pulsing 660Hz (150ms On/150ms Off)
2	14	Sweeping 800/970Hz@7Hz	18	18	Pulsing 660Hz (150ms On/150ms Off)
3	14	Sweeping 800/970Hz@1Hz	19	19	Continuous 970Hz
4	14	Continuous 2850Hz	20	20	Alt tones 554/440 (100ms-400ms)
5	4	Sweeping 2400/2850Hz@7Hz	21	21	Pulsing 660Hz (150ms On/150ms Off)
6	4	Sweeping 2400/2850Hz@1Hz	22	14	Pulsing 660Hz (150ms On/150ms Off)
7	14	Slow Whoop 300/1200Hz (3s sweep/0.5s silence)	23	14	Sweeping 800/970Hz@1Hz
8	14	Sweeping 1200/500Hz@2Hz	24	4	Sweeping 2400/2850Hz@7Hz
9	4	Alt tones 2400/2850Hz@2Hz	25	25	Pulsing 2850Hz (3x 500ms pulses/1.5s silence)
10	14	Pulsing 970Hz (1s On/1s Off)	26	26	Pulsing 2850Hz (3x 500ms pulses/1.5s silence)
11	14	Alt tones 800/970Hz@1Hz	27	27	Continuous 970Hz
12	4	Pulsing 2850Hz (1s On/1s Off)	28	10	Alt tones 800/970Hz@2Hz
13	14	Pulsing 970Hz (250ms On/1s Off)	29	33	Alt tones 800/970Hz@2Hz
14	14	Continuous 970Hz	30	35	Alt tones 800/970Hz@2Hz
15	14	Alt tones 554/440 (100ms-400ms)	31	31	Sweeping 800/970Hz@1Hz
16	16	Pulsing 660Hz (150ms On/150ms Off)	32	32	Continuous 970Hz

Sirens have built-in electronic drive circuits to provide loud warning signals for fire and safety applications.



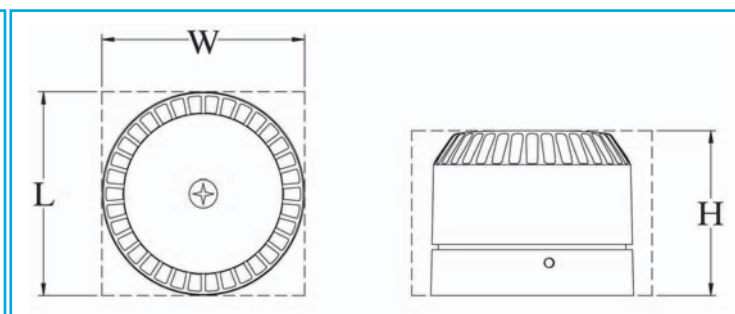
Part Number	Rated Vdc	Voltage Range (Vdc)	Tone Output	(Nominal) Current	Ingress Protection	Oper. Temp.	Washable
AW-10PW	24	9 - 18	See Chart	See Chart	IP 65	-10~ +60	No

32 Selectable Tones to choose from

Primary Tone	Second Tone	Description	Primary Tone	Second Tone	Description
1	14	Alt tones 800/970Hz@2Hz	17	17	Pulsing 660Hz (150ms On/150ms Off)
2	14	Sweeping 800/970Hz@7Hz	18	18	Pulsing 660Hz (150ms On/150ms Off)
3	14	Sweeping 800/970Hz@1Hz	19	19	Continuous 970Hz
4	14	Continuous 2850Hz	20	20	Alt tones 554/440 (100ms-400ms)
5	4	Sweeping 2400/2850Hz@7Hz	21	21	Pulsing 660Hz (150ms On/150ms Off)
6	4	Sweeping 2400/2850Hz@1Hz	22	14	Pulsing 660Hz (150ms On/150ms Off)
7	14	Slow Whoop 300/1200Hz (3s sweep/0.5s silence)	23	14	Sweeping 800/970Hz@1Hz
8	14	Sweeping 1200/500Hz@2Hz	24	4	Sweeping 2400/2850Hz@7Hz
9	4	Alt tones 2400/2850Hz@2Hz	25	25	Pulsing 2850Hz (3x 500ms pulses/1.5s silence)
10	14	Pulsing 970Hz (1s On/1s Off)	26	26	Pulsing 2850Hz (3x 500ms pulses/1.5s silence)
11	14	Alt tones 800/970Hz@1Hz	27	27	Continuous 970Hz
12	4	Pulsing 2850Hz (1s On/1s Off)	28	10	Alt tones 800/970Hz@2Hz
13	14	Pulsing 970Hz (250ms On/1s Off)	29	33	Alt tones 800/970Hz@2Hz
14	14	Continuous 970Hz	30	35	Alt tones 800/970Hz@2Hz
15	14	Alt tones 554/440 (100ms-400ms)	31	31	Sweeping 800/970Hz@1Hz
16	16	Pulsing 660Hz (150ms On/150ms Off)	32	32	Continuous 970Hz

- Very Loud Output
- Multiple Tone Outputs
- Visual Notification
- Volume Control



Sirens							
Part Number	H (mm)	W (mm)	L (mm)	Voltage Range	Tones	Strobe	IP
AVW-15LPNBR-RL	80	93	93	9~28 Vdc	32 Tones	Red	54 / 65
AVW-15SBR-AL-12	92	93	93	9~15 Vdc	32 Tones	Amber	54 / 65
AVW-15SBR-AL-24	92	93	93	18~30 Vdc	32 Tones	Amber	54 / 65
AVW-15SBR-RL-12	92	93	93	9~15 Vdc	32 Tones	Red	54 / 65
AVW-15SBR-RL-24	92	93	93	18~30 Vdc	32 Tones	Red	54 / 65
AVW-15SBW-AL-12	92	93	93	9~15 Vdc	32 Tones	Amber	54 / 65
AVW-15SBW-AL-24	92	93	93	18~30 Vdc	32 Tones	Amber	54 / 65
AVW-15SBW-BL-12	92	93	93	9~15 Vdc	32 Tones	Blue	54 / 65
AVW-15SBW-BL-24	92	93	93	18~30 Vdc	32 Tones	Blue	54 / 65
AVW-15SBW-CL-12	92	93	93	9~15 Vdc	32 Tones	Clear	54 / 65
AVW-15SBW-CL-24	92	93	93	18~30 Vdc	32 Tones	Clear	54 / 65
AW-05CR-NC	27	113	113	10~28 Vdc	32 Tones	N/A	54
AW-05CW-NC	27	113	113	10~28 Vdc	32 Tones	N/A	54
AW-05MR	26	102	102	9~30 Vdc	8 Tones	N/A	54
AW-05MW-NC	26	102	102	9~30 Vdc	8 Tones	N/A	54
AW-10CFR	42	86	86	9~28 Vdc	32 Tones	N/A	54
AW-10CFW	42	86	86	9~28 Vdc	32 Tones	N/A	54
AW-10CSR	42	86	86	9~28 Vdc	32 Tones	N/A	N/A
AW-10CSW	42	86	86	9~28 Vdc	32 Tones	N/A	N/A
AW-10FR	43	52.5	71	9~28 Vdc	32 Tones	N/A	65
AW-10FR-NSVC	43	52.5	71	9~28 Vdc	2 Tones	N/A	65
AW-10FW	43	52.5	71	9~28 Vdc	32 Tones	N/A	65
AW-10FW-NSVC	43	52.5	71	9~28 Vdc	2 Tones	N/A	65
AW-10PR	45	50	50	9~28 Vdc	32 Tones	N/A	65
AW-10PR-NSVC	45	50	50	9~28 Vdc	2 Tones	N/A	65
AW-10PW	45	50	50	9~28 Vdc	32 Tones	N/A	65
AW-10PW-NSVC	45	50	50	9~28 Vdc	2 Tones	N/A	65
AW-15LPSBR	63	93	93	9~28 Vdc	32 Tones	N/A	65
AW-15LPSBW	63	93	93	9~28 Vdc	32 Tones	N/A	65
AW-15SBR	75	93	93	9~28 Vdc	32 Tones	N/A	65
AW-15SBR-120	75	93	93	110~230 Vac	32 Tones	N/A	65
AW-15SBW	75	93	93	9~28 Vdc	32 Tones	N/A	65
AW-15SBW-120	75	93	93	110~230 Vac	32 Tones	N/A	65
AW-15SBW-VOICE	83	95	95	18~30 Vdc	Voice	N/A	65
AW-30SBR	95	109	109	9~28 Vdc	32 Tones	N/A	42
AW-30SBW	95	109	109	9~28 Vdc	32 Tones	N/A	42
AWB-20R6-12	63	152	152	8~16 Vdc	Bell	N/A	42
AWB-20R6-24	63	152	152	18~30 Vdc	Bell	N/A	42
AWB-25R6-12	85	155	155	9~15 Vdc	Bell	N/A	55
AWB-25R6-24	85	155	155	18~30 Vdc	Bell	N/A	55
VW-05MR-RL	57.7	102	102	9~28 Vdc	N/A	Red	54 / 65
VW-35SBR-RL	54	93	93	9~28 Vdc	N/A	Red	54 / 65