# GENERAL DESCRIPTION

* 1. The unit shall be a powerful 360-degree, six-speaker Audio Paging System located at the top of CB1-W solar model Help Points® from Code Blue Corporation, no substitutions.

# CONSTRUCTION

* 1. The Audio Paging (AP) assembly sits on top of the CB1-W model and shall use the solar mounting bolts on top of the unit. The AP unit shall consist of 6 weatherproof speakers and grilles, a housing capable of forces generated by a solar panel, gasketing to make it weatherproof, and fasteners to attach it to the CB1-W and to hold it assembly together.
	2. The speaker array shall be constructed of a material that can withstand the forces generated by the attached solar panel.

# MOUNTING

* 1. The AP unit shall be capable of mounting to the solar unit using the 3 5/8-11 hex nuts at the top of the CB1-W. The top of the AP unit shall also have this 3-nut arrangement for mounting the solar panel.

# ELECTRICAL

* 1. Requires 4 ampere at 12VDC.

# COMMUNICATIONS

* 1. The unit shall be a cylindrical 360°, six-speaker AP assembly for paging notification capabilities:
		1. The amplifier shall have the following specifications:

| Parameters | Symbols  | Test Condition/ Comment  | Min  | Typ  | Max  | Unit  |
| --- | --- | --- | --- | --- | --- | --- |
| Load Resistance: | RL  |  | 2.0 | 4 | - | Ohms |
| Max Output Power: | Pmax  | f=20Hz-20KHz (10% THD)  | - | 100 | - | W  |
| Output Power: | Po  | f=20Hz-20kHz (0.1% THD)  | - | 1 x 100 | - | W  |
| Distortion | THD+N |  |  | 10 |  | % |
| Signal to Noise: | SNR  |  | 102 | - | - | dB  |

* + 1. The 360-degree speaker array shall have the following specifications:

|  |  |
| --- | --- |
| Parameters | Unit |
| Impedance: | 8 Ohms per speaker parallel - series |
| Frequency Range: | 450 Hz to 8000 Hz or similar |
| Power Capacity:Temperature: | 15 W or more per speakerOperating Temperature: -40°C to 85°C Ambient Temp Range |

* + 1. The amplifier shall have the following additional features:
* Synchronized Switching Frequencies for AM Avoidance
* Full range 20 to 20kHz Bandwidth Programmed to support voice range.
* Remote Disable
* Silent Turn-On
* Full Protection: Over Current Speaker Short, Over Current Short to Chassis Ground, Over Temperature Protection, Power Supply Under Voltage Lockout and Excessive Clipping
* Monitor Outputs: Output Current Monitor, Temperature Monitor and Protect and Power On
* Input audio gain adjustment at the amplifier
	1. The unit shall be capable of communicating via third party IP wireless and cellular devices, which can be housed within the unit.
	2. EIA/TIA, ANSI, CSA and BICSI cabling or similar standards shall be adhered to for proper operation of devices connected to copper or fiber infrastructure.

# FINISH

* 1. Four-coat paint process, with zinc-rich primer for corrosion resistance and baked-on polyurethane enamel for maximum gloss and shine.
		1. Optional clear coating process available to provide additional environmental protection.
	2. Substrate preparation shall be as required to comply with applicable ASTM impact and adhesion standards: D2794 Direct and Reverse Impact, D523 Gloss @ 60 Degrees, D3359B Cross hatch Adhesion, D1654 Corrosion Creep, D714 Scribe Blisters and D714 Field Blisters.
	3. The finish shall be available in 7 standard colors: Safety Blue, Safety Red, Safety Yellow, Gloss White, Gloss Black, Dark Bronze and Bright Silver. Custom colors shall be available.
	4. Minimum coverage thickness of 2.0 mils.

# WARRANTY

* 1. The 360-degree, six-speaker Audio Paging System shall be warrantied against any defects in material and workmanship, under normal use, for a period of 2 years from the date of installation. If a system is found by the customer to be defective within the warranty period, the manufacturer shall repair and/or replace any defective parts, provided the equipment is returned to the manufacturer.

# MANUFACTURER

* 1. The Manufacturer shall be Code Blue Corporation. 800-205-7186, 259 Hedcor Street, Holland, Michigan 49423. www.codeblue.com. THERE ARE NO EQUIVALENTS.