

Submittal

Job Address _____

RADIO AMPLIFICATION UNIT RC118N

The radio amplification unit is typically installed in a centrally located electrical equipment room or a dedicated ARCS room, which is a 2 hour fire rated room. It is a NEMA 4 rated cabinet that houses the key components of the ARC System. This includes a radio repeater, combiner / duplexer, power supply, sealed lead acid batteries, and a data acquisition and monitoring unit. This system requires (2) two 110V 20A direct lines with a dedicated service switch and connects directly to the DRC (dedicated radio console CMD-V1) with (2) CAT 5 cables, one for data and one for voice, and a 14/2 cable for 24V DC power.

Key Features

- NEMA 4 enclosure, non ferrous with red powder coat, front and back doors and 3 point locking system, locks via FDNY padlocks
- NEMA 4 A/C cooling unit, nominal cooling capacity 4000 BTUs/Hr. (1172 W)
- 2x TAIT TB9100 repeater with P25 capability, dual mode operation, smart AC / DC operation, 5 watt transmit power each
- Cavity combiner / band pass duplexer, 100W output.
- 120V to 24V 10A power supply with UPS unit, built-in battery test function, battery polarity protection
- Power distribution unit / surge protection with 15A resettable circuit breaker and 1800 joule surge suppressor, active monitoring for ground, surge, and power
- Data acquisition unit which constantly monitors all system parameters, internet capable for remote monitoring, building management capable for integration into an existing system
- Antenna and cable monitor accurately monitor antenna and cable system VSWR levels, measures small changes in antenna VSWR with high feeder and interface losses
- (2) x 110Ah 12V sealed lead acid batteries for 24H reserve power
- Dedicated marked terminals (color coded) for inter-connection to any fire alarm panel (door tamper supervisory)

Specifications

| Radio Amplification Unit – RC118N | | |
|--|---------------------------|--------------------------|
| Volts AC | 115V | 7.4A |
| AC Cooling Unit | 115V | 10.3A |
| Volts DC | 24V | 9.0A |
| Insertion Loss TX | 2.4 Db | |
| Insertion Loss RX | 3 Db | |
| Frequencies TX | Channel 11 - 483.0125 MHz | Channel 12 -484.7625 MHz |
| Frequencies RX | Channel 11 - 486.0125 MHz | Channel 12 - 48.7625 MHz |
| Ambient Conditions | 35° F - 98° F | RH < 90%, non condensing |

Warranty – 1 Year Parts and Labor

Dimensions

