



TECHNICAL NEWS BULLETIN

Multi-Speaker connections for the Model 580 Series, 8 watt utility amplifiers

In most commercial sound installations, an amplifier with multiple inputs is required. For many applications however, a low power, single input amplifier would be more economical. The Raymer 580 series amplifiers are ideal for such applications. The 580 series amplifiers are compact, low power, single input amplifiers with aux, line, and mic inputs available. The entire 580 series is designed to operate with an output load between 4 and 8 ohms. With a load of 4 ohms, the maximum rated output is 8 watts. At 8 ohms however, the rated output drops to 5 watts. Therefore, the ideal load should be as close to 4 ohms as possible. Figures 1-4 are some of the more common configurations.

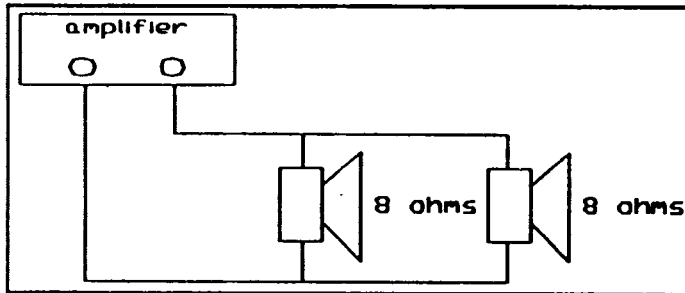


Figure 1

Figure 1 shows two 8 ohm speakers connected in parallel for a reflected output impedance of 4 ohms. This allows a maximum load of 4 watts per speaker. Figure 2 depicts an installation with four 8 ohm speakers. By

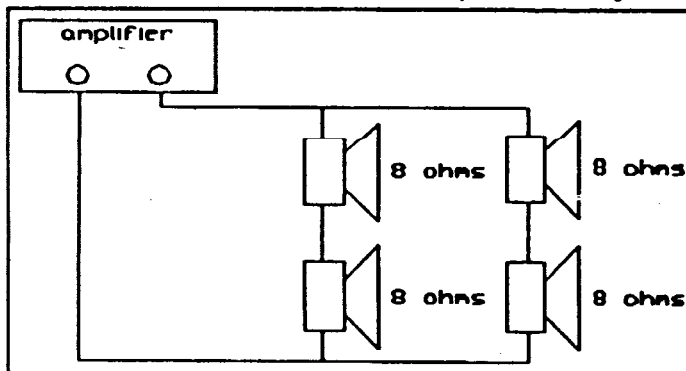


Figure 2

connecting the speakers in a series/parallel configuration as shown, the reflected output impedance is 8 ohms, allowing a maximum load of 1.25 watts per speaker.

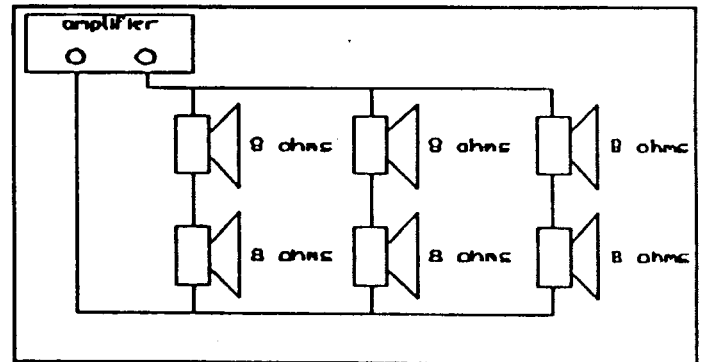


Figure 3

Figure 3 is an installation with six 8 ohm speakers. This installation results in an output impedance of 5.3 ohms, allowing a maximum load of 1 watt per speaker.

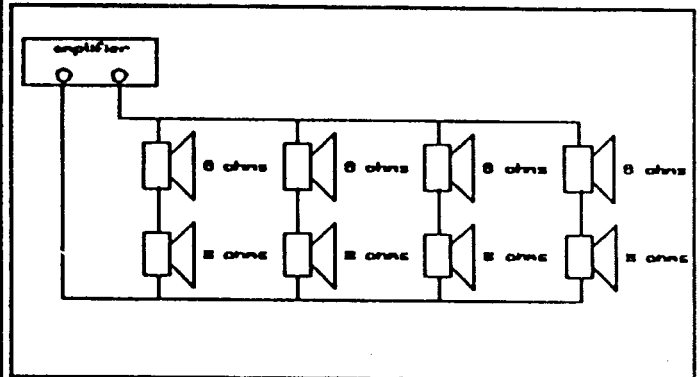


Figure 4

Figure 4 has an installation with eight 8 ohm speakers. This configuration results in an output impedance of 4 ohms, which allows a maximum load of 1 watt per speaker.