

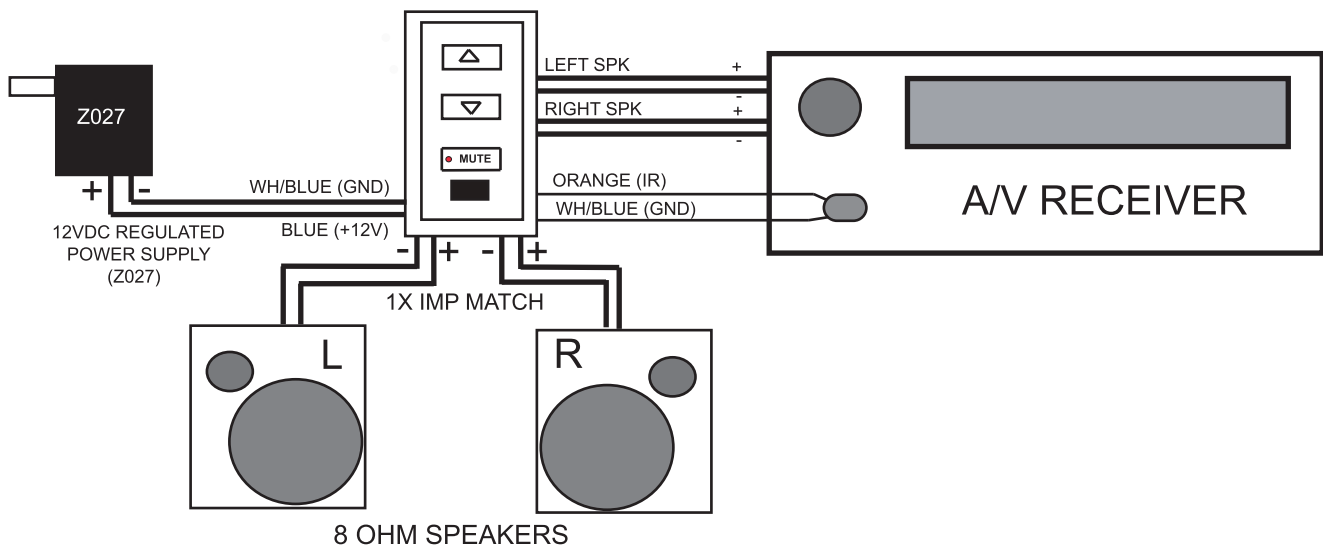
Application Note

4/22/03

ELAN's new VSE Electronic Stereo Volume Control has quickly proven its versatility and usefulness in a myriad of different applications. With a full feature set including Impedence Matching, ELAN's patented Volume Control Override, and a built-in IR receiver, the VSE can integrate easily into any ELAN system as both a traditional Volume Control and a Zone Controller (in place of a keypad, for example.) The VSE Installation Manual covers virtually any wiring scenario using the VSE with ELAN's Z, S, and HD systems but leaves out the various stand-alone applications (no ELAN audio distribution.) The following examples should provide the basic wiring for any VSE wired without an ELAN system.

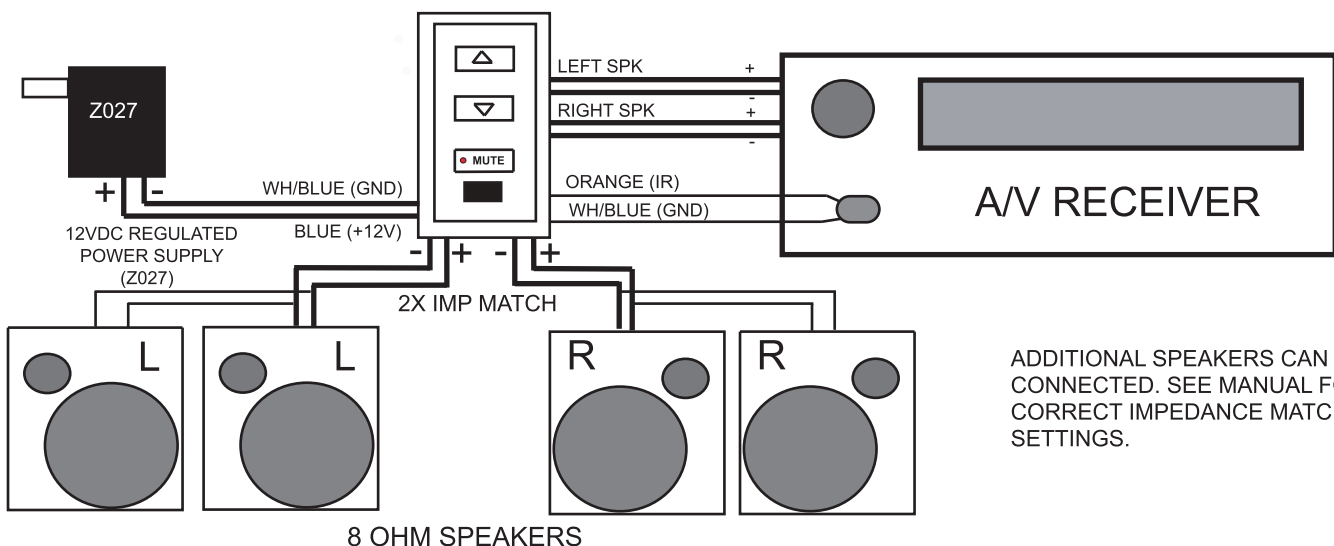
SCENARIO #1 BASIC STAND-ALONE SYSTEM

VSE w/ 12VDC Power Supply Controlling Stereo Receiver



SCENARIO #2 STAND-ALONE SYSTEM W/ ADDITIONAL SPEAKERS

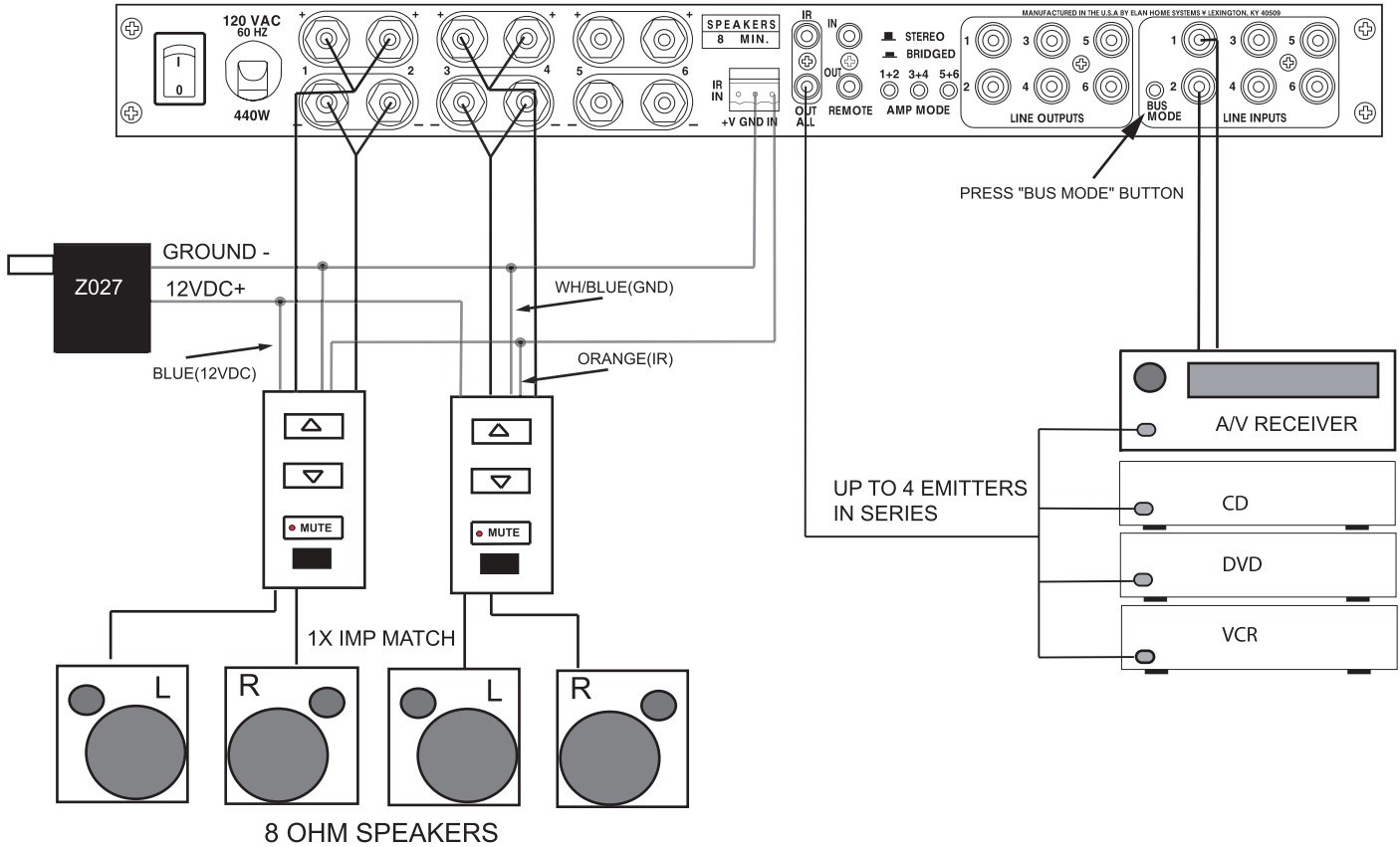
VSE w/ 12VDC Power Supply Controlling Stereo Receiver



ADDITIONAL SPEAKERS CAN BE CONNECTED. SEE MANUAL FOR CORRECT IMPEDANCE MATCH SETTINGS.

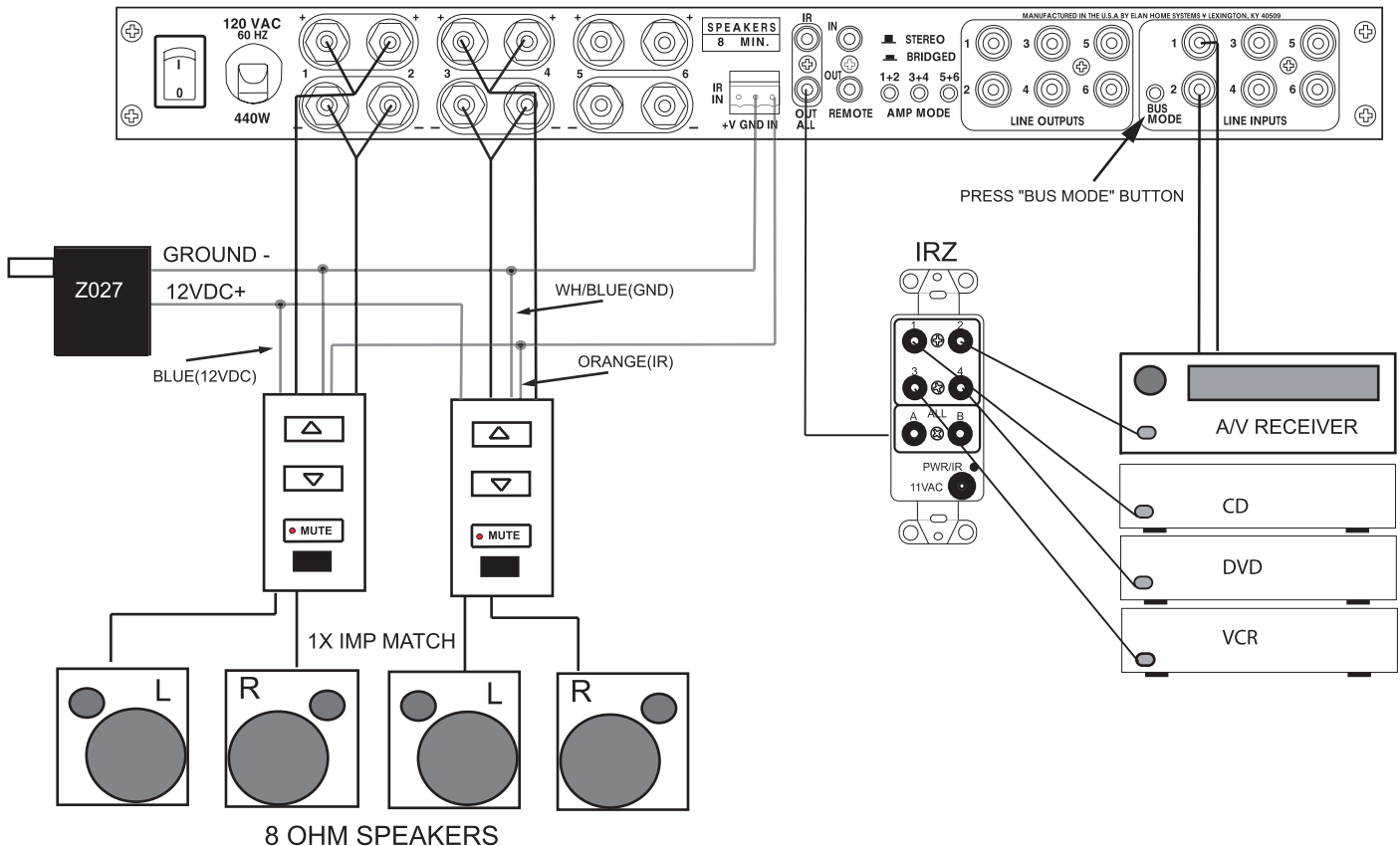
SCENARIO #3 VSE W/ Z660 AND AUDIO SOURCES

VSE USING Z660 FOR POWER & IR DISTRIBUTION



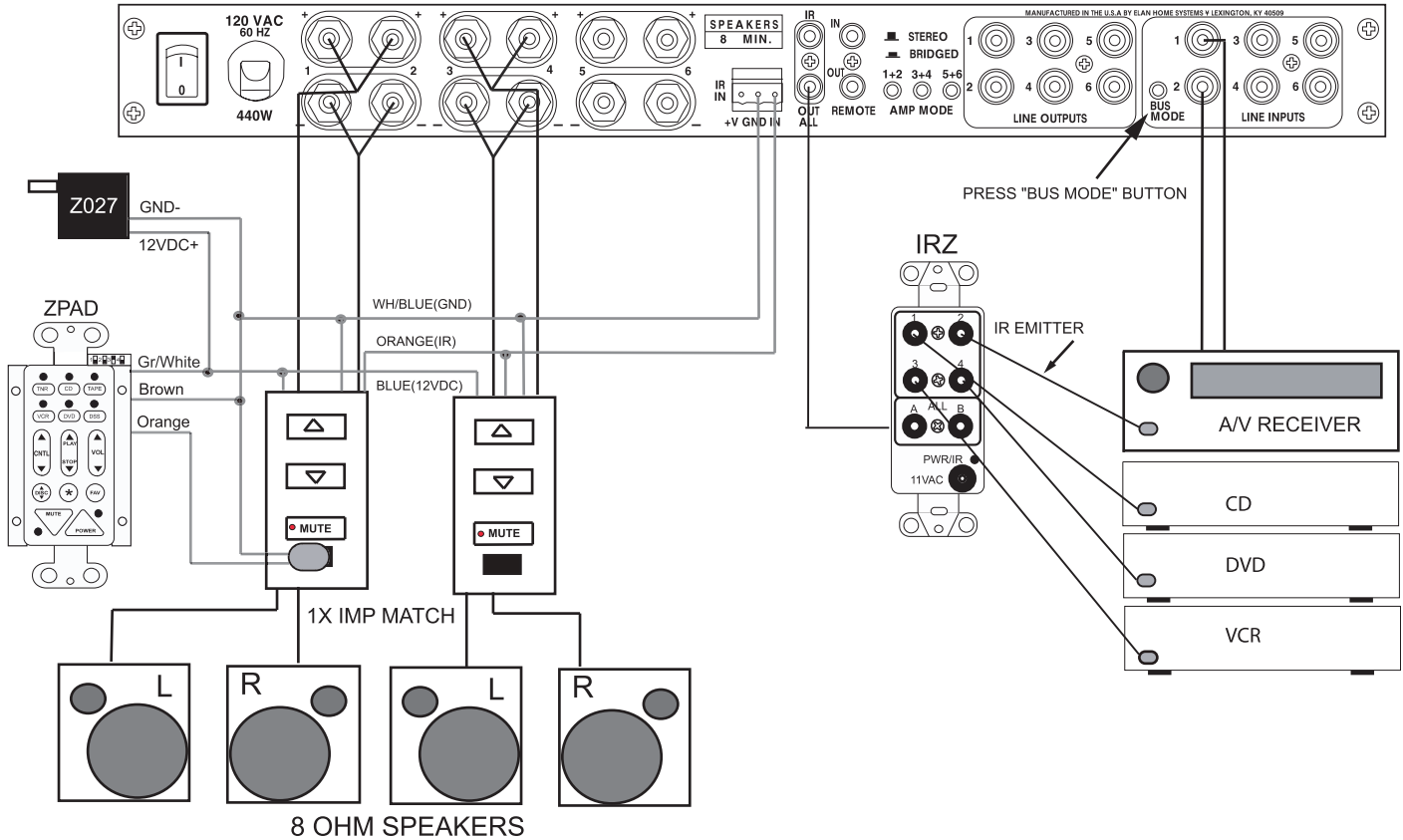
SCENARIO #4 VSE W/ Z660, IRZ, AND AUDIO SOURCES

VSE USING Z660 FOR POWER & IRZ FOR IR DISTRIBUTION



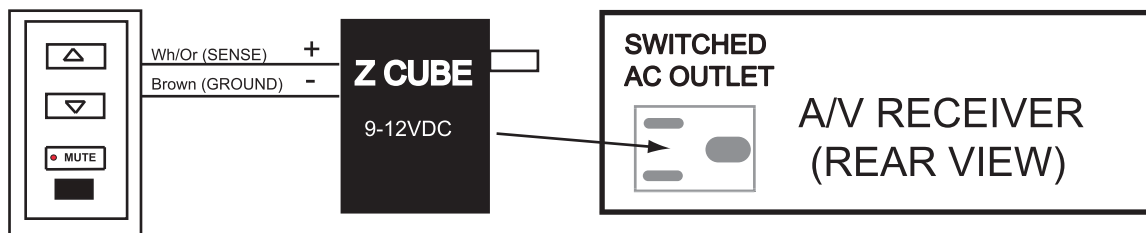
SCENARIO #5 Z100 W/ VSE, Z660, IRZ, AND AUDIO SOURCES

Z100 W/ VSE USING Z660 FOR POWER & IRZ FOR IR DISTRIBUTION



SCENARIO #6: VSE SENSE CONNECTIONS

VSE WITH Z CUBE (OR EQUIVALENT) CONNECTED TO SWITCHED AC OUTLET
 -- FOR USE WITH ANY STAND-ALONE SCENARIO



All of the scenarios shown here can be modified by adding speakers, VSEs, ZPADS or VIA! touch panels. The essential elements for Stand-alone applications are all included here for consideration. The VSE can be powered by ELAN products (IRZ, Z660, etc) or by a well regulated 12VDC power supply (Z027.) when using two or less VSEs, the internal power supply can be used from a Z660 amplifier (Scenarios 3, 4, and 5.) Three or more VSEs will require the use of ELANs Z027 12VDC regulated power supply (or equivalent.) Unregulated power supplies will oversaturate IR signals and give undesirable results. Please note that RJ45 pin positions are NOT the same for the VSE as they are for ZPADS, VIA!s, Z630's, S6, or HD systems. VSEs that are used as zone controllers should be mounted in-wall in the zone that they are controlling, while VSEs that are used in conjunction with ZPADS/VIA!s (Scenario 4) can be located in the area where the equipment is located (the "head end.") Hiding the VSEs creates less wall clutter and simplifies the homeowners learning curve because all areas in the house will be controlled exactly the same way (and no remote controls to clutter up the coffee table!) Specific wiring diagrams and instruction can be found in the VSE Installation Manual. Other products mentioned here each have their own specific manual should further information be desired.