

HDSP Power Wire Connections

After all wires are connected, they must be managed by the Power Management page in the HDSP GUI. See: Power Management



When properly connected and managed there will be no turn-on or turn-off noises

YELLOW - This wire must be connected to the battery or a main +12V source that always has +12 Volts

BLACK - This is the ground wire and must be connected to the car chassis

WHITE - This is the turn-on wire and must be connected to the amplifier turn-on wires

RED - This wire should be connected to a +12V Accessory wire

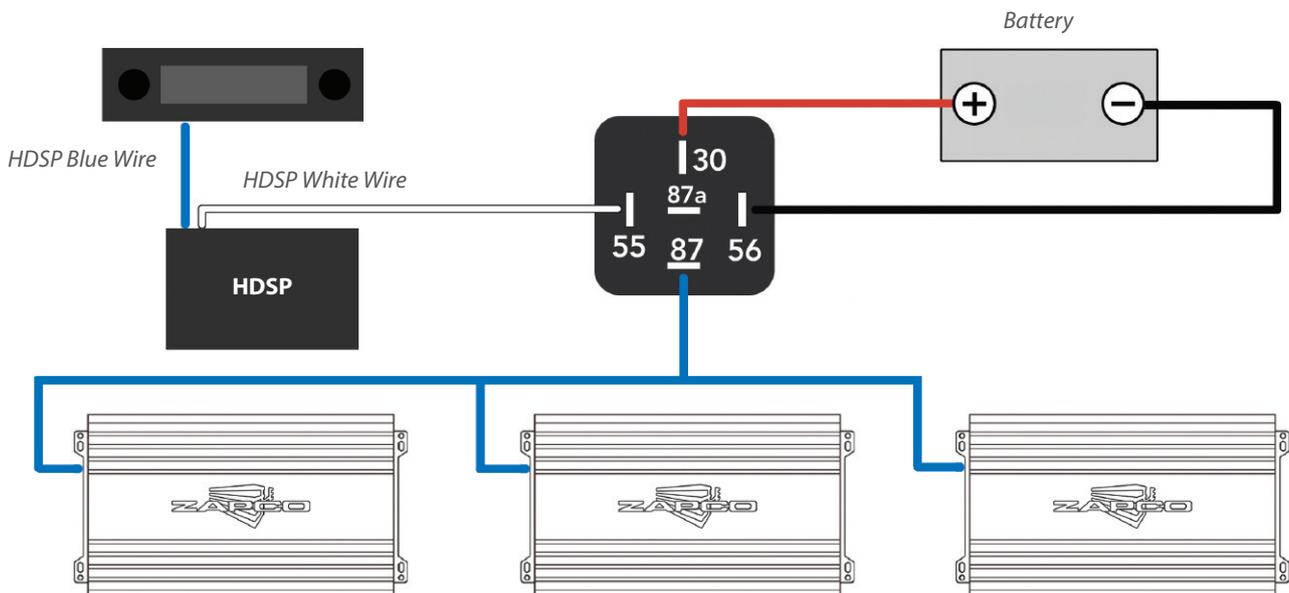
BLUE - If your head unit has a turn-on output you can connect it to the Blue wire

Turning on Multiple Amplifiers

Preventing Turn-On/Turn Off Noises

Multiple amplifiers require more turn-on current than a single amp

A simple low-cost relay can provide current to turn on amps and lighting for your installation.



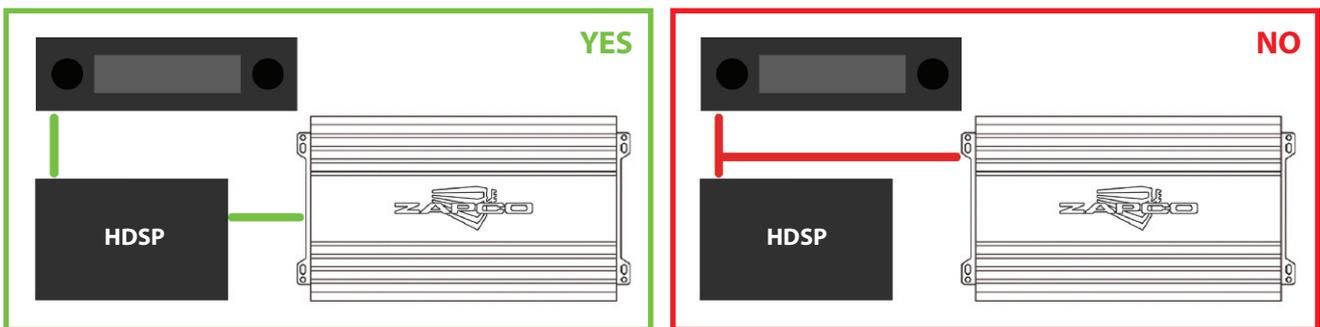
Here is a safe and effective amp turn-on System using a Standard Automotive Relay

Turning on the System Amplifiers

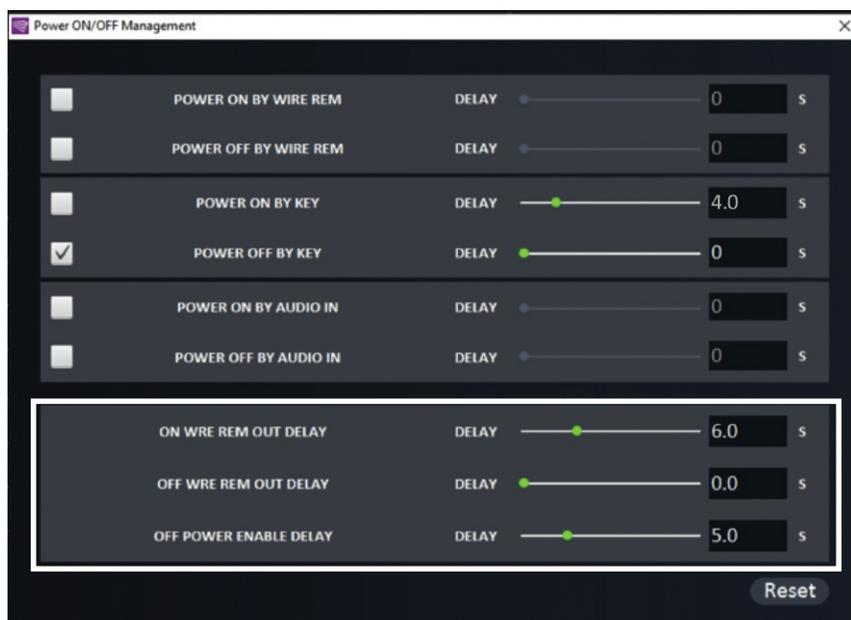
Preventing Turn-On/Turn Off Noises



ATTENTION: Only the White Wire from the HDSP +12V trigger output should be used to turn on the systems amplifiers. Never use a head unit +12v turn on wire or a Keyed +12v wire to turn on the HDSP and the amplifiers together as that will certainly cause turn-on noise and can damage the system.



In the GUI you will finalize the all the turn-on Functions. See below and the other power management sheets.



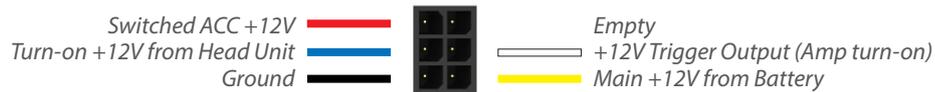
ON WIRE REM OUT DELAY: This delays the turn on going to the amp. Putting a delay here means the white wire will not turn the amp on until the set time has elapsed (in the case above, 6 Sec).

OFF WIRE REM OUT DELAY: This would keep the amplifier on so this should not have delay (0 Sec).

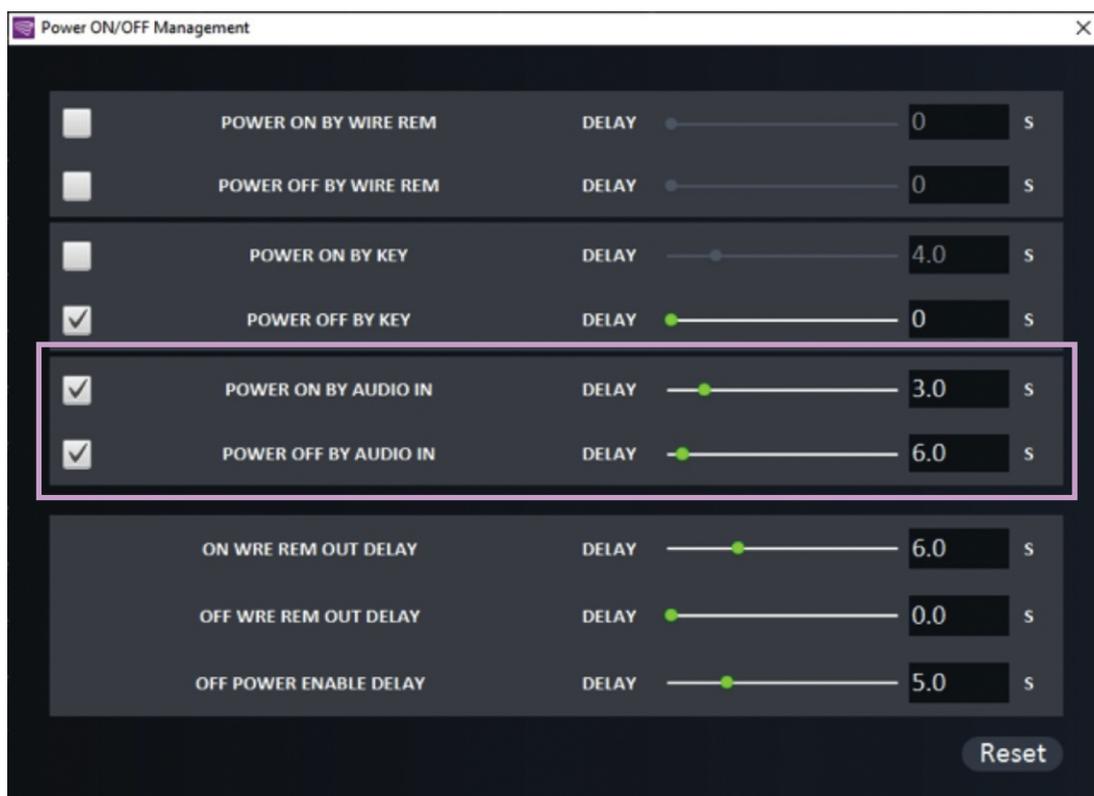
OFF POWER ENABLE DELAY: This keeps the processor power on for the chosen number of seconds after the White wire turns the amp off (in this case 5 seconds). This allows the amplifier to shut down completely before the processor shuts down. This is to prevent turn off pop noises.

Power ON/OFF using High Level Auto-on

Preventing Turn-On/Turn Off Noises



If you are connecting to a factory head unit and you do not have access to a head unit or a keyed Acc to turn on the HDSP then you can check the boxes for Power of By Audio In. This will allow the HDSP to sense signal on the speaker input wires and this signal will turn on the HDSP.



When using the speaker level inputs to automatically turn on the HDSP you will want to use a short delay for turn-on and a longer delay for turn-off. This allows the unit to stay on even during the dead spaces between songs. You can experiment with the delays, but generally 6 ~ 12 seconds is enough.

Checking Power Off by Key is still a good idea to prevent leaving the system on when leaving the car.

Power ON/OFF using +12V Turn-on

Preventing Turn-On/Turn Off Noises



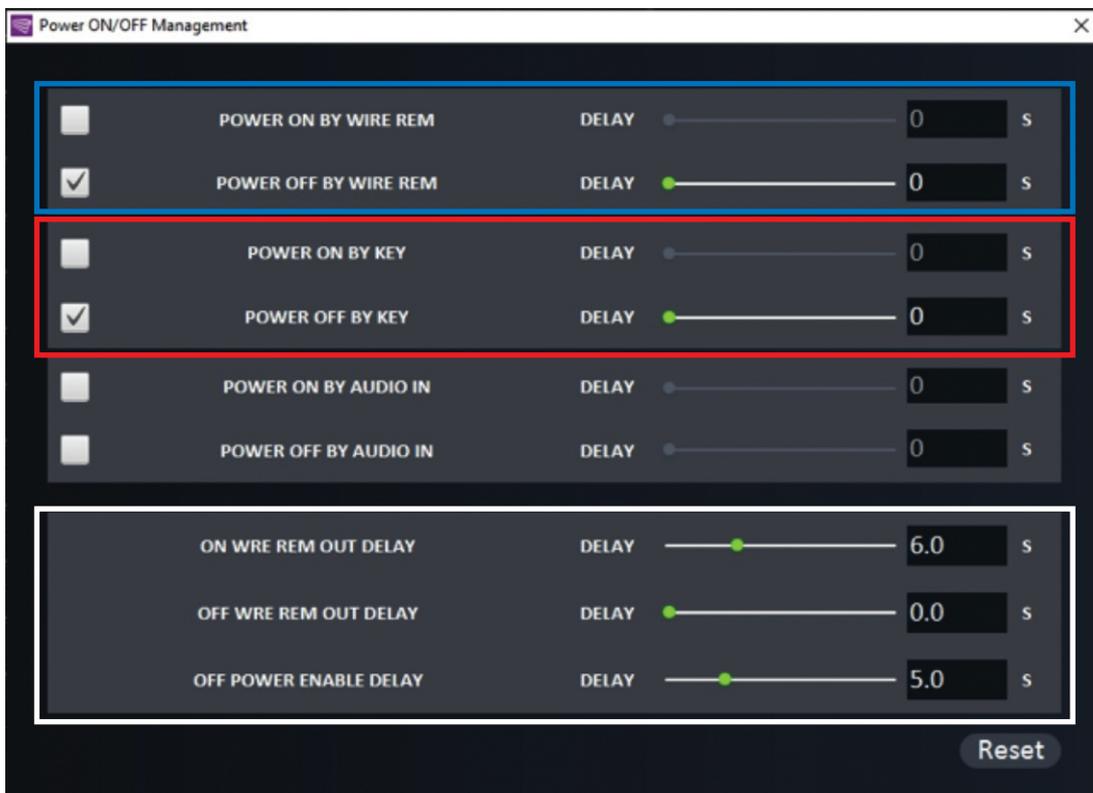
The **BLUE** remote wire connects to the amp turn on wire of the stereo head unit.

The **RED** wire connects to the car's +12V Accessory wire to turn on by key.

The **GOAL**: The amplifier should be the last to turn on and the first to turn off.

So: Delay turn on but do not delay turn off.

The **WHITE** wire connects to the amplifier turn-on terminal to turn on the amplifier.



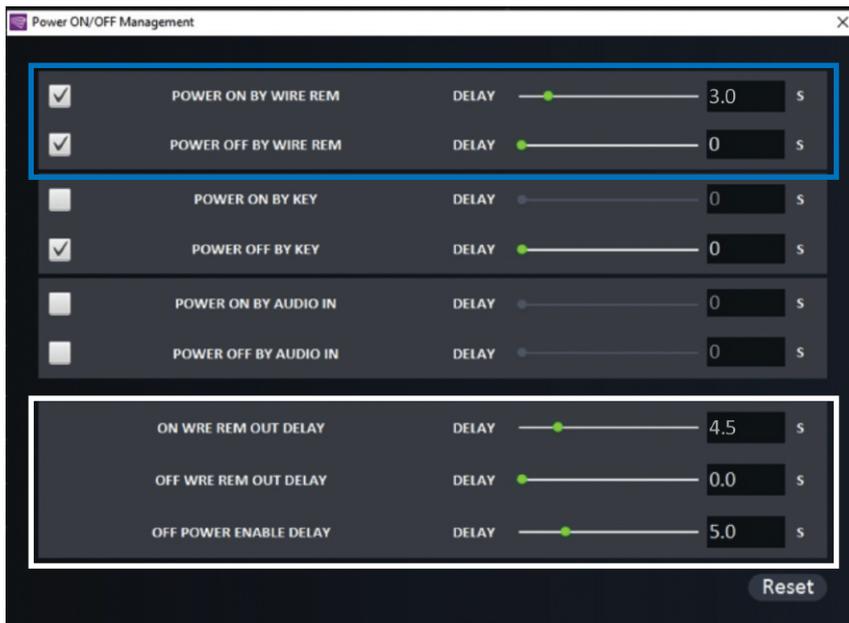
Power ON/OFF Management

<input type="checkbox"/>	POWER ON BY WIRE REM	DELAY	0 s
<input checked="" type="checkbox"/>	POWER OFF BY WIRE REM	DELAY	0 s
<input type="checkbox"/>	POWER ON BY KEY	DELAY	0 s
<input checked="" type="checkbox"/>	POWER OFF BY KEY	DELAY	0 s
<input type="checkbox"/>	POWER ON BY AUDIO IN	DELAY	0 s
<input type="checkbox"/>	POWER OFF BY AUDIO IN	DELAY	0 s
	ON WRE REM OUT DELAY	DELAY	6.0 s
	OFF WRE REM OUT DELAY	DELAY	0.0 s
	OFF POWER ENABLE DELAY	DELAY	5.0 s

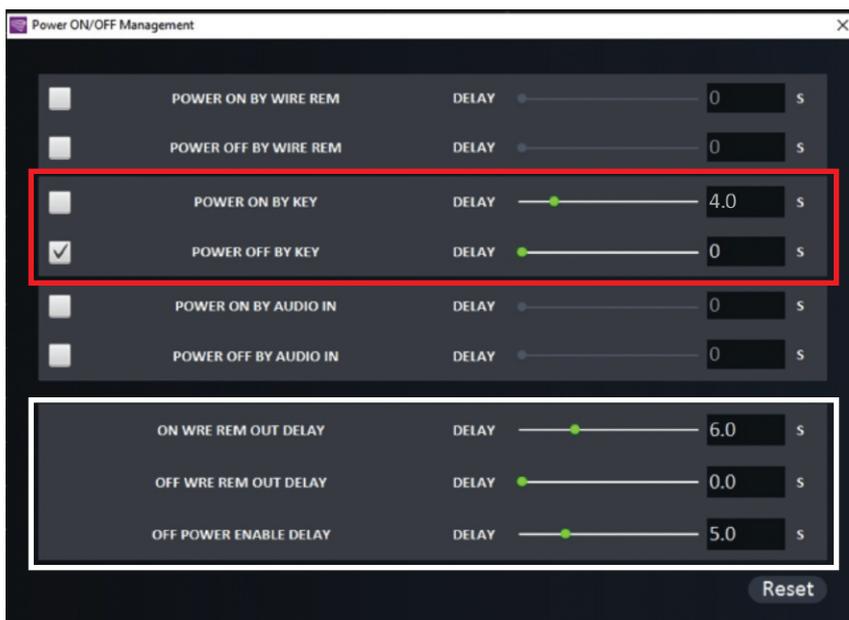
Reset

Power ON/OFF using +12V Turn-on

Preventing Turn-On/Turn Off Noises



If you have an aftermarket head unit with an amplifier turn-on lead, then you should always use that as your auto-turn-on system. Connect the amplifier turn-on lead to the **BLUE** wire in the HDSP power harness. And check the box for Power On by Rem. Check Power off By Rem and assure that delay is at 0 Sec. Optional: you may check Power Off by Key to be sure the system is off when you remove the key to leave the vehicle. The **WHITE** wire connects to the amp turn-on terminal.



If the head unit does not have a turn-on wire, then you can check to Power On and Off by Key. Again, delay only power on and not power off. The White HDSP wire goes to the amplifier turn-on terminal. NEVER connect the Key or the head unit turn-on wire to both the HDSP and the amplifier as this will surely cause turn-on / turn-off noise. The **WHITE** wire connects to the amp turn-on terminal.