

# TR7 PRO

Programmable Universal Trigger Module

# Setup & Programming Instructions

#### Description

The TR7 PRO is a universal trigger output module that has many features which are easily configured through a PC. There are eight inputs which can be triggered by pulsed or constant 12v or ground. The four outputs can be programmed for pulsed, constant or timed 12v or ground with the Green, Gray & Purple wires being rated at 300 milliamps and the Blue wire rated at 1 amp. The timed output is user adjustable and can be programmed up to 4 minutes, 15 seconds & 900 milliseconds.

The TR7 PRO has a unique "Control" feature which allows its functionality to be tested using the PC or Android device before installation (see page 3).

The TR7 PRO also comes equipped with 3 factory presets for bypassing video on Alpine, Pioneer and Clarion head units. WARNING! It is dangerous (and illegal in most states) for the driver to watch the TV/Video monitor while driving the vehicle. The driver may be distracted from looking ahead and an accident could occur. Install the TR7 PRO only in RV and Marine applications where there is no parking/hand brake to interface to. Do not install the TR7 PRO where the driver may be able to view the monitor when driving.

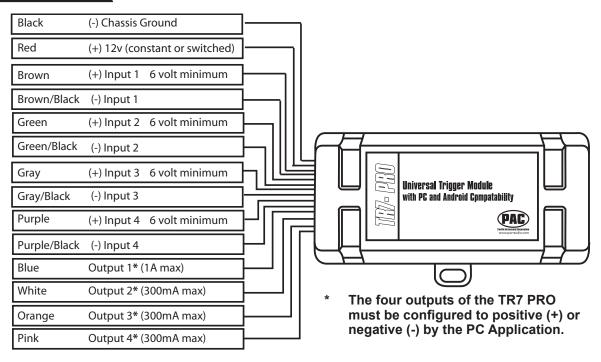
#### Use Examples

Although the possible uses of the TR7 PRO are nearly limitless, here are some examples for the most common uses.

- 1. Latching on / off outputs Turn on headlights, neon lights or radio from an alarm with a momentary output or from a momentary switch
- Double pulse unlock Pulses outputs twice when trigger from a constant or pulsed signal. Use for alarm applications where the unlock wire needs two pulses to unlock all doors.
- 3. Closed loop trigger Good for monitoring trailers on hitches by triggering an aftermarket alarm if the trailer is disconnected from the vehicles hitch. Also monitors stereo equipment in vehicles.
- 4. Pulse extender/Delayed turn off Upon a constant or pulsed trigger, the TR7 PRO will turn on the outputs. As soon as the trigger is disconnected, turned off or at the end of a pulse, the timer will count up to the number of seconds recorded, at which time the outputs will turn off. Good for turning on headlights at night for convenience. Extend alarms output from one second to three seconds for Mercedes vacuum door locks.
- 5. Horn honk On older, aftermarket alarms, it may have been difficult to disarm the alarm with the RF remote when the horn was honking. This will give you a two second delay between honks, allowing you to disarm the alarm. Unique horn honking to distinguish your vehicle from others. Program between one and five honks before the two second delay.
- 6. Linear actuator controller Open/close amplifier racks from a momentary source like from a alarm's negative output. Sequence is : Start, Stop, Reverse & Stop.

- 7. Doorlock pulse generator Good for automatically locking and unlocking door locks when ignition is turned on and off.
- Channel splitter Split 1 channel from an alarm to two outputs. Both outputs are user programmable for pulse, latched or timed output.
- 9. Number of pulses for constant output -Counts a number of user programmable pulses within a user programmed time to turn on the outputs. Good for triggering Vehicle tracking devices that need a constant trigger but the factory alarm only has a pulsed output when triggered like flashing lights or horn honking. Keeps factory alarm from triggering Vehicle tracking device when arming or disarming.
- **10.** Three timers in one Upon a constant trigger, all three outputs are user programmable to delay before turning on outputs or turning on instantly then delay before turning off outputs. Good for situations where you need more than one timer but on a different timer period, without having multiple modules.
- 11. Pulses to latch / unlatch output Upon a constant trigger, multiple outputs are user programmable to delay before turning on outputs or turning on instantly then delay before turning off outputs. Good for situations where you need more than one timer but on a different timer period, without having multiple modules.
- 12. Pulses to pulse output Upon a number of pulses within five seconds, the outputs will turn on and delay for the amount of programmed time, then the outputs will turn off.

### Wiring Overview

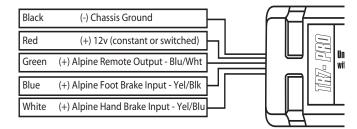


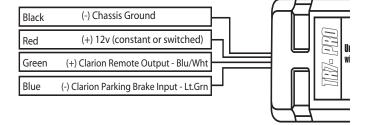
#### Wiring for Preset Configurations

Inputs and Outputs in these examples can be loaded automatically by using the preset feature in the PC Application

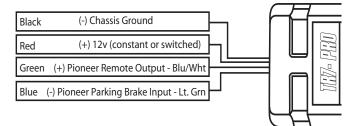
# **Alpine Preset Wiring**

# **Clarion Preset Wiring**

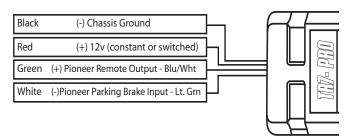




# **Pioneer Preset Wiring**



#### Pioneer AVH-X Series Wiring (Load Alpine preset with PC App)



# Programming the TR7 PRO using a PC

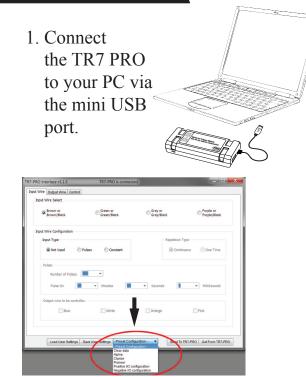
#### The TR7 PRO application is only compatible with Windows based PCs running XP, Vista or 7

To download the TR7 PRO PC application follow these steps:

- 1. Go to www.pac-audio.com
- 2. Search the term "TR7 PRO" in the searchbox found in the top right corner of the website
- 3. Click the product picture to go to the product page
- 4. Once on the product page click the "Technical Docs" tab
- 5. Click the link under the "Technical Docs" tab to download the PC Application
- 6. Follow the instructions included in the download to install the program

Once you have installed the TR7 PRO application on your PC you can use it to load presets, pre-configured user setting files or manually program the inputs and outputs of the interface to fit your installation needs. Follow the example on the next page for preset programming.

#### Example: Loading a Preset



3. Select a preset configuration from the drop down menu.

2. Double click this icon to start the TR7 PRO PC Application.



|         | Output Wire Control          |                         |                       |                                 |  |
|---------|------------------------------|-------------------------|-----------------------|---------------------------------|--|
| 0       | Brown or<br>Brown/Black      | Green or<br>Green/Black | Gray or<br>Gray/Black | Purple or<br>Purple/Black       |  |
| Input V | /ire Configuration           |                         |                       |                                 |  |
| In      | out Type                     |                         | Repetition            | Repetition Type                 |  |
| P       | Not Used                     | Pulses                  | (iii) Con             | tinuous 💿 One Time              |  |
|         | ulter                        |                         |                       |                                 |  |
|         | Number of Pulses             | 001 👻                   |                       |                                 |  |
|         | Pulse On 00                  | ▼ Minutes 00            | ▼ Seconds 0           | <ul> <li>MillSecond:</li> </ul> |  |
|         | iutput wire to be controller |                         |                       |                                 |  |
|         | V Blue                       | Vhite V                 | Orange                | Pink                            |  |
|         |                              |                         |                       | V                               |  |
|         | V Blue                       | White                   | Orange                | Pink                            |  |

4. Click "Send to TR7 PRO".

#### Confirmation LEDs

The TR7 PRO is equipped with 4 LEDs on the side that can be used as visual confirmation that the outputs are configured properly. A positive output will be yellow and a negative green. The LEDs can be switched off inside the case in situations where excessive current draw is a concern. Please do not use a metallic object to switch the LEDs on/off.

