Installation Instructions for 5” Tachometer

Before You Start

- Read instructions completely before installing.
- ALWAYS WEAR SAFETY GLASSES.
- Disconnect negative (-) battery cable before installing gauge.
- Install gauge only when engine is cool and ignition is off.
- Make sure all necessary tools, materials, and parts are on hand.

Wiring

Use 20 AWG stranded or heavier wire for installation. Route wires away from any moving parts and hot engine components. Secure wires firmly along their route. **Note:** As a safety precaution, the 12V+ connections (**RED** and **BLUE** wires) should be fused. We recommend using a 1 Amp, fast-acting type cartridge fuse.

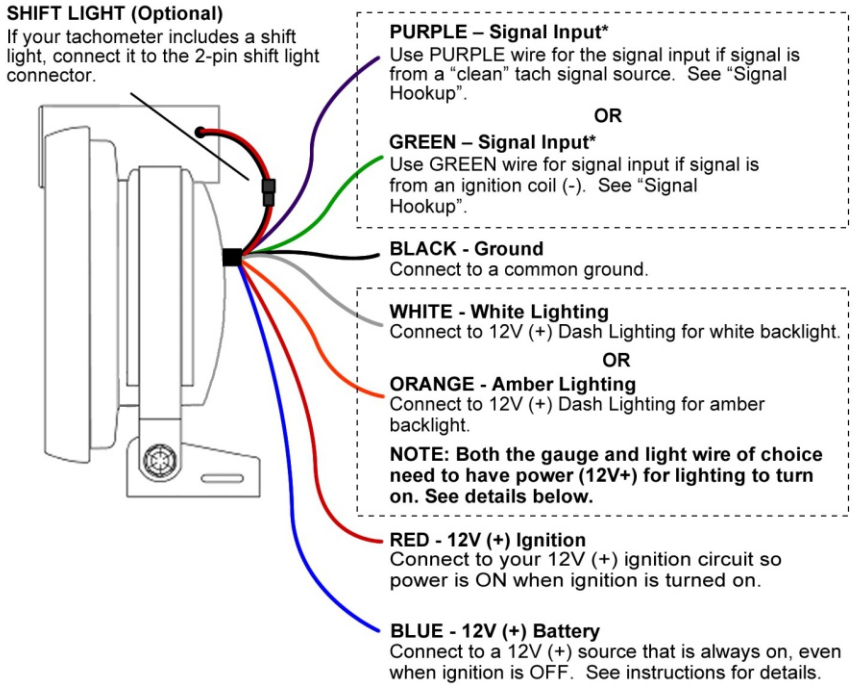
IMPORTANT: Integrated LED lighting requires both the gauge and light wire have power for lighting to turn on. i.e. 12V+ to RED wire AND 12V+ to light wire of choice.

Tachometer Signal Hookup

This performance tachometer has two signal input options (**GREEN** and **PURPLE** wires). See Signal Hookup below. Choose the option best suited for your vehicle's ignition system. **Only connect 1 signal input.** If you are unsure which signal input to use, connect your signal source to the **PURPLE** input.

NEVER CONNECT SIGNAL WIRE TO THE COIL WHEN USING AN MSD OR SIMILAR HIGH OUTPUT CAPACITIVE DISCHARGE STYLE IGNITION SYSTEM. Incorrect installation will damage the tachometer and the warranty will be voided.

Fig 1. Wiring Diagram



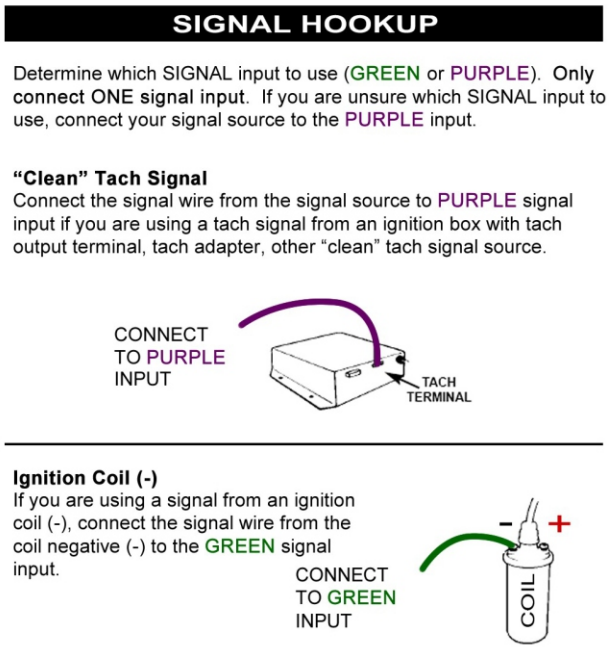


Table 1. Wiring

Wire Color	Comments
PURPLE	Use PURPLE signal input if signal is a “clean” signal (tach output terminal, ECU, tach adapter etc.). See Fig 1.
GREEN	Use GREEN signal input if you are using a signal from an ignition coil (-). See Fig 1.
BLACK	Connect to a good common ground.
WHITE*	Connect to 12V+ dash lighting for white backlight. ***NOTE: Both 12V+ (RED) and WHITE wires must have power for white lighting to turn on.**
ORANGE*	Connect to 12V+ dash lighting for amber backlight. ***NOTE: Both 12V+ (RED) and ORANGE wires must have power for amber lighting to turn on.**
RED	Connect to 12V+ ignition circuit so power is ON when ignition is turned on.
BLUE	Connect to a 12V+ source that is always on, even when ignition is OFF (i.e. Battery +). NOTE: See next page for details on optional connection if you do not want to use 12V+ always on.
Shift Light Connector	Not all models include a shift light. If your model includes an external shift light, connect it to the red/black 2-pin connector.

Viewing Peak RPM Value

To view peak RPM value press the UP button. To return to normal operating mode, press the UP button again.

Clearing Peak RPM Value

Clearing peak recall requires **two** steps:

1. While in normal operating mode press the UP button. The pointer will now show the peak recall value (i.e. 7,000 RPM). Note: If the pointer shows ZERO then the peak recall value has already been cleared.
2. **Press and hold** the DOWN button firmly until the pointer moves to ZERO. **Do not release the DOWN button until the pointer moves to ZERO.**

Shift Light RPM Set Point

- Press the MENU button to access SHIFT mode. The pointer will indicate the current shift light activation set point.
- To change the shift light activation set point, press the UP or DOWN buttons. Hold the UP or DOWN button for rapid increase or decrease of the set point.
- Press MENU to save your changes and exit SHIFT mode.

PPR (Pulse per Revolution)

PPR (pulses per revolution) relates to how many times the ignition fires per crankshaft revolution. Because tachometer outputs on modern vehicles can range from 1 PPR to 4 PPR for a V8 engine the new standard is to refer to PPR. For standard ignitions PPR is typically half the number of cylinders.

Through-Dial Lighting Color

For white backlight, connect the WHITE wire to your 12V+ dash lighting. For amber backlight, connect the ORANGE wire to your 12V+ dash lighting. **NOTE: Both the gauge and the selected light wire need to have power for light to turn on.**

Integrated LED Lighting

IMPORTANT: Integrated LED lighting on this tachometer requires that the gauge be powered on (12V+ to RED wire) for the lighting to turn on.

This gauge features through-dial, high-definition LED lighting that will not dim when used with standard dash dimmers. A dimmer switch specifically designed for use with this gauge is available separately.

Lens Cleaning

The gauge lens is made of acrylic plastic. Do not use any chemicals or abrasives on the lens. To prevent scratching, caution must be used when cleaning. To clean, wipe lightly with a damp soft cloth.

Lens Protective Film

The gauge comes with a soft protective plastic film on the lens. Remove the protective film when gauge installation is complete.

Calibration

To calibrate, hold down the MENU button while turning the ignition on. The pointer will indicate the current PPR setting (0.5-6) as shown in the table below.

PPR Setting	Pointer Position, RPM
0.5 PPR (1 Cyl)	500
1 PPR (2 Cyl)	1000
2 PPR (4 Cyl)	2000
3 PPR (6 Cyl)	3000
4 PPR (8 Cyl)	4000
5 PPR (10 Cyl)	5000
6 PPR (12 Cyl)	6000

Use the UP/DOWN buttons to change the PPR setting. Press MENU to save your changes and exit calibration mode.

Tachometer Signal Hookup (Additional Info)

This performance tachometer has two signal input options. Choose the option best suited for your vehicle's ignition system. **Only connect 1 signal input.** If you are unsure which signal input to use, connect your signal source to the **PURPLE** input.

Purple Wire Input: "Clean" Signal

On applications where a "clean" tachometer signal output is available (typically a 12V square wave signal) connect the signal wire from the signal source to the **PURPLE** wire on the back of the tachometer. Applications with "clean" tachometer output signals include ignition boxes with tachometer output terminal, dedicated tachometer signal from ECU, and tachometer adapters.

Green Wire Input: Ignition Coil (-)

On standard ignition coils connect the signal wire from the coil negative (-) to the **GREEN** wire on the back of the tachometer.

Note: Some ignition coil applications (including many 4 cylinder applications) output a relatively clean signal. If this is the case for your application you may need to use the **PURPLE** signal input wire.

Blue Wire: 12V+ Always On

This connection is optional. It allows the pointer to return to zero when the 12V+ ignition (RED) is turned off. If you do not want to use the 12V+ always on connection connect the BLUE wire to the 12V+ ignition (same location as RED wire).

No Signal or Noisy Signal?

- Verify you have a good common ground.
- Verify you have a good signal connection
- Try switching input signal wires (i.e. try the purple input wire if you are using the green input wire).
- Install a tachometer signal filter (sold separately).