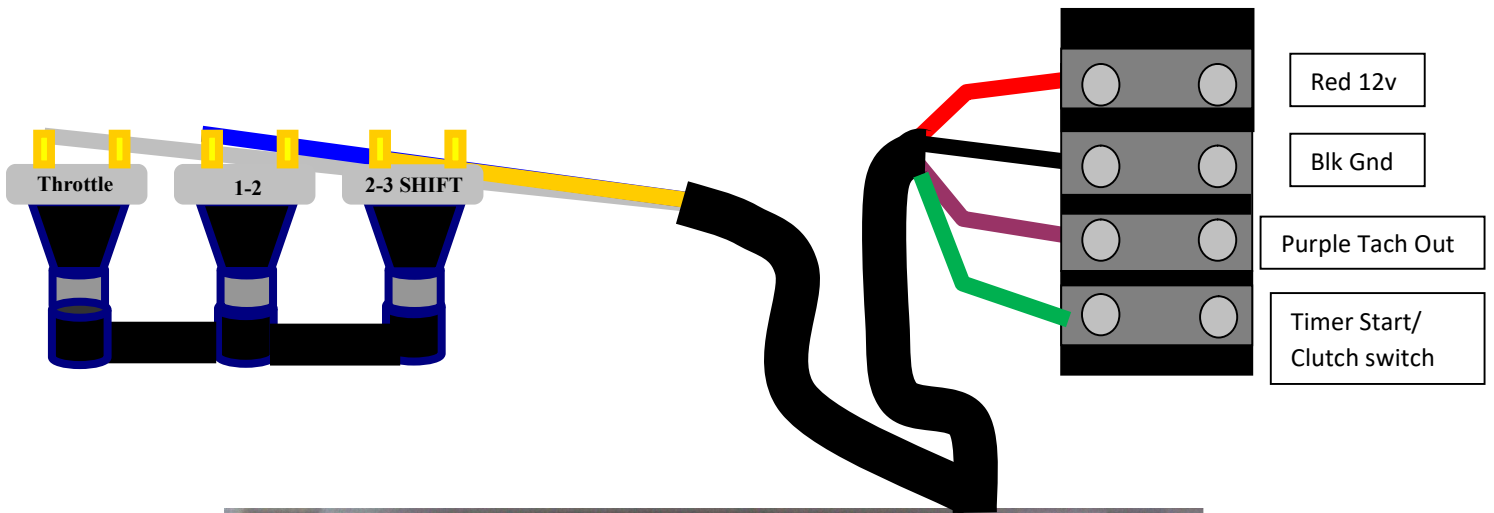


Electrimotion Timing Controller Hookup Diagram

With 2 step rev limiter



Power Input connector:

2 pin plug (red-black) wires

9-16 volt input

***Make sure the Command Module is grounded to the point box .

Tach Out:

Purple Wire (Rpm output) To Tach

To Racepak and Tachometer.

Start wires:

(Green) starts channels 1-8 and timing controller

(Blue) starts channels 9-16 and timing 1-2 shift

(Yellow) starts channels 17-24 and timing 2-3 shift

(White) Start Enable Wire, Must be grounded for timer to start

Crank Trigger Input:

2 pin female amp connector (To Grey cable)

Trigger Signal Output:

2 pin male amp connector (To Grey cable)

Ignition Kill:

12V on this pin is required for timing controller to run.

Removing 12v from this pin will shutoff the ignition output.

Cam Sync:

3 pin Grey Deutsch DTM (red,white,black), connect to cam sync pickup. Must be triggered between last cly and #1 cly.

Start Configuration:

Timer starts when start (Green Wire) **is not** grounded. Timer Resets after 8 seconds

1-2 Shift

Short Blue and Black Wire.

2-3 Shift

Short Yellow and Black Wire.

AutoShifter Connectors:

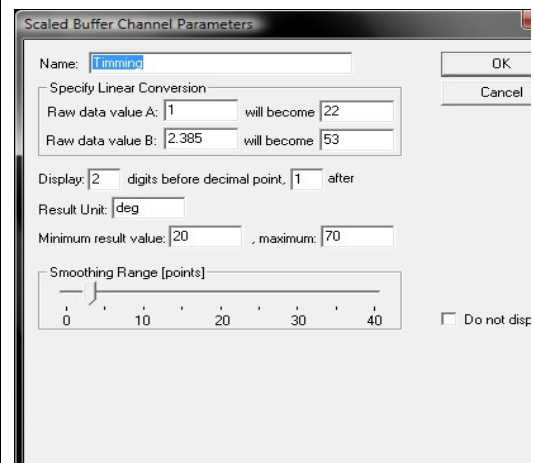
16 Pin Molex Connector on the left.

Timing Monitor Connections:

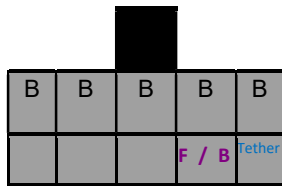
TDC input 3 pin Black Molex Connector

0-5v Analog Out 3 pin White Molex Connector

Timing Monitor Racepak Config:



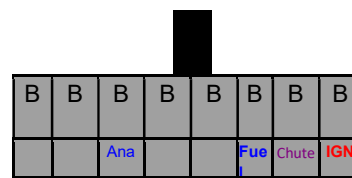
Safety Box Inputs



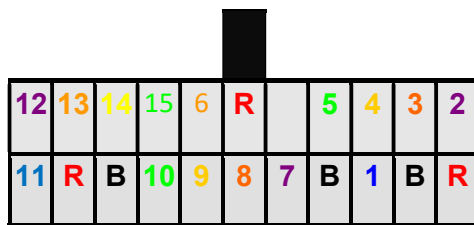
RF



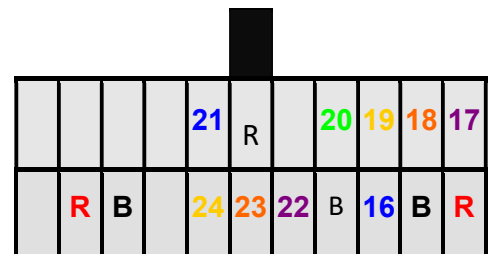
Safety Box Outputs



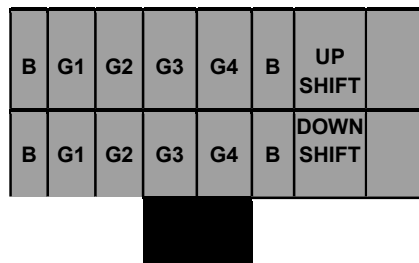
Outputs: Timer Channels 1- 15



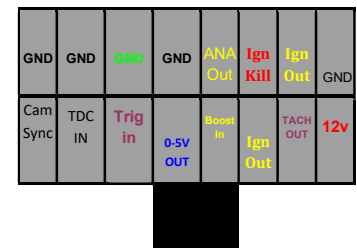
Timer Channels 16- 24



Auto Shifter



Timing Control



R= Input Power B= Ground

Mounting:

10-32 screws—2.500" by 2.000"

Warning Do not use screws longer than 3/8" or damage to unit may occur.

Overall Dims:

6.0 " * 4.5 " 2.75"

Alky F/C 2 step wiring diagram.

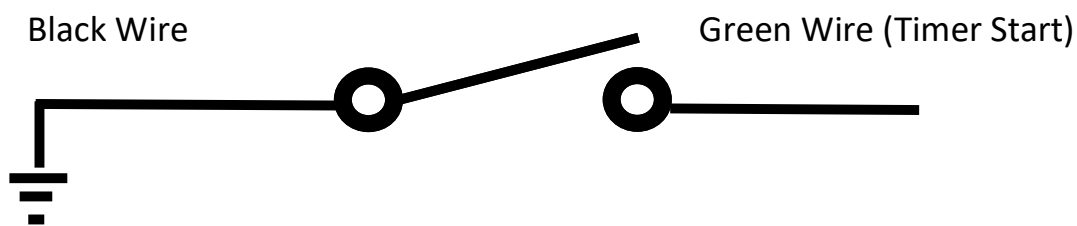
The Command Module two step function can be used in Alky Funny car as of 2023.

Existing Command Modules Ver 4.00 or later have the 2-step function built in and can be enabled with a change in parameters.

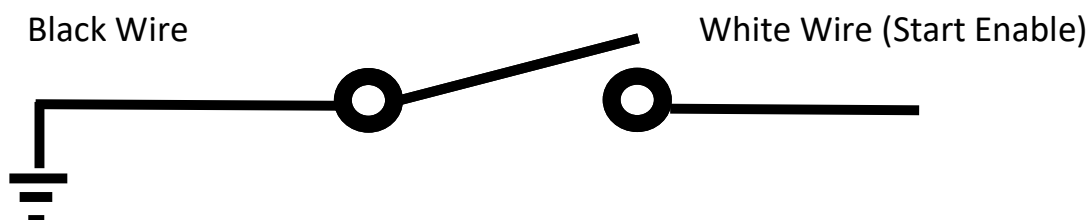
However, we also have an update that adds a “start enable wire” which makes the wiring and function of the 2 step more conducive to TAFC class.

If you are interested in the new “Start enable wire” feature, your CM will need to be sent back to EM for the modification. Wiring of Start enable and Timer Start are shown below.

Clutch Switch, Switch Closed when Clutch is down.

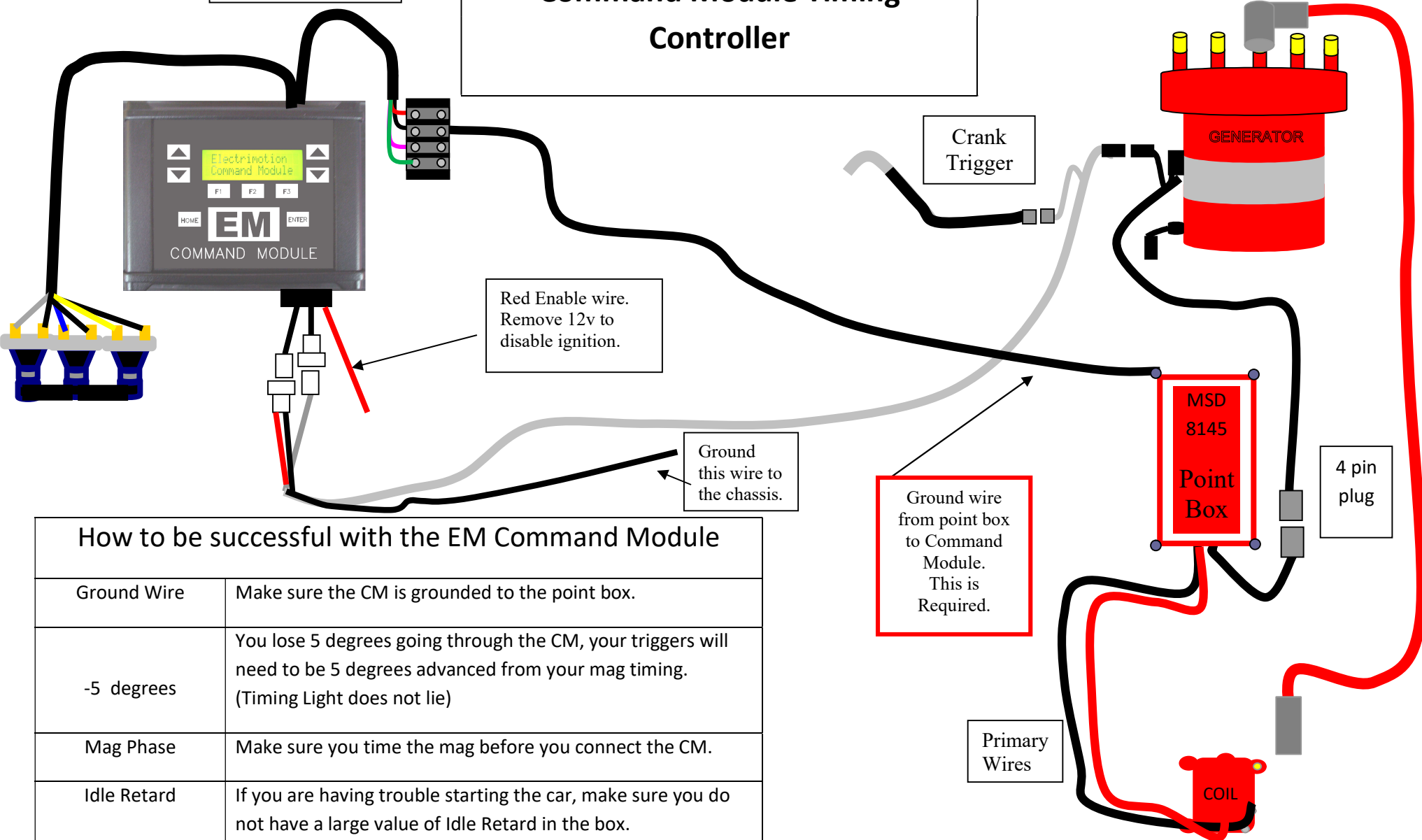


Throttle Switch, Switch Closed when Throttle is down.



12v Power Red
Ground Black
Tach Out Purple

Typical Ignition System using the Command Module Timing Controller

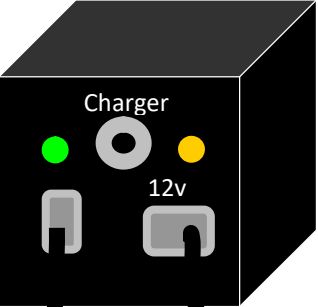


How to be successful with the EM Command Module

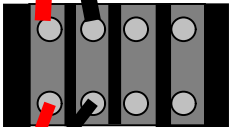
Ground Wire	Make sure the CM is grounded to the point box.
-5 degrees	You lose 5 degrees going through the CM, your triggers will need to be 5 degrees advanced from your mag timing. (Timing Light does not lie)
Mag Phase	Make sure you time the mag before you connect the CM.
Idle Retard	If you are having trouble starting the car, make sure you do not have a large value of Idle Retard in the box.
Retard Harness	The retard harness will plug in either way but only one way is correct, The Ground lead should be to the CM end.
General Wiring	Run all CM wiring as far as possible away from coil and plug wires to reduce RF interference.

Typical Command Module
Power Hookup Diagram

EM 12v Power Module or
other 12-16v source



12V power



To Manifold Burst Panel

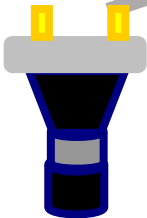


To Racepak
Safety Box
Monitor 0-5v

Safety Box
Ignition
Output

CM
Ignition
Enable

Fuel Shutoff and
Chute
Air Solenoids



Fire Bottle
switch