



Installation Instructions

ShiftPlus+

Electronic Shift Improver

Ford AODE/4R70W, 4R44E/4R55E & E4OD Transmissions

Part Number 70381

© 1998B&M Racing and Performance Products

The **B&M ShiftPlus+ Electronic Shift Improver** is engineered to improve the shift characteristics of your automatic transmission. The shifts will be firmer and more positive when the **ShiftPlus+** is switched to position 1 or 2. This **ShiftPlus+** has been designed to work on most Ford vehicles equipped with the **AODE/4R70W (1994 thru 1997)**, **4R44E/4R55E (1995 thru 1997)** or **E4OD (1994 thru 1997)** electronic automatic transmissions. These transmission can easily be identified by reviewing the build code decal, typically located on the driver's door. Under the word "**Trans**", there should be a letter. If this letter is "**D**", "**E**", "**H**", "**L**", "**P**", "**U**" or "**V**" this unit should work.

We recommend that you read through the instructions completely before beginning the installation, so you can familiarize yourself with the installation procedure and tools required. Check the tool list at the end of these instructions for the tools required to install your **B&M ShiftPlus+ Electronic Shift Improver**. Installation of the **B&M ShiftPlus+** can be accomplished by anyone with minimum mechanical experience. It is however, important to closely follow the instructions.

NOTICE: The **B&M ShiftPlus+ Electronic Shift Improver** is not a cure-all for an ailing transmission. If your transmission is slipping, chatters or is in poor general shape, the installation of this Electronic Shift Improver may worsen the condition. However on a properly operating transmission in average condition, the **B&M ShiftPlus+ Electronic Shift Improver** will provide the kind of transmission performance you are looking for.

When installing your **B&M ShiftPlus+ Electronic Shift Improver** there are several other **B&M** products you may wish to consider:

B&M SuperCooler Automatic Transmission Coolers: We feel that it is very important that every vehicle used in heavy duty and hi performance applications (racing, towing, RV, etc.) should have an oil cooler. Heat is the major cause of transmission failures, and an oil cooler is an inexpensive safeguard against overheating and transmission failure. **B&M** offers a wide variety of transmission coolers to suit every application.

B&M Trick Shift Performance Automatic Transmission Fluid #80259 Trick Shift performance automatic transmission fluid is the industry's only real performance **ATF**. A specially blended

oil with foam inhibitors, extreme pressure agents and shift improvers, this fluid assures protection while delivering the fastest possible shifts. You literally "Pour in performance."

INTRODUCTION

The **B&M ShiftPlus+ Electronic Shift Improver** can be easily installed in less than an hour by carefully following the instructions. **Read all instructions first to familiarize yourself with the parts and procedures.**

INSTALLATION

STEP 1. Disconnect the negative battery cable. Locate the PCM (Powertrain Control Module) or Computer. This unit is also known as the EEC-IV or EEC-V. This unit is usually located under the hood or behind the passenger kick panel.

STEP 2. Once you have located the PCM, carefully remove the plastic cover shrouding the wires (there are four small tabs that hold the cover on). Next, loosen the 10 mm bolt which holds the wire loom onto the PCM and pull the wire loom off of the PCM. This will allow you to read the pin numbers stamped onto the connector.

STEP 3. Inside the vehicle, determine where you would like to mount the head unit. Make sure that the wires will reach the PCM (you will need to find an existing pass-through in the firewall or drill a 3/16" hole to pass the wires through).

STEP 4. Carefully clean the back of the head unit and the mounting surface with rubbing alcohol and a cotton ball. Using the supplied hook and loop tape, carefully attach the "loop" tape to the back of the head unit. Attach the "hook" tape to the mounting location inside the vehicle. Note: For best results, allow the tape to cure for 24 hours before attaching head unit to mounting location.

STEP 5. Carefully route the wires and the control unit under the dash, making sure to mount the control unit where there is adequate air circulation (the control unit will get warm under normal operating conditions). Feed the end of the wire through the firewall and route it up to the PCM. If the **ShiftPlus+** wire harness needs to be extended, use 18-20 ga. wire, being sure to solder the connections. Use black electrical tape to protect the exposed connections.

STEP 6. Review the following figures to locate which wires you will be attaching the leads. If you wish to make connections at the transmission, refer to Figure 3. **NOTE: Severe engine damage may result if wire colors are not matched to those shown in figures 1, 2 or 3.**

a. If your vehicle has an EEC-IV computer, locate the red wire attached to pin #37 (pin #35 if this is a diesel application) and crimp it to the red wire from the **ShiftPlus+** using the supplied Scotchloc® connector. Next, locate the white with a yellow stripe wire attached to pin #38 and crimp it to the black wire from the **ShiftPlus+** using the supplied Scotchloc® connector.

b. If your vehicle has an EEC-V computer, locate the red wire attached to pin #97 and crimp it to the red wire from the **ShiftPlus+** using the supplied Scotchloc® connector.

tor. Next, locate the white with a yellow stripe wire attached to pin #81 and crimp it to the black wire from the **ShiftPlus+** using the supplied Scotchloc® connector.

STEP 7. Tape up the connections using black electrical tape and use the supplied tie wraps to make sure the wires are routed safely. Reconnect the negative battery cable.

STEP 8. Position 1 (single dot) on the **ShiftPlus+** will provide firmer, more positive shifts. Position 2 (double dot) on the **ShiftPlus+** will provide the firmest. The center po-

sition (off) on the **ShiftPlus+** will return the shifts to stock firmness.

Tool List

Pliers
Electric Drill w/ 3/16" bit
10mm Socket, Drive, Extension
Rubbing Alcohol and Cotton Ball

Parts List

1 ShiftPlus+ Controller
2 Hook & Loop Tape
2 Scotchloc® Connectors
2 Tie Wraps
1 Instruction Sheet

