



# Installation Instructions

## DCI Diagnostic Communication Interface

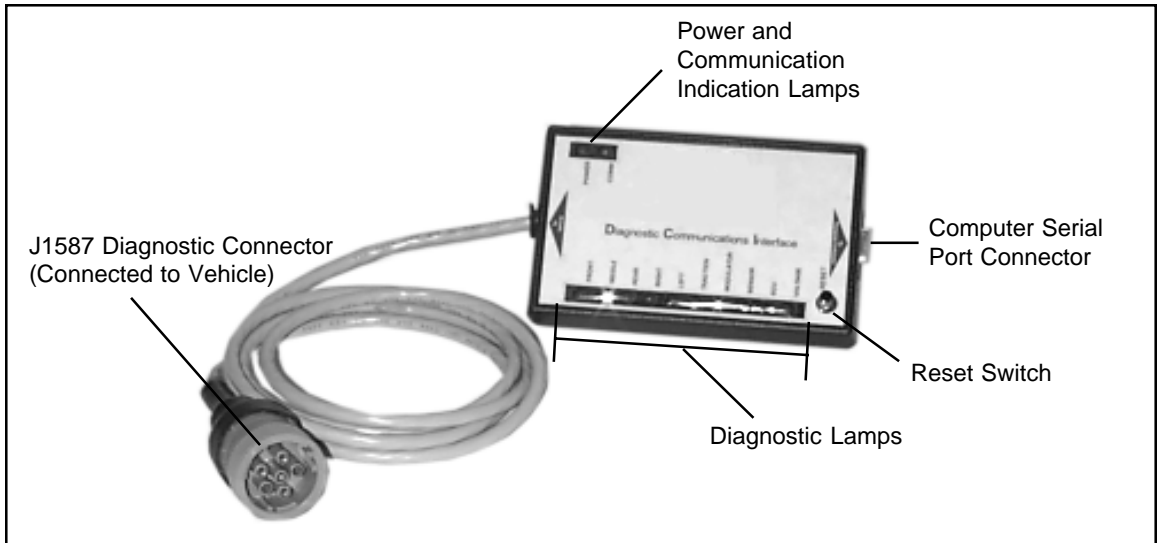


Figure 1 Diagnostic Communications Interface

## Introduction

The Bendix Diagnostic Communication Interface, or DCI, is an electronic, diagnostic tool for locating faults in the EC-17 based AntiLock system. The DCI can either be used as a "stand alone" diagnostic tool or with Bendix's ACom For Windows software.

When used by itself the DCI is capable of locating individual antilock system faults using a series of lamps that indicate the faulted device or its wiring and the location on the vehicle. Referring to figure 1, note that the DCI has 12 lamps and a reset switch. The row of 10 lamps is similar to the diagnostic LED display found on some Bendix antilock Controllers. The two other lamps indicate that the DCI has a power source and that a communications link is established with the controller.

When used in conjunction with a personal computer (PC) and Bendix's "ACom For Windows™" software installed, the DCI becomes a communications arbitrator between the vehicle's numerous onboard controllers and the personal computer (PC). In this case all testing and diagnostics are performed by the computer and ACom software.

## Diagnostics Using the DCI Alone

In order to use the DCI, the vehicle must be equipped with a J1587 diagnostic link connector as illustrated in figure 2. This connector is generally located on the driver's side, in the lower portion of the dash or under the dash panel. Use the following procedure to connect the DCI and begin troubleshooting.

# Diagnostic Communications Interface

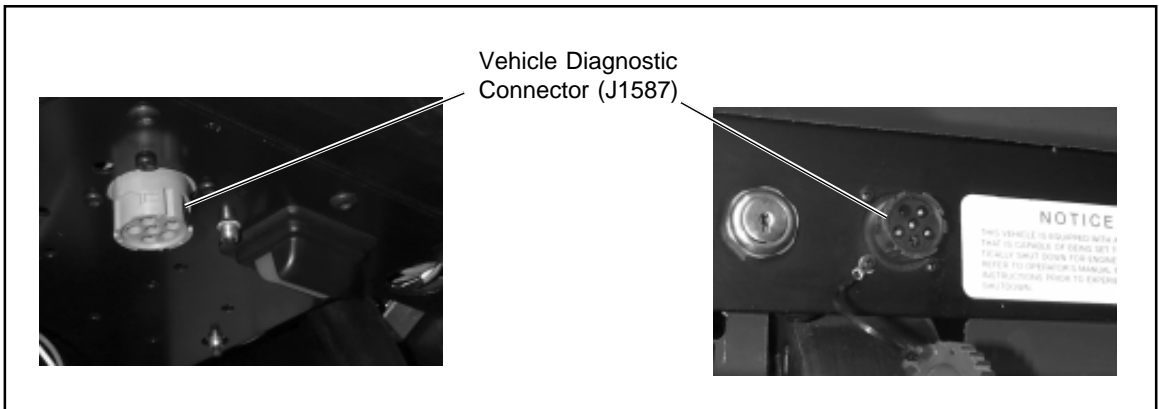


Figure 2 Vehicle Diagnostic Connector Location

1. Park the vehicle on a level surface, apply the parking brake and turn off the ignition.
2. Locate the vehicle diagnostic link connector and connect the DCI cable assembly to the vehicle's diagnostic connector.
3. Turn the ignition on and note that the 10 diagnostic lamps flash on and off as the system goes through a self test.
4. The DCI lamps that remain ON at the conclusion of the self test indicate the condition of the antilock system and the connection between the DCI and the antilock controller.

See figure 3 for a brief explanation of the lamps.

For detailed instructions on the use of the diagnostic lamps on the DCI consult the Bendix Service Data Sheet for the antilock controller being tested. Alternatively consult the vehicle maintenance manual for troubleshooting information. See figure 4 for a reference to Service Data Sheets and Controller Relay models. Service Data Sheets may be obtained from any Authorized Bendix parts outlet.

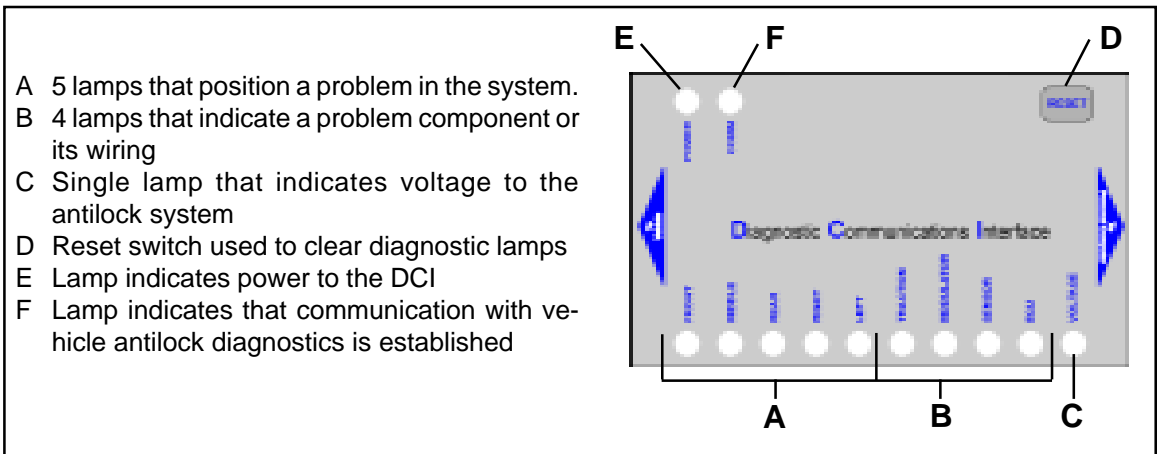


Figure 3 DCI Indicator Lamps

# Diagnostic Communications Interface

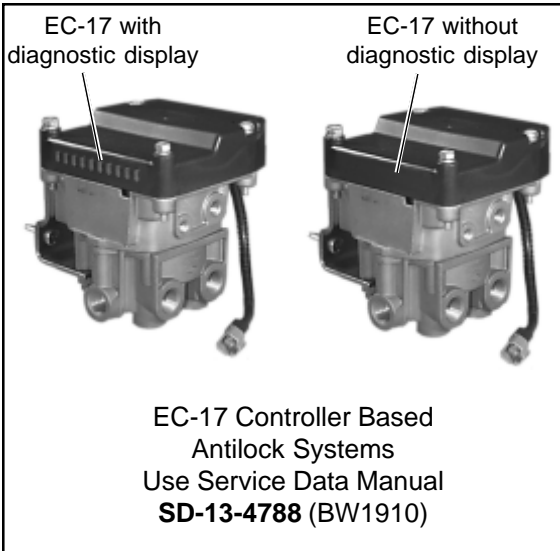


Figure 4 AntiLock Controller Relay Assembly Reference

## Important Note

The diagnostic lamps (see figure 3) on the DCI are same as those found on those Bendix antilock controllers equipped with LED diagnostics. It should be noted that some Bendix controllers do not incorporate an LED diagnostic display. In those instances a DCI or similar device is required to troubleshoot the antilock system.

## Diagnostics Using the DCI with ACom Software and PC

In order to use the DCI, the vehicle must be equipped with a J1587 diagnostic link connector as illustrated in figure 2. This connector is generally located on the driver's side, in lower portion of the dash or under the dash panel.

Using the DCI in conjunction with the ACom for Windows software requires that ACom software be installed on the computer. If this has not been done refer to the documentation packaged with the ACom software and install ACom. After

installing the ACom software, or verifying it is installed, on the computer. Use the following procedure to connect the DCI and begin troubleshooting.

1. Park the vehicle on a level surface, apply the parking brake and turn off the ignition.
2. Locate the vehicle diagnostic link connector and connect the DCI cable assembly to the vehicle's diagnostic connector.
3. Connect the male end of a serial cable to the DCI. The serial cable should be long enough to accommodate a convenient location for the DCI and computer.
4. With the computer turned off, connect the other end of the serial cable to an unused serial port on the computer. (See figure 5)
5. Turn the vehicle ignition on and note that the 10 diagnostic lamps flash on and off as the system goes through a self test.
6. Turn the computer on then open the ACom for Windows software. Go to the pull down File menu and select "Setup". Using online help, fill in the necessary information. Pay particular attention to selecting the appropriate "Com Port". Once complete, troubleshooting can begin. Refer to ACom documentation packaged with the software.

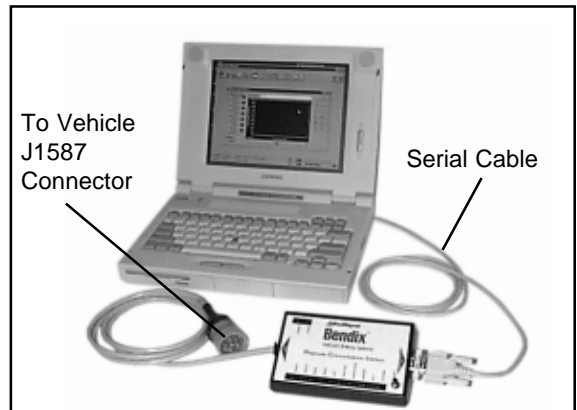


Figure 5 DCI Connected to Lap Top Computer

