

# Tech Info Library

### GeoPort/Express Modem: Does Not Connect To Some Modems (2/95)

Revised: 2/23/95 Security: Everyone

GeoPort/Express Modem: Does Not Connect To Some Modems (2/95)

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TOPIC -----

Sometimes a GeoPort does not connect to modems that do not support data compression, unless the GeoPort modem is not using data compression. This article discusses some possible reasons for this.

DISCUSSION -----

The default setting on Express Modem software and GeoPort is for the modem to attempt a high-speed, error correcting, data compressed connection and fall back as necessary to what the other modem is set to (AT command &q5). Also, modem register S47 is set to 7, which enables the Express Modem to negotiate with the other modem on features such as compression.

#### The Problem

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If you are having problems with the Express Modem connecting or negotiating a connection with another modem, make sure register S47 is not set to 0. This causes the Express Modem to drop a connection when the other modem is incapable of data compression connections (v42bis).

The application being used may be making settings without your knowledge. You can test connections by using a basic terminal program. Enter AT&F and press Return in the terminal window. Dial the other modem by entering one of these commands and pressing Return:

- ATDT <phone number> (digital)
- ATDP <phone number> (pulse/rotary)

For example: ATDT 555-4567

You should see the message 'CARRIER XXXX' followed in a few seconds by the message 'CONNECT XXXX'.

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Some applications are written to immediately send data after seeing the CARRIER message. This behavior causes the Express Modem software to drop the connection because it is receiving data from the terminal program before the CONNECT message. The CARRIER message only means that the Express Modem/GeoPort has detected another modem on the line. By design, the Express Modem software disconnects if it receives data before it has a chance to print the CONNECT message. Some terminal programs send data before the CONNECT message to command the modem to abort a connection. The Express Modem is duplicating this behavior.

#### A Workaround

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A workaround if your application expects CARRIER to signify a connection is to add a 'WO' (a zero, not the letter "O") command to the application's modem initialization string. This instructs the Express Modem to not provide the CONNECT message and allow the application to use the CARRIER message as a valid connection signal.

Refer to the document titled Express Modem AT Commands installed by the Express Modem software installer for a complete description of modem commands.

Article Change History:

22 Feb 1995 - Added keyword; made minor technical updates.

Support Information Services

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