



Service Bulletin

Bulletin No.: 24-NA-098

Date: March, 2025

INFORMATION

Subject: Service Programming System (SPS) Errors (E4398, E4399, E4401, E4403, M4404, M4413, M6954, M6955, E4414, E4423, E4491, E4492, or E6961)

This Service Bulletin replaces PI0592I. Please discard all versions of PI0592.

Brand:	Model:	Model Year:		VIN:		Engine:	Transmission:
		from	to	from	to		
GM Passenger Cars and Light Duty Trucks		2000	2025	—	—	—	—

Involved Region or Country	North America, Australia/New Zealand
Condition	Some technicians may notice Service Programming System (SPS) Errors.
Correction	<p>Reference the specific SPS programming error (E4398, E4399, E4401, E4403, M4404, M4413, M6954, M6955, E4414, E4423, E4491, E4492, or E6961) and follow the instructions, which will assist in understanding the cause and how to resolve the issue without replacing the control module. Most errors can be resolved by following the basic troubleshooting steps below.</p> <p>Note: In order to contact Techline Customer Support (TCSC), a Dealer Case Management (DCM) case must be entered prior to calling TCSC.</p> <p>If the programming error cannot be resolved using the following troubleshooting instructions, and the CGM (Communication Gateway Module) has been updated to the latest software where noted, do not replace the control module. Contact the Techline Customer Support Center (TCSC) for assistance at: TCSC: 1-800-828-6860 English or 1-800-503-3222 French, 8am-8pm (EST) Monday through Saturday</p>

Information required when calling:

- Dealer BAC
- Call back phone number (close proximity to the Techline PC and vehicle)
- VIN
- Description of service procedure being performed, (ex: bulletin, etc.)
- Error messages if any

Note: Using a Techline PC and programming device that meets the minimum specifications is essential to successful programming and required for full support.

Service Procedure

Important: Service agents must comply with all International, Federal, State, Provincial, and/or Local laws applicable to the activities it performs under this bulletin, including but not limited to handling, deploying, preparing, classifying, packaging, marking, labeling, and shipping dangerous goods. In the event of a conflict between the procedures set forth in this bulletin and the laws that apply to your dealership, you must follow those applicable laws.

Important: This technical service bulletin (TSB) can only be completed by certified repair facilities who have met all specific training, tool and equipment requirements pertaining to the vehicle Brand and Model serviced. Repairs must be performed by a technician who has successfully completed the required training.

E4398 – No Calibration Data**Cause:**

This programming error is the result of a missing or incomplete data record. This error is not related to the module being programmed or a vehicle issue.

Resolution:

Contact Techline Customer Support Center (TCSC) for programming instructions.

E4403 – Severe Error**Cause:**

These general programming errors are typically the result of a loss of communication between the programming device and module. The loss of communication can be caused by a drop in battery voltage, delay in communication with the module or a vehicle issue such as interruption on the BUS (wiring, connector issue, aftermarket components, etc.).

Resolution:

Maintain a minimum of 12.5 volts during programming.

Attempt to re-establish communication with the module. This should first be done with GDS2 or Tech 2. If communication can be established, check the software level of the CGM and update if a newer version is available. Then, reattempt programming the failed module using "Replace and Program ECU" as the programming method.

If communication cannot be re-established, deplete retained power by disconnecting the negative battery terminal for a minimum of 5 minutes. Re-establish and maintain battery power, attempt to communicate with the control module using MDI or Tech 2. Reattempt programming using "Replace and Program ECU."

Some earlier model vehicles (pre-2007) may require the use of the Tech 2 and 'Legacy Tech 2' programming option in SPS in order to utilize a slower programming communication speed.

M4413/E4414/M6954/M6955 – Calibrations marked with an (*)**Cause:**

An (*) indicates that the SPS application is not recognizing the calibrations being read from the control module. This can be caused by a non-GM calibration programmed into the control module or an incomplete SPS data record.

Resolution:

Contact TAC.

M4404 – No Communication with Diagnostic Tool**Cause:**

This is a loss of communication between the programming device, (MDI or Tech 2), and Techline PC and not a module or vehicle problem.

Resolution:

Confirm the connection from the PC. If the programming device is connected by USB, select a different USB port on the Techline PC.

If using a wireless network for the MDI connection, confirm the wireless connection or switch to a USB connection (It is important to disable the MDI wireless connection in the MDI wireless manager when using a USB connection).

If programming with a Tech 2, perform a Tech 2 self-test found in SPS under 'Settings', 'Diagnostics' then 'Test Connections.' Try a known good Techline PC serial port connector and RS232 cable. A known good Tech 2 and Candi module can be used.

Confirm and maintain proper battery voltage before attempting programming.

E4423/E6961 – Programming Failed**Cause:**

These errors can be the result of an incompatibility between the software/calibrations and the module, a result of a condition that is not being met to allow a successful programming event (e.g., incorrect voltage and/or aftermarket components), or a vehicle related issue (wiring, connector issue, aftermarket components, etc.).

Resolution:

This type of issue cannot typically be resolved without assistance from TCSC. Be sure to have the original and service module part numbers and error detail when contacting TCSC.

This can be confirmed by attempting to program the original module. Typically, these errors cannot be resolved without the assistance of TCSC. Do not replace the module. Contact TCSC and be sure to have the original module part number and the service part number when calling.

E4401 – Severe Error: Writing data to device or controller failed**Cause:**

These general programming errors are typically the result of a loss of communication between the programming device and module. The loss of communication can be caused by a drop in battery voltage, delay in communication with the module or a vehicle issue such as interruption on the BUS (wiring, connector issue, aftermarket components, etc.).

Resolution:

Typically, this issue can be resolved without the assistance of TCSC via the below workaround.

1. Shutdown TLC.
2. Rename SPS file in the C drive and save on the computer.
example: This PC > OSDisk (C:) > Users > (GM ID (six digits)) > sps
3. Relaunch TLC in admin mode.

E4491 – Reprogramming Error: Check all connections and reset Programming Interface**E4492 – Cyber Security Access Failure****E4399 – There was an error retrieving the controller data****Cause:**

These errors can be the result of an incompatibility between the software/calibrations and the module, a result of a condition that is not being met to allow a successful programming event (e.g., incorrect voltage and/or aftermarket components), or a vehicle related issue (wiring, connector issue, aftermarket components, etc.).

Resolution:

Check the software level of the CGM and update if a newer version is available. Otherwise, this issue can be resolved without the assistance of TCSC via the below workaround:

1. Clear cache.
2. Rename SPS folder in C drive and save on computer.
example: This PC > OSDisk (C:) > Users > (GM ID (six digits)) > sps
3. Relaunch TLC in admin mode.
4. Connect wired MDI.

Note: If steps 1 through 4 don't work, try a different setup if available (computer/MDI/cable).

Version	2
Modified	Released June 06, 2024 – PI0592I has now become Global Service Bulletin Number 24-NA-098. This update adds the 2025 Model Year, Australia/New Zealand to Involved Region or Country section, second Important statement, and additional SPS Error Codes with Resolution. Revised March 21, 2025- Revised to update the correction.

