
MCP250XX Rev. A2 Silicon Errata

The Device# parts you have received conform functionally to the Device Data Sheet (**DS21664D**), except for the anomalies described below.

These Errata are associated with the following Microchip devices:

- MCP25020
- MCP25025
- MCP25050
- MCP25055

All of the issues listed here will be addressed in future revisions of the MCP250XX silicon.

1. Module: CAN

The CAN module may send a passive error flag earlier than expected. This will occur at the transition point of error active to error passive, TEC (Transmit Error Count), or REC (Receive Error Count) ≥ 128 .

Work around

None

Date Codes that pertain to this issue:

All engineering and production devices.

2. Module: CAN

The CAN module may not synchronize correctly if there is a phase error between nodes that is equal to the Synchronization Jump Width (SJW). As a result, the module may request retransmission of messages from the transmitting node (via an Error Frame).

Work around

Use the longest SJW possible that will work with the application.

Date Codes that pertain to this issue:

All engineering and production devices.

3. Module: Control Logic

The device may exceed the maximum standby current specification (IDDS) when it is initially placed into SLEEP mode (OPTREG2.SLPEN bit is set).

This condition may peak at ≥ 2 mA for a duration of ≤ 10 seconds, up to 5 seconds after the SLEEP mode command is received, with the magnitude and length of time being dependent on external conditions, including device voltage and temperature range.

Work around

None

Date Codes that pertain to this issue:

All engineering and production devices.

4. Module: CAN TX Module

If an error frame occurs on the CAN bus during message transmission by the MCP250XX, the internal flags are cleared, however, the internal byte counter does not clear. This causes the retransmitted message to become corrupted.

Work around

The CAN node(s) interested in MCP250XX messages should discard the subsequent MCP250XX message after an error frame is detected on the bus.

Date Codes that pertain to this issue:

All engineering and production devices.

CLARIFICATIONS/CORRECTIONS TO THE DATA SHEET:

In the Device Data Sheet (**DS21664D**), the following clarifications and corrections should be noted.

- None

MCP250XX

APPENDIX A: REVISION HISTORY

Revision B Document (9/2008)

1. Added CAN TX Module.

Revision A Document (10/2001)

Initial release of this document..

APPENDIX B: SILICON REVISION HISTORY

The following table and package marking information indicates how to determine the revision of the MCP250XX devices. The revision information can be determined by the Year and Week Code of the manufacturer printed on the device.

TABLE B-1: SILICON REVISION/DEVICE MARKING

Silicon Revision	YYWWNNN		Comments
	Start Date	End Date	
Rev A2	All	All	In Production
Rev A1	—	—	

Legend: "N" is any alphanumeric character.

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