Introduction

This document provides a comprehensive list of hardware issues identified on the öchìn CM4v2 board during its development and testing phases. Each issue is detailed with a description, its impact, and the specific hardware version where it was resolved.

The goal of this document is to assist developers, engineers, and users in understanding potential limitations of the board and ensuring compatibility with their projects. For any additional questions or updates, please refer to the official documentation or contact support.

Bugs list

Title: INA219 burns out on reverse polarity **BugID:** HW-001 **Date:** November 2024
Board version affected: ochin CM4v2.0.0
Description: If the polarity of the öchìn CM4v2 board is inadvertently reversed, the protection circuit will safeguard both the öchìn board and the CM4 module. However, the current sensor INA219 will suffer irreversible damage. This results in a malfunction of the current and voltage readings for the power supply.
Impact: The board's ability to measure current and voltage is compromised, requiring replacement of the INA219 chip to restore functionality.
Resolution: This bug will be resolved in version öchìn CM4v2.0.1 by improving the protection circuit.

Title: The Radxa CM5 module never boot **BugID:** HW-002 **Date:** November 2024
Board version affected: ochin CM4v2.0.0
Description: The bug prevents the Radxa CM5 module from booting because the 100nF capacitor (C1) takes a moment to charge, causing the signal to stay low for a short time, which is enough for this module to interpret it as a button press.
Impact: Not possible to use the ochin board with the Radxa CM5 module.
Resolution: This bug will be resolved in version ochin CM4v2.0.1 by reducing the value

of C1 and removing R33. As a quick solution, C1 and R33 can be removed (note that C1 is intended to minimize electrical bouncing when the button is pressed).